WHERE DO WE GO FROM HERE?

Breaking Down Barriers to Bicycling in the U.S.

Research by Charles Brown, Susan Blickstein, Siennah Yang, Aashna Jain and James Sinclair
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EXECUTIVE SUMMARY

WHERE DO WE GO FROM HERE? BREAKING DOWN BARRIERS TO BICYCLING IN THE U.S.

Even without the recent upsurge brought on by the COVID-19 pandemic, bicycling has increased in popularity in many U.S. cities over the last decade. However, even as the number of bicyclists and bike trips steadily grows, many communities have struggled to create truly inclusive bike cultures. Furthermore, bicycling still remains completely out of reach for many minority groups and low-income Americans due to persistent and pervasive social and physical barriers.

Physical barriers to bicycling include issues like the inequitable distribution of bicycle infrastructure among neighborhoods and diverse populations, whereas social barriers are occasionally less obvious but arguably more widespread. For example, the dominant perception of bicyclists as white men can prevent minority men and women from embracing bicycling at a rate comparable to their white counterparts. Likewise, hygiene concerns might keep a person of color from biking to work for fear of judgment from their white, corporate counterparts. As we look to grow bicycling nationally, it's imperative that we understand the reasons why some people choose to ride a bike and others do not.

To better understand these barriers to biking, PeopleForBikes funded research in 10 U.S. cities focused on helping communities build strong local partnerships and accelerate the growth of bicycling. The study's principal investigator was Charles T. Brown, who worked with Susan Blickstein and Siennah Yang of Susan G. Blickstein, LLC and Brown's colleagues James Sinclair and Aashna Jain at the Alan M. Voorhees Transportation Center (VTC) at Rutgers University. Together, they set out to identify different factors preventing people from bicycling, plus what infrastructure and incentives people need in order to start.

The 10 focus group cities included in the study were:

- Austin, TX
- Baltimore, MD
- Denver, CO
- Fort Collins, CO
- Memphis, TN
- New Orleans, LA
- New York City, NY
- Portland, OR
- Providence, RI
- Tucson, AZ

Using a qualitative approach, researchers conducted two focus groups in each city – one with community members, another with local business representatives. By facilitating discussions using both open-ended and closed-ended questions, researchers were able to gain an in-depth understanding of participants' perceptions and attitudes towards bicycling, as well as what types of activities, programs or marketing might change their opinions. By involving businesses, researchers were able to determine what role the private sector might play in hindering or advancing bicycling.

In some focus groups, a higher proportion of minority participants allowed the research team to gain a deeper and more nuanced understanding of the physical, social and cultural barriers to biking. Discussions explored participants' travel patterns, how they perceived and identified with bicyclists, access to and experience with bicycling, and feedback regarding local bike infrastructure and the building process. Also examined was the representation of bicycling and bicyclists in the media and the effectiveness of current bicycle safety education and enforcement programs.

What emerged across cities was a racial and gender disparity regarding bicycle use and perception, as well as a lack of inclusive representation and community input when it came to infrastructure planning. Ultimately, researchers found that these factors led to an inequitable distribution of infrastructure and, in some cases, the association of bike lanes with gentrification. Notably, researchers also observed the persistence of stereotypes in bike culture, many of which deterred minorities from biking.
Based on the common experiences and concerns illuminated by the study, five recommendations and implications for future research were outlined:

1. **Meaningfully engage with historically marginalized communities where they live, work and play.**
   
   Seek out help from and prioritize building confidence with people of color and other minority groups. Engage on their terms – meet them at their places of work, play and residence. Do not expect them to come to traditional meetings.

2. **Don’t shy away from conducting focus groups in and with communities of color.**
   
   Efforts should be made to solicit the help of local partners and continuously engage and recruit people of color for focus groups. To avoid feelings of hostility or indifference towards bike infrastructure, soliciting community outreach and input (and acting on it) is crucial.

3. **Expand private-sector encouragement programs.**
   
   Businesses play an important role in encouraging bicycling by offering cash incentives, commuter benefits and amenities such as shower facilities and safe bicycle storage. These types of initiatives need to be implemented at businesses that haven’t historically embraced bicycling.

4. **Develop tailored and culturally relevant educational materials, marketing and outreach strategies.**
   
   People need to see themselves in marketing and outreach materials for it to resonate. Additionally, education on bicycling and road sharing is important for everyone, including drivers and law enforcement. Education that goes beyond traditional government spaces will be most effective.

5. **Build and invest in quality bicycle infrastructure – both big and small.**
   
   Well-lit, protected bike lanes were identified as a top factor for increasing people’s comfort with biking. Secure bicycle parking, contraflow bike lanes and safer pedestrian crossings should also be considered when creating complete streets within existing transportation networks.

Barriers to bicycling are sometimes physical, but also systemic, institutional, social and cultural. We encourage readers to think beyond bike lanes and apply these learnings to any place-based projects, ensuring planners meet people where they are and that any changes to communities are led by residents. For new projects to be successful, employing an equitable and holistic approach is essential.
INTRODUCTION

This project builds on previous research conducted by Alan M. Voorhees Transportation Center (VTC), Bicycling Among Black and Latino Women (2016) and Barriers to Bicycling in Black and Hispanic Communities in New Jersey (2016), to further identify different barriers to bicycling, especially among minority populations, as well as to explore different perceptions on bicycling and experiences about related infrastructure. It also explores ways in which businesses and other community partners can play a role in promoting bicycling and advancing bicycle safety education and enforcement efforts. While previous studies that VTC conducted focused on New Jersey communities, this project focuses on ten US cities which received funding from PeopleForBikes through the Big Jump Project. The purpose of the Big Jump Project was to grow bicycling mode share. Specifically, to double or triple bike ridership in targeted neighborhoods. Additionally the project aspired to help cities radically reimagine their bicycle infrastructure and to prove that when cities make smarter choices, more people ride bikes and communities become better places to live, work, and play.

This study’s findings aim to encourage cities to foster a more equitable, diverse, inclusive and safer bicycling culture, to develop equitable planning processes and infrastructure expansion initiatives, and to remove barriers to improve the health and vitality of cities and neighborhoods.
The ten cities were selected to examine and highlight a variety of issues and challenges with bicycle use in multiple regions of the US. A total of 19 focus groups were conducted with two focus groups held in each city, one with community members and one with representatives from local businesses and institutions. With the exception of Providence, Rhode Island (where no business focus group was held), community and business groups were facilitated by VTC in each city.

This research project primarily used a qualitative approach, via focus group discussions, to gain an in-depth understanding of participants’ perceptions and attitudes towards bicycling, as well as what types of activities, programs, or marketing would impact those perceptions. To recruit community and business focus group participants in each city, VTC, with support from PeopleForBikes, worked with staff from municipal governments and other local partners, such as advocacy organizations and neighborhood groups, to recruit participants for the focus groups in each city.
Local partners were notified that each community focus group would last approximately 90-minutes and should be held in a location that is both ADA and transit accessible, where applicable, to ensure the possibility of full access and participation by all members of the community. Each community focus group should aim to consist of a minimum of 10 participants and maximum of 16 participants. Therefore, each local partner was encouraged to recruit up to 16 participants to ensure the minimum number of participants were present on the day of the focus group. Local partners were encouraged to recruit participants reflective of the city’s diversity (i.e., race/ethnicity, age, sex/gender, income, and ability) to ensure representation of all members of the community. Local partners were informed that each focus group would be conducted in English and would take place after normal business hours—that is, sometime between 6:00 PM and 8:00 PM local times. However, if requested in advance, local partners were made aware of the ability for VTC staff to conduct focus groups exclusively in Spanish. Local partners also were advised to recruit participants over the age of 18 years old and were given the option to host the community focus group during the weekday or weekend. All focus group participants were required to fill out and sign a Rutgers IRB-approved video and audio permission form prior to the start of the focus group and complete a demographic survey upon completion of the focus group. Each community focus participant was given $50 cash, upon completion, for participating in the focus group. Food, drinks, and childcare services were also be provided to participants of the focus group, where applicable.
Local partners were informed that each business focus group would last approximately 90-minutes and should be held in a location that is both ADA and transit accessible, where applicable, to ensure the possibility of full access and participation by all members of the business community. Each community focus group would consist of a minimum of 10 participants and maximum of 16 participants. Therefore, each local partner was encouraged to recruit up to 16 participants to ensure the minimum number of participants were present on the day of the focus group. Local partners were encouraged to recruit participants from a cross section of the following business types including but not limited to: retail, food service, office (bank, law, professional services, technology), personal services (yoga studios, gyms, salons/barber shops), manufacturing (small and large scale), non-profits and non-governmental agencies, universities, real estate and tourism. Business focus group participants could be business owners or business representatives in leadership positions that felt comfortable speaking on behalf of the business. Local partners were notified that each focus group would be conducted in English and would take place after normal business hours—that is, sometime between 6:00 PM and 8:00 PM local times. However, if requested in advance, local partners were made aware of the ability for VTC staff to conduct focus groups exclusively in Spanish. Local partners were given the option of hosting the business focus group meeting during the weekday or weekend. All focus group participants were required to fill out and sign a Rutgers IRB-approved video and audio permission form prior to the start of the focus group and complete a demographic survey upon completion of the focus group. Food, drinks, and childcare services were also be provided to participants of the focus group, where applicable.

As was the case for this project, the researcher takes a peripheral role to facilitate a group discussion among the participants through both open-ended and close-ended questions. Focus groups, structured in this way, are valuable for research because they shed light on participants’ values, beliefs, experiences, and identity/representation in ways that quantitative research cannot. As this research shows, the group discussions reveal how intersectionality of race/ethnicity, gender, class, age, religion, disability, and other identities impact experiences and perceptions of bicycling, and how different City’s history and geographic contexts contribute to specific issues and concerns. In addition, by conducting focus groups with higher proportions of Black/African American, Hispanic/Latino, lower income, and female participants – populations that are historically more marginalized and vulnerable in cycling spaces – the research team could gain a deeper and more nuanced understanding of the physical, social and cultural barriers to bicycling and develop recommendations for cities to make bicycling more inclusive and equitable.
This section summarizes results from two different surveys that were administered to participants in the community and business focus groups. The community focus group survey included demographic questions, as well as questions centered on bicycling frequency, trip purpose, and preferred bicycle type. The business focus group survey gathered background information about participants’ businesses and included questions on employee transportation modes and policies. Both surveys inquired about support for bicycle infrastructure improvements and investments. The survey results help to contextualize the focus group responses.

1 Because not all survey questions were answered by all participants, the percentages in all tables were calculated with the total number of responses of each question and not the total number of participants from the focus group.
Focus Group Demographics

The tables on the next two pages show the demographic makeup of the participants in all community focus groups. It is important to note that five of the cities – Baltimore, Fort Collins, Memphis, Portland, and Tucson – had a higher share of minority participants (Non-white or Hispanic) compared to that in the respective cities as a whole. The biggest difference was observed in the case of Portland that had majority Black/African American participants (75%), while a little more than three quarters of the city’s population is White.

### Three of the Cities Had Majority Black/African American Participants

<table>
<thead>
<tr>
<th>City</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Baltimore</td>
<td>71%</td>
</tr>
<tr>
<td>New Orleans</td>
<td>57%</td>
</tr>
<tr>
<td>Portland</td>
<td>75%</td>
</tr>
</tbody>
</table>

### Three of the Cities Had Majority White Participants

<table>
<thead>
<tr>
<th>City</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Austin</td>
<td>55%</td>
</tr>
<tr>
<td>Denver</td>
<td>67%</td>
</tr>
<tr>
<td>Fort Collins</td>
<td>80%</td>
</tr>
</tbody>
</table>

**Focus Group Participant Demographics/Survey Results**

Eighty percent or more of participants in Portland, Providence, and Tucson, and close to two-thirds of participants in Austin, Baltimore, and Memphis had household incomes of less than $49,000.

Higher incomes were more common in Fort Collins and Denver, with more than half of all participants reporting annual household incomes between $75,000 and $149,000.

Six of the cities – Austin, Baltimore, New York, Portland, Providence, and Tucson – had a higher share of participants earning $49,000 or less compared to that in the respective cities as a whole.

Portland had the largest difference with 83.3% of the focus group participants earning $49,000 or less, while 41.7% of the city’s population belongs to this income group.

Two of the cities – Portland and Tucson – had a higher share of participants who had not attended college compared to that in the respective cities as a whole.

**Most focus groups had high shares of participants in lower income ranges**

- 80% of participants in Portland, Providence, and Tucson, and close to two-thirds of participants in Austin, Baltimore, and Memphis had household incomes of less than $49,000.

**Most community focus groups had high educational levels**

- 50% of participants in Portland, Providence, and Tucson had high educational levels, which means at least half of all participants with a four-year college degree or a graduate degree.

- Around 50%-60% of Portland and Tucson participants, however, had some high school or a high school degree/equivalent.

- Two of the cities – Portland and Tucson – had a higher share of participants who had not attended college compared to that in the respective cities as a whole.

**Focus Group Participant Demographics**

<table>
<thead>
<tr>
<th>City</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Memphis</td>
<td>50/50</td>
</tr>
<tr>
<td>Providence</td>
<td>0/27%</td>
</tr>
<tr>
<td>Austin</td>
<td>0/27%</td>
</tr>
<tr>
<td>New Orleans</td>
<td>0/27%</td>
</tr>
<tr>
<td>Denver</td>
<td>89%</td>
</tr>
<tr>
<td>Fort Collins</td>
<td>83%</td>
</tr>
</tbody>
</table>

**Focus Group Participant Demographics**

- Memphis and Providence had balanced participation by those who identified as White and Black/African American.

- Austin had no Black/African American participants but had some representation (27%) of Native Hawaiian/Other Pacific Islander participants.

- Similarly, while New York City did not successfully recruit Black/African American participants, there was representation by Asian/Pacific Islander participants (27%).

- Tucson (89%) was the only focus group with more than half Hispanic participants.
## Community Focus Group Demographic Results

### Race & Ethnicity

<table>
<thead>
<tr>
<th></th>
<th>Austin</th>
<th>Baltimore</th>
<th>Denver</th>
<th>FL Collins</th>
<th>Memphis</th>
<th>New Orleans</th>
<th>NY City</th>
<th>Portland</th>
<th>Providence</th>
<th>Tucson</th>
<th>All Participants</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total</strong></td>
<td>11</td>
<td>9%</td>
<td>14</td>
<td>11%</td>
<td>9</td>
<td>7%</td>
<td>16</td>
<td>13%</td>
<td>12</td>
<td>10%</td>
<td>8</td>
</tr>
</tbody>
</table>

### Ethnicity

- **White**
  - 6 (55%)
  - 2 (14%)
  - 6 (70%)
- **Hispanic**
  - 0 (0%)
  - 1 (7%)
- **Non-Hispanic**
  - 6 (55%)
  - 5 (56%)
- **Black/African American**
  - 0 (0%)
  - 10 (71%)
- **Asian & Pacific Islander**
  - 0 (0%)
  - 1 (7%)
- **Native Hawaiian & Other Pacific Islanders**
  - 3 (27%)
  - 0 (0%)
- **Other**
  - 0 (0%)
  - 1 (7%)
- **Multi-racial**
  - 2 (18%)
  - 0 (0%)
- **Hispanic**
  - 5 (45%)
  - 6 (43%)
- **Non-Hispanic**
  - 6 (55%)
  - 8 (57%)

### Annual Household Income

- **Less than $25,000**
  - 3 (27%)
  - 4 (29%)
  - 1 (13%)
- **$25,000-$49,999**
  - 4 (36%)
  - 5 (36%)
  - 2 (25%)
- **$50,000-$74,999**
  - 1 (9%)
  - 2 (14%)
  - 1 (13%)
- **$75,000-$99,999**
  - 2 (18%)
  - 2 (14%)
  - 1 (13%)
- **$100,000-$149,999**
  - 1 (9%)
  - 1 (7%)
  - 3 (38%)
- **$150,000-$249,999**
  - 0 (0%)
  - 0 (0%)
  - 0 (0%)
- **$250,000 or more**
  - 0 (0%)
  - 0 (0%)
  - 0 (0%)

### Education

- **Less than High School**
  - 0 (0%)
  - 2 (14%)
- **High School Graduate/GED**
  - 0 (0%)
  - 3 (21%)
- **Some College/Vocational**
  - 4 (36%)
  - 1 (7%)
- **Two-Year College Degree**
  - 0 (0%)
  - 1 (7%)
- **Four-Year College Degree**
  - 6 (55%)
  - 6 (43%)
- **Graduate Degree**
  - 1 (9%)
  - 1 (7%)

### Gender

- **Male**
  - 3 (27%)
  - 7 (54%)
- **Female**
  - 8 (73%)
  - 6 (46%)
- **Trans**
  - 0 (0%)
  - 0 (0%)

### Marital Status

- **Single**
  - 8 (73%)
  - 11 (79%)
- **Married/Civil Union**
  - 3 (27%)
  - 1 (7%)
- **Living with a Partner**
  - 0 (0%)
  - 2 (14%)

### School-Age Children in Household

- **Yes**
  - 2 (18%)
  - 6 (43%)
  - 4 (44%)
- **No**
  - 9 (82%)
  - 8 (57%)
  - 5 (56%)

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*peopleforbikes*
Most of the community focus groups had a relatively even distribution between female and male participants, which is comparable to the demographics of the host cities as a whole.

Four groups, including Austin, Portland, Providence, and Tucson, had much larger percentages of female participants. In addition, all cities except for Fort Collins and Denver had at least half of the participants who were single. Denver (67%), New Orleans (50%) and Fort Collins (44%) had the highest rates of participants by those married or in a civil union. Two of the cities – Denver and Fort Collins – had a smaller share of single participants compared to that in the respective cities as a whole. With the exception of Portland, groups had higher shares of childless participants. In particular, Austin, Fort Collins, Memphis, and New York City had more than three-fourths of participants without school-age children.

Comparing the demographic makeup of the participants in the Portland community focus group with the city as a whole showed that the participants were predominantly Black/African American, lower income, less educated, and females, while a majority of the city’s population is relatively White, higher income, more educated, and has a higher percentage of males. Findings from these participants, as will become evident in the upcoming sections in the report, highlight key and unique differences between their overall bicycling perceptions and behaviors than the overall bicycling trends known for Portland. Compared to the city as a whole, Tucson was another city that had a higher share of Hispanic, lower income, less educated, and female participants.

| Age Distribution (Community & Business Groups combined) |
|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|
| | 18-24 | 25-44 | 45-64 | 65+ | Total |
| Austin | 2 | 12% | 7 | 41% | 7 | 41% | 1 | 6% | 17 |
| Baltimore | 1 | 3% | 21 | 68% | 7 | 23% | 2 | 6% | 31 |
| Denver | 1 | 6% | 7 | 44% | 4 | 25% | 4 | 25% | 16 |
| Fort Collins | 1 | 4% | 10 | 36% | 17 | 61% | 0 | 0% | 28 |
| Memphis | 2 | 10% | 9 | 45% | 6 | 30% | 3 | 15% | 20 |
| New Orleans | 1 | 6% | 5 | 28% | 10 | 56% | 2 | 11% | 18 |
| New York City | 0 | 0% | 5 | 33% | 9 | 60% | 1 | 7% | 15 |
| Portland | 2 | 10% | 17 | 81% | 2 | 10% | 0 | 0% | 21 |
| Providence | 6 | 60% | 2 | 20% | 1 | 10% | 1 | 10% | 10 |
| Tucson | 6 | 22% | 11 | 41% | 6 | 22% | 4 | 15% | 27 |

TOTAL: 203

The following table combines the age data of all 200+ participants. Most cities had three-quarters or more of their participants in the 25-44 and 45-64 age ranges. The Baltimore, Portland, and Tucson groups had younger populations – with at least sixty percent of participants under 44 years old. Providence had the youngest participants, with 60% under 24, while Denver had the highest representation of those at least 65 years old.
More than three-fourths of participants in most community focus groups learned to ride a bicycle by age 12 and most participants in all groups knew how to bicycle.

Portland participants had especially low bicycling rates, with one-half of participants riding very rarely or never. This is important to note considering that, according to PlacesForBikes City Ratings data, Portland had the highest Total Ridership score of 4 out of 5 among the ten cities (see Figure 1), indicating that bicycling is the most common among its residents compared to other cities. More than half of the participants in Fort Collins, New Orleans and New York City bicycled very frequently to frequently, while at least half of those in Baltimore, Providence, and Tucson bicycled rarely or occasionally. Portland participants had especially low bicycling rates, with one-half of participants riding very rarely or never. This is important to note considering that, according to PlacesForBikes City Ratings data, Portland had the highest Total Ridership score of 4 out of 5 among the ten cities (see Figure 1), indicating that bicycling is the most common among its residents compared to other cities.

<table>
<thead>
<tr>
<th>CITIES</th>
<th>Very Frequently to Frequently</th>
<th>Occasionally to Rarely</th>
<th>Very Rarely to Never</th>
</tr>
</thead>
<tbody>
<tr>
<td>Austin</td>
<td>27%</td>
<td>45%</td>
<td>27%</td>
</tr>
<tr>
<td>Baltimore</td>
<td>21%</td>
<td>50%</td>
<td>28%</td>
</tr>
<tr>
<td>Denver</td>
<td>44%</td>
<td>44%</td>
<td>11%</td>
</tr>
<tr>
<td>Fort Collins</td>
<td>80%</td>
<td>13%</td>
<td>7%</td>
</tr>
<tr>
<td>Memphis</td>
<td>33%</td>
<td>42%</td>
<td>25%</td>
</tr>
<tr>
<td>New Orleans</td>
<td>61%</td>
<td>14%</td>
<td>14%</td>
</tr>
<tr>
<td>New York City</td>
<td>61%</td>
<td>38%</td>
<td>0%</td>
</tr>
<tr>
<td>Portland</td>
<td>17%</td>
<td>25%</td>
<td>58%</td>
</tr>
<tr>
<td>Providence</td>
<td>40%</td>
<td>50%</td>
<td>10%</td>
</tr>
<tr>
<td>Tucson</td>
<td>6%</td>
<td>84%</td>
<td>11%</td>
</tr>
</tbody>
</table>
Community focus group participants were asked to choose their main purposes of bicycling from four options: utility, recreation, exercise/fitness, and racing.

Most participants chose more than one option. Recreation stood out as the most popular option across the board, chosen by 30-55% of participants, followed by exercise/fitness, chosen by 18-40% of participants, while utility was chosen by the lowest share of participants (less than 20%) in five groups, but was relatively high in Austin (38%), Denver (38%), and New Orleans (45%). Comparably, according to PlacesForBikes City Ratings data, seven of the ten cities were found to have a higher ridership score for recreational trips than bike-to-work trips (see Figure 2). New Orleans was one of the two cities that had a higher ridership score for bike-to-work trips. Portland, on the other hand, had the highest bike-to-work ridership score among the ten cities; however, its focus group had the lowest share (9%) of participants who rode for utilitarian purposes.

Community focus group participants were also asked to indicate their bicycle preferences from four options: a cruiser bike, a folding bicycle, a road/touring/hybrid bike, and an MBX/Mountain/Cyclo-cross bike. The road/touring/hybrid bike was the most commonly selected.
Community group participants were asked to indicate the level of community support for bicycling investments and polices. Business group participants were similarly asked to indicate whether and how improvements in bicycle infrastructure would impact their businesses. With the exception of the New York City business group, which had only two participants, well over half to almost all participants from both community and business focus groups had supportive/positive views of bicycle infrastructure investment.

<table>
<thead>
<tr>
<th>CITIES</th>
<th>Very Negatively</th>
<th>Negatively</th>
<th>No Change/Effect</th>
<th>Positively</th>
<th>Very Positively</th>
</tr>
</thead>
<tbody>
<tr>
<td>Austin</td>
<td>0%</td>
<td>0%</td>
<td>0%</td>
<td>80%</td>
<td>20%</td>
</tr>
<tr>
<td>Baltimore</td>
<td>0%</td>
<td>7%</td>
<td>7%</td>
<td>43%</td>
<td>43%</td>
</tr>
<tr>
<td>Denver</td>
<td>0%</td>
<td>11%</td>
<td>0%</td>
<td>33%</td>
<td>56%</td>
</tr>
<tr>
<td>Fort Collins</td>
<td>0%</td>
<td>0%</td>
<td>0%</td>
<td>25%</td>
<td>75%</td>
</tr>
<tr>
<td>Memphis</td>
<td>0%</td>
<td>8%</td>
<td>0%</td>
<td>42%</td>
<td>50%</td>
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<tr>
<td>New Orleans</td>
<td>0%</td>
<td>14%</td>
<td>0%</td>
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<td>57%</td>
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<tr>
<td>New York City</td>
<td>9%</td>
<td>9%</td>
<td>0%</td>
<td>27%</td>
<td>55%</td>
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<tr>
<td>Portland</td>
<td>8%</td>
<td>8%</td>
<td>25%</td>
<td>33%</td>
<td>25%</td>
</tr>
<tr>
<td>Providence</td>
<td>0%</td>
<td>0%</td>
<td>0%</td>
<td>50%</td>
<td>50%</td>
</tr>
<tr>
<td>Tucson</td>
<td>6%</td>
<td>6%</td>
<td>18%</td>
<td>47%</td>
<td>24%</td>
</tr>
</tbody>
</table>

Do You Think Improvements in Bicycling Infrastructure will Impact Your Business?

<table>
<thead>
<tr>
<th>CITIES</th>
<th>Supportive</th>
<th>Neutral</th>
<th>Concerned</th>
<th>Not Sure</th>
<th>Other</th>
</tr>
</thead>
<tbody>
<tr>
<td>Austin</td>
<td>83%</td>
<td>17%</td>
<td>0%</td>
<td>0%</td>
<td>0%</td>
</tr>
<tr>
<td>Baltimore</td>
<td>76%</td>
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Most participants worked either in small businesses, with 20 or fewer employees, or large businesses with over 150 employees.

Most groups had fewer to no participants from the retail, personal service, financial services, lodging, restaurant, or manufacturing sectors. There was greater participation in professional services/offices, with 10-30% of participants in Austin, Baltimore, Fort Collins, Memphis, and Tucson from this sector and 44% from Denver. Most participants, however, selected “Other” as their business type. In terms of business size, most participants worked either in small businesses, with 20 or fewer employees, or large businesses with over 150 employees.

Furthermore, participants were also asked to give their best estimate of the shares of customers and employees that reached their businesses via various transportation modes (walk, bicycle, transit, drive, rideshare services, etc.). Driving was the dominant transportation mode for most employees and customers. Most participants estimated less than 20% of their employees and customers walk or use rideshare services to reach their businesses. While the estimated share of customers who bicycle or use transit was generally in the 0% to 20% range, estimates for the share of employees who bicycle or use transit to get to work were often higher.
The following section summarizes the discussions from the 19 focus groups with community and business focus group participants. Discussions explored participants’ travel patterns, perceptions of bicyclists, access to and experiences with bicycling, as well as feedback on the relative safety of bicycling infrastructure, and perceived barriers to bicycling. Conversations also cover topics such as representations of bicycling and bicyclists in print/social media, the effectiveness of current bicycle safety education and enforcement programs, and views on bicycle infrastructure investments.
The majority of participants indicated that walking and biking are their ideal forms of transportation.

Most participants in New Orleans, New York City, Baltimore, and Portland indicated that they live in urban areas, while most participants in Providence and Fort Collins described their neighborhoods as more suburban. Participants from other cities lived in a combination of urban and urban/suburban areas. Regardless, most participants live near transit, school, shopping, and other amenities, and most noted that they tend to combine trips when driving, especially when doing errands. Participants who do not regularly drive are less able to combine trips due to the difficulty of carrying heavy items, such as groceries. Across all of the focus groups, the majority of participants indicated that walking and biking are their ideal forms of transportation. Some also included public transit as an ideal form of transportation, especially for longer trips. Fewer participants stated a preference for e-scooter/e-bikes, and a few people consider driving their preferred mode of transportation.
BICYCLE USE & ACCESS

Bicycle Ability
The Portland community focus group had the highest percentage of people who don’t know how to ride a bike (42%) or who haven’t ridden a bike in the past year (83%). This illustrates the wide variations of bicycling experience in Portland, a city generally considered among the most bicycling-friendly and bicycling-centric in the US. The Portland participants without any prior bicycling experience all identified as Black/African American Muslim females who shared that they were afraid to learn due to a fear of falling. Most community and business focus group participants know how to ride a bicycle and have access to a bike or own a personal bicycle. There were slightly more participants in the community groups than the business groups who don’t know how to bike or have not ridden a bicycle in the past 12 months.

Experience
When asked about the experience of riding itself, most participants indicated that they enjoy bicycling. Descriptions of this joy includes proximity to nature, getting in shape, and de-stressing. One New Orleans participant described that she loves bicycling because “being a part of nature...you notice things. It’s like you are up in the air, like on a carpet.” Another participant remarked, “I might be soaked to the bone, but it’s too fun [to bicycle]!” Despite the joy of bicycling that is generally shared, female participants from the Tucson business group noted that they felt unsafe while bicycling due to lack of traffic safety and overall poor road conditions. Participants who had not ridden in the past year provided several reasons, including feeling unsafe in traffic, lack of experience in fixing a bike, health issues, or lack of interest.
Reactions from Family and Friends if Participants Start to Bicycle

Community focus group participants anticipated that they would receive a mix of reactions from family and friends if they started bicycling to work or social engagements. While some friends and family would be supportive, most participants thought family members, especially those who don’t bicycle on a regular basis, would be concerned and worried about their safety on the road and/or think they are “crazy” and “hilarious” for deciding to start biking. As one participant from the New Orleans group said, “I think they will think that is hilarious. I love my car, so for me to give that up, they will think that I will be way out of character.” Because of family members’ negative reactions to riding in traffic, some participants stated that they would not share with family members that they are bicycling for utilitarian purposes. As one Baltimore participant remarked, “I don’t tell anybody because I have been forbidden, and I am an adult, by my 75-year-old father to ride on the streets. I just tell him that I am on the trail. I don’t tell anybody that I am riding on the streets because they will be opposed and concerned.” In addition, many Black/African American and Hispanic/Latino participants indicated that their family members would not have a positive reaction if participants started bicycling because family members associate bicycling with whiteness. As one Portland participant commented, “Most people would be like, that’s a White thing, why do you want to do that?” While some participants said that their friends would also be concerned and/or not supportive, overall responses showed more support from friends than family members.
FACTORS THAT PREVENT PARTICIPANTS FROM BICYCLING MORE FREQUENTLY; COMMUNITY GROUPS

Community Focus Group

There was consensus across the groups that time – both time to get to destinations and time of day – was the biggest factor influencing travel mode decisions, followed by distance, weather, and concerns about personal and traffic safety. The other factors commonly discussed were cost of travel, traffic congestion, convenience, and mood/state of mind.

Several additional barriers prevent participants from bicycling more frequently or at all, including the lack of safe bicycle infrastructure, incomplete street connectivity, poor availability of bicycles, and hygiene concerns. Some participants, such as those in Denver, do not bicycle more frequently due to prior experiences with near-hits or crashes with drivers. While some participants with children ride with a children carrier/trailer, most do not due to childcare and other care responsibilities. The vast majority of participants (i.e., more than 70% of participants in Austin and more than 80% of participants in both New York and Tucson) do not bicycle due to concerns about personal hygiene or arriving at work sweaty.

Consistent with the focus group findings, PeopleForBikes US Bicycling Participation study found heavy traffic, hostile driver behavior, and poor road conditions as some of the most common barriers to bicycling. One additional factor that was identified was the absence of desired destinations where people can bicycle to in their communities. The study also found that these barriers prevented females from riding more than males. The PlacesForBikes Bike Network Analysis (BNA) scores for nine of the ten focus group cities is also either low or moderate, except for Fort Collins that had a relatively high BNA score of 3.2 (see Figure 3), indicating that the quality of bike infrastructure in most of the cities is not very high.

Furthermore, lack of ability to repair and maintain bicycles also prevents participants from bicycling. As one woman noted, "I have friends who [bicycle] commute, and they have definitely gotten flats. I just thought about that happening to me and being lost and stranded. Not getting to work on time, not having anyone to help, being stuck with my bike." Another participant from New Orleans also indicated that "there are a lot of bicycle maintenance courses and promotional efforts to make sure that people can learn how to maintain their bikes, which is a big barrier to cycling regularly."
Participants were asked to identify disincentives to commuting via bicycle. One big challenge that most participants identified was the lack of safe and protected bike lanes. Even in cases where bike lanes are proximate to the workplaces, participants expressed concerns about the safety of these facilities. Participants noted that bicycle lanes are often unprotected and unsafe to ride due to the lack of traffic safety, illegally parked delivery vehicles, and poor road conditions. In line with participants’ concerns, 47% of the respondents in the US Bicycling Participation study reported that they would be more likely to ride if bicycling is physically separated from motor vehicles. Additionally, 47%-58% of the respondents reported the same in the Bicycling Participation studies for Austin, Denver, New Orleans, and Providence.

The lack of safe bicycle parking was another challenge. While many businesses have outdoor bike racks near their entrances or on adjacent streets, participants considered them unsafe. As one Baltimore participant pointed out, “Even though we have security cameras on our outdoor bike racks, we regularly have bikes stolen from the hospital. That’s a barrier for people who ride bikes.” A few participants also remarked that work schedules, especially late-night shifts, prevent many employees from bicycling more frequently due to concerns about riding at night. As one Memphis participant commented, “We have people that get off work at 2:00 am; they may ride their bikes to work…but then they have to either take public transportation or get a lift home.”

In addition, concerns about personal hygiene are another key challenge that participants pointed out. Women were especially concerned about showing up to work sweaty because they are expected to dress professionally and “look perfect.” Some participants noted that having a shower in business and office locations would attract more people to bicycle commuting. As one female participant indicated, “to presentation, there is a big gender element to that. Men can show up a little sweaty. It’s kind of okay. There is definitely an element of women needing to show up in the professional context looking pretty much perfect.” Other factors that were mentioned in most business groups include weather, childcare responsibilities before and after work, and other trips that need to be done during work that couldn’t be done by bicycle.
Employer Provided Benefits

Given the numerous barriers to bicycling that participants and their employees face, participants were asked to indicate if their businesses provide benefits or incentives to encourage bicycle use. Denver had the highest share of companies represented (67%) that offered bicycle-related incentives. A little less than half of businesses represented in the Fort Collins, Portland, and New Orleans groups, and only one to two businesses each from the Austin, Tucson, Baltimore, Memphis, and New York groups provide benefits to encourage bicycling. Some companies offer employees commuter and transit checks if they commute by bike or by other alternative forms of transportation, such as transit, carpooling, and/or van share. Other incentives include bonus points for staff to exchange electronic or other swag items and discounts on bicycle accessories. Some participants shared that they tried to advocate for bicycle-related incentives but faced considerable resistance from their employers.

Despite the range of support for bicycle commuting incentives, most participants felt that the private sector could play an essential role in encouraging bicycling. Many participants commented that more employees would ride to work if secure bicycle parking is provided. Participants from Austin pointed out that safe bicycle parking means that it is in a safe location and is highly visible. Other aspects of safe bicycle parking include covered parking, ease of use of bicycle locks, and the availability of a bike cage for long-term (overnight) storage. In addition, having showers in business facilities would also address employees’ concerns about dress and presentation at work. Finally, participants noted that businesses could help to raise awareness about bicycle safety by hosting bicycle safety workshops for employees.
More in-depth discussions about bicycle infrastructure were carried out in both the community and business focus groups. Community participants were asked to indicate areas where they feel most comfortable bicycling. Consistent with prior research on perceived safety and comfort, participants are most comfortable riding on physically separated facilities (trails/bicycle paths, cycle tracks, protected bicycle lanes), in parks, and on low-stress/low-traffic neighborhood streets. Streets considered the least safe include high-speed and/or high-volume roads, such as major arterials. In New York City, almost half of the participants indicated that they feel comfortable bicycling on sidewalks, which was not mentioned as frequently in other cities. The Tucson group expressed the least comfort with bicycling, with about a quarter of participants not feeling comfortable bicycling anywhere in the city. This was interesting considering the city had a fairly high score of 3.5 for the community’s perception of the local bike network and a moderate BNA score of 2.3 (see Figure 3). On the other hand, two-thirds of the New Orleans participants shared that they feel comfortable riding almost anywhere in the City compared to three-fourth of the respondents in the New Orleans Bicycling Participation Study, who indicated that they were able to find good places to ride in the city.
The lack of inclusive representation and community input in the infrastructure decision-making process was a major concern.

Investments are not directed towards low-income communities of color, and when they are, participants felt that residents are not made aware of infrastructure decisions prior to construction. This lack of community outreach and engagement has contributed to strong associations of bicycle infrastructure with gentrification processes. As one Black/African American participant from Baltimore stated, “In other parts of the city...where there are just people living and those people are people of color, they see the investments aren’t being made in their communities, they see that there’s an inequity of investment and that is a real problem...Until we get ahead and build support with real mindfulness, I think that we’re going to continue to have these issues about bike lanes being for White people.” Baltimore also had the second lowest PlacesForBikes Reach score of 1.7 among the ten cities (see Figure 4), indicating that the city’s bike network does not serve its disadvantaged populations as well as other populations. Portland had the lowest Reach score of 1.6, highlighting the disparities in the availability of bike network across communities that is also reflected in the bicycling trends and perceptions observed in this study. A similar dynamic was discussed in the Denver group, where one participant noted that “when you start to talk about investing in neighborhoods that haven’t had any infrastructure investment in a long time, bike lanes and bicycle infrastructure quickly become a means of gentrification.”

Except for participants in the Baltimore and New York business groups, the majority of participants agreed that investing in bicycling infrastructure is beneficial. Explanations for the perceived benefits of infrastructure investments include mode share offsets/declines in motorized traffic and reduced demand for car parking. As one participant from Portland stated, “In terms of traffic with increased density, you can’t just keep adding cars and not run out of space. Bicycling is just more accommodating to increase density somewhere.” Participants also related bicycle infrastructure with improvements in health and community resiliency, sustainability, and accessibility. One participant from New Orleans noted that “increasing bicycle infrastructure improves the resiliency of our community. It is a sustainable approach to economic development in the City, and the City needs to place funds and resources to things that are sustainable.”

Despite identifying those benefits, participants also pointed out several challenges and concerns. Participants noted that the lack of available funds and scarcity of bicyclists are significant challenges in getting cities to prioritize investing in bicycle infrastructure. The PeopleForBikes Opinion surveys for Austin, New Orleans, and Providence also echoed these concerns as a majority of the respondents in each city strongly agreed/agreed that the city should consider and invest more in alternative modes of transportation. However, when asked about government funding of transportation infrastructure, at least one-third of the respondents in each of the cities indicated that the city needs to spend more on bicycle lanes/infrastructure, though a substantially higher share (at least two-thirds) of the respondents indicated the same for roads/bridges. In addition, some focus group participants felt that adding bicycle lanes on narrow streets initially designed for cars could worsen traffic and endanger the safety of both drivers and bicyclists. Participants also identified the addition of bike lanes in place of on-street parking spaces as a significant challenge.

The reach score goes from zero to five. Reach measures the size and equity of a city’s cycling network.

Essentially: Is it possible to bike where you want in a safe, connected network? Does that network of lanes and paths reach all parts of the city, including historically underserved and low-income neighborhoods?
The following section covers both community and business group participants’ perceptions of a typical cyclist and bicyclists in the community, as well as business focus group participants’ views about bicyclists who patronize their businesses.

Perceptions of the Typical Cyclist

When asked to envision the typical cyclist, participants described a range of images and perceptions. The dominant initial perception of a “typical cyclist” was a White, spandex-clad male, followed by characterizations of White female and non-White male cyclists. A small minority of participants did not see “color” in their images of a typical cyclist, and even fewer described a non-White woman. In addition to racial/ethnic differences, most described the typical cyclist as someone riding for recreational or commuting purposes.

In a few of the cities, more business group participants were more likely to include Black/African American and/or Hispanic/Latino as the typical cyclist relatively to community groups who tended to picture a White person. For instance, the Memphis business and community focus groups show a stark contrast in their descriptions of typical cyclists—there was only one mention of a person of color on a bicycle in the community group, and only three characterizations of a White bicyclist in the business focus group. The following describes some of the different perceptions of the typical cyclist that were most frequently characterized across all groups.

3 While participants have different perceptions and images they ascribe to “cyclists” and “bicyclists,” except for this section, these terms are used interchangeably in this report.
While some participants immediately thought of the White hard-core recreational cyclist as the “typical cyclist,” some of them realized that this is not what they see regularly. As a Fort Collins participant commented, “What I first thought of was a middle-aged lycra guy, but when I really thought about it for a couple of minutes, I realized that is not what I see day to day. I see families and I see all kinds of people using bikes.” A similar sentiment was echoed in the Denver community focus group. As one participant described, “There are significant riders of color on our trails and streets, but it is just not in our mind. Often times, they are going to their work sites very early in the morning and coming home late at night after dark, and you just don’t associate that when you see office people coming to downtown.” These comments reveal the strong stereotypes of bicyclists as a White, athletic, and male, despite the diverse populations that bicycle in the cities. This finding resonates with the US bicycling Participation study in which a higher percentage of Black/African American and Hispanic/Latino participants reported riding a bicycle in the last 12 months compared to White respondents. Furthermore, the average frequency of bicycling among Black/African American respondents was found to be considerably higher than White and Hispanic/Latino respondents.

“Lycra-clad, skinny White guy.”

Many participants pictured a White, middle-aged, skinny male cyclist in spandex/lycra, wearing bicycle shoes and a helmet, and riding an expensive road bike. These images included references to being really fit, well-trained, fast, and following bicycle safety etiquette (such as using hand signals). For instance, one Austin participant described the typical cyclist as a “lycra-clad, skinny White guy.” A few participants from other groups referred to “Lance Armstrong” or “Tour de France” to describe their image of a typical cyclist. In focus groups with more White participants (ex. Baltimore and Fort Collins business focus groups), participants could relate to this image. In contrast, focus groups with more participants who identified as Black/African American and/or Hispanic/Latino did not see themselves represented in such an image. Overall, there were rarely mentions of people of color as skilled cyclists donning bicycle gear and using high-end bicycle equipment, partly because many Black/African American and Hispanic/Latino participants associated these trappings with whiteness.
PERCEPTIONS OF CYCLISTS/BICYCLISTS PERSPECTIVES

“A middle-aged White recreational rider with a smile on her face.”
While there were some mentions of hard-core, serious female cyclists, most participants characterized recreational White female bicyclists as more laid-back and relaxed, often dressed in casual clothes. For instance, one Baltimore participant described the typical cyclist as “a middle-aged White female recreational rider with a smile on her face.” Some went so far as to portray a multi-tasking, inattentive women. As one business focus group participant from Fort Collins described, “The gal in a skirt, without the helmet, checking her phone, maybe pulling the dog on the other hand on the leash.” Another participant from Tucson’s community focus group equated a woman on a fancy bike with White-passing: “White-passing lady on a fancy bike with a helmet and fancy bike shoes.”

“Caucasian, young, hippy looking, tattoos.”
Another commonly held perception of the typical cyclist is that of a young, often White, hippy-looking, man wearing street clothes, perhaps without a helmet. For example, participants from the New Orleans focus groups described someone who is “Caucasian, young, hippy looking, tattoos, wild outfits,” often with “ambiguous ethnicity.” In this scenario, participants see people bicycling as reflective of a socially hip or health-/environmentally-conscious lifestyle. As another New Orleans participant remarked, “People who are trying to live an ‘alternative approach’ to life...a few people ride because it’s socially hip type of thing as opposed to hardcore commuters or transportation.” There were no references to hip cyclists that included women.
“Bicyclists are people like me, regular people.”

In addition to characterizations of recreational, hipster, and/or serious cyclists, some participants imagined the typical bicyclist as looking “pretty normal” - most of them wearing casual clothes and bicycling to commute to and from work/school without expensive gear. Participants included both men and women in descriptions of bicyclists as regular people, though most saw a White person. Overall, more participants could identify themselves under this particular description of a typical bicyclist, and some made it clear that they would not use the term “cyclist” to describe themselves, as “cyclist” denotes someone who trains seriously. They would use the term “bicyclist” to describe regular people who might not be as skilled or hard-core.

**TYPICAL DESCRIPTIONS INCLUDE:**

“I pictured somebody who looks pretty normal.” [Baltimore]

“Bicyclists are people like me, regular people who ride. Cyclist will be those professional people, like in those marathons or races. They wouldn’t call themselves a bicyclist.” [New Orleans]

“Middle Age, 40 years old, White software engineer, backpack on, coming from work, no helmet.” [Baltimore]

“I saw literally myself. 30 something, White woman riding to work.” [Baltimore]

“White male, on his way to work, messenger bag, khakis, some Sperry’s.” [Providence]

“Male, Mexican, no helmet, jeans, simple bike, circle K cut.” [Tucson]

“A guy in his early 20s wearing a helmet, tight-fit clothes, short sleeve shirt...with a career-style backpack” [Austin]
“...Black man, may not be adhering to the rules of the road.”

Another common perception of the typical bicyclist that was expressed in several groups is that of a Black/African American and/or Hispanic/Latino person, usually male, who ignores traffic regulations, such as riding on the wrong side of the street, on the sidewalk, and not wearing a helmet. Bicycles are of a basic type and in poor condition in this image, and the bike is their primary mode of transportation because they can't afford to own a car. Some participants took this stereotype further and pictured people who are homeless and use their bicycles to carry all of their personal belongings.

QUOTES TYPICAL OF THIS PERCEPTION INCLUDE:

“I see older middle-age Hispanic guys. Old clunky bikes, rusted chains, not-too-high gear, riding on the sidewalk, with a plastic bag hanging off the handlebar. Doesn’t picture himself as a cyclist, but it’s how he gets to the grocery store.” [Austin]

“My first sight was an African American riding on the wrong side of the street with no helmet.” [Memphis]

“A mixture of young African American boys, usually about half of them acting like a fool and also Latinos...[acting like a fool] looks like not looking out for traffic, coming out from the side streets to the point that they couldn’t stop.” [Memphis]

“I saw a person of color, a homeless person, with their bicycles carrying a little cart with all of their belongings.” [Tucson]
In addition to exploring typical images and perceptions of bicyclists in a generic sense, participants were also asked about their thoughts on cyclists in their local community.

Views varied widely, from many seeing local bicyclists as brave and fearless for riding in traffic, to participants having concerns about safety, and some expressing joy in seeing young children having fun bicycling. In general, participants in the business groups tended to identify concerns or even negative experiences with cyclists in the community, while community group participants were more likely to provide positive feedback about cyclists in the community.

They are riding because they have to...

Participants had varying perceptions about those who bicycle as a mode of transportation. Some viewed those who commute via bicycle in their neighborhood as financially struggling because they are not able to buy or maintain a car. As an Austin participant expressed, “They are riding because they absolutely have to. If they could afford it, they would have a truck.” Moreover, others characterized those who bicycle for transportation as experienced, fearless, and sometimes lawless on the streets. While some participants were concerned about bicyclists’ safety, others pointed out that bicyclists needed to be a little lawless to protect themselves on the road. As a New York participant stated, “If you are going to ride a bike in the City, you kind of have to be lawless in a way...to protect yourself and to get where you need to go.” New York also had the lowest Safety score of 1.6 out of 5 among the ten cities as per PlacesForBikes City Ratings data (see Figure 4), indicating that bicycle safety is a bigger problem in the city compared to other cities. Some Fort Collins participants indicated that cyclists that are also motorists are more empathetic of bicyclists’ safety on the road because they had experienced bicyclists’ sense of vulnerability while riding in traffic. One participant neatly captured this, “it’s about the vulnerability that you feel on a bike. Once you feel that, it’s hard to forget what that feels like when you are driving.”
PERCEPTIONS OF CYCLISTS IN THE LOCAL COMMUNITY

The pretentiousness of giant packs of spandex-wearing cyclists...

Overall, participants held more sympathetic views of commuting/utilitarian bicyclists compared to recreational cyclists, even to the point of expressing disdain for those who participate in organized group rides. As one Tucson participant described, “Where I work, I see people in this area that are riding their bikes that are just being courageous, and they are taking care of their responsibilities…I will say there are other parts of the city, where, to be honest with you, cycling is not a form of transportation, it’s a form of recreation. In those parts, I don’t see it quite as positively as I do down here where I work. I see…the pretentiousness of giant packs of spandex-wearing cyclists, riding down the road, or going en masse to a place to get a cup of coffee and filling up their water bottles. They just take over.” Another participant from the Memphis business focus group similarly described, “The majority of the cyclists where I live on the country road…are usually in groups. They are going by so fast. Mostly Caucasian, expensive bikes, most of the time in full gear…Now the perception is that the bikes have the right-of-way and people that are driving cars have to watch out…I wish they get out of my life.” These comments mimic the feedback provided in group discussions of images of the typical bicyclist.

People who Enjoy Riding Bikes are My Type of People...

Some participants expressed joy in seeing people using the city’s bicycle infrastructure. Those who ride bicycles themselves felt an instant connection when they see others on bicycles. One New Orleans participant shared that “as an active cyclist, when I see people on bikes, I instantly think this could be one of our friends. People who enjoy riding bikes are my type of people.” Some of them saw other bicyclists as their allies because the city would be more likely to improve bicycle infrastructure if more people ride. As one Baltimore participant commented, “I’m just really happy whenever I see anyone biking. Selfishly, I think the more people that bike, the more bike infrastructure will be needed.” Other participants pictured young children who were having fun bicycling, perceived bicyclists in the community as health and environmentally conscious and were impressed by their commitment to bicycling regularly.
All participants from Austin, around half of those in the Baltimore and Fort Collins groups and one-quarter of participants in Portland were aware of the local spending benefits of bicycling. Even those who were not familiar with this research thought that it made sense.

Participants were asked to describe the demographics of their customers. Most participants indicated that their customer base is diverse in terms of age, gender, and race/ethnicity, though most noted a higher proportion of White customers. Some businesses, such as those in Portland, indicated that they have a higher proportion of Hispanic/Latino customers. Across all focus groups, participants noted that customers who bicycle tend to be younger. A Denver participant described the customer base who is more likely to bicycle as “younger, millennial, working in tech, in 1-50 employee companies that have been around only in the last five years.” However, most participants noted that customers do not travel by bicycle to patronize their businesses. Participants also pointed out that the location of a business, types of goods/services that a business provides, and availability of bicycle parking and bicycle infrastructure, all affect customers’ decision to bicycle.

Participants were then asked to express their views on customers who bicycle. Most provided positive feedback on customers who bicycle and thought they are brave to bicycle in downtown and other busy areas, as described by this Tucson participant, “They are a little more gutsy, especially if it is a woman who is carrying her kids.” Participants who operate or work in businesses that organize events and initiatives related to bicycles/bicycling are particularly excited because not only do they want to promote non-motorized modes of transportation, they feel a personal connection with their customers. Also, several participants pointed out that customers who bicycle do not take up parking spaces, which frees up parking for customers who drive to their businesses.
BROADER BUSINESS COMMUNITY’S PERCEPTIONS ON BICYCLISTS

When asked about how the broader business community perceives bicyclists, most discussions centered on indifferent or negative views towards bicyclists. During these discussions, the business representatives pointed out that a few businesses – mostly newer ones – would be likely to have a more positive image of bicyclists. Most participants felt that the broader business community would have an indifferent to negative view towards bicyclists. Some speculated that most businesses would feel ambivalent towards bicyclists because they don’t consider bicycles to be essential or relevant to business success. As one Austin participant described, “I don’t think it’s on their radar. They have other fish to fry.” Most attendees thought that businesses would have a more negative or hostile view toward bicyclists and bicycle infrastructure due to fears about improvements reducing roadway capacity and/or on-street parking spaces. Further, participants questioned whether the broader business community would see bicycles as a legitimate mode of transportation that can support their businesses, particularly businesses located on busy streets or in more suburban areas. However, as one Tucson participant noted, there are people in the community who rely on bicycles as their primary form of transportation out of necessity – “The overall business community probably sees the mental images of the spandex suits and the White 45-year old guy on the $3000 bike...What is missed...[are] the people who are out there who are just hard-working people, and that is their mode of transportation.” Consistent with this opinion, US Bicycling Participation study found that 46% of the respondents earning less than $20,000 and 39% of the respondents earning between $20,000-$40,000 rode for utilitarian as well as recreational purposes in the past 12 months. Additionally, 13% of the respondents earning less than $20,000 and 10% of the respondents earning between $20,000-$40,000 rode for more than 104 days in the past 12 months. Participants also noted that some businesses have reluctantly accepted bicycles when necessary to attract employees. On the other hand, participants thought that new businesses would generally be more open to bicyclists and expansion of bicycle infrastructure, especially when those businesses are in sectors that align with promoting health and the environment. As one Portland participant conveyed, “Some of the new businesses – we have a new vegan grocery store, a new coffee shop and a new gym opening up - I think the businesses that are more health-conscious are encouraging the health benefits of being active... those kinds of businesses are open to biking.” (continue on next page)
In comparison to the generally negative sentiments that other focus groups shared, participants from the Denver group conveyed that the broader business community was becoming more supportive of bicycling infrastructure. These participants noted that businesses would be supportive of bicycle infrastructure because it provides an alternative mode of transportation that promotes healthy living for their employees, raises property values, and is valuable for companies to get LEED certification for their buildings. In addition, Denver businesses are increasingly providing bicycle-related amenities, such as indoor bicycle parking and showers, because they are signifiers of a quality workplace for prospective employees. As one participant explained, “I think culturally it is changing, you look from a HR perspective, when recruiting, one of the questions that is asked more frequently than ten years ago, is, ‘do you have a place that I can park my bike and is there a parking spot?’...ten years ago, it would be do you get a [car] parking spot.”

In contrast to the perspectives shared in other cities, Fort Collins attendees noted that the broader business community likely has a more favorable view towards bicycles because bicycling is so much a part of Fort Collins’ culture as a sustainable city. The city also had the highest PlacesforBikes BNA, Reach, and Safety scores among the ten cities (see Figure 3, 4 and 5). However, they also noted that, while they see generally strong support for bicycling as part of the City’s image, few businesses invest in bicycle-related amenities, and many view bicycling as a hindrance. As one participant responded, “I think they view it very favorably in abstract. They like that Fort Collins is known for being bike-friendly and has a lot of bike lanes. But I think the business community, from both ownership and customer perspectives, is easily frustrated or aggravated by the actual practice of cycling because they think that it inconveniences them.”
Participants shared a variety of perspectives that illustrate the myriad ways in which identity is intertwined with perceptions of bicyclists, including gendered notions of bicyclists. These include the scarcity of women on bicycles, male interest in women on bikes, female bicyclists who are targets of male interest, and safety concerns. While some participants responded with distinct perceptions of female/male bicyclists, some didn’t see gendered differences.

Many female participants had positive perceptions towards male bicyclists, and vice versa, because bicycling is environmentally-friendly and good for personal and public health. While most female participants commented that it is normal and common to see male bicyclists, the majority of male participants remarked that it is rare to see women bicycling. As a Memphis (male) participant expressed, “Oh man, this is so rare, this is good.” Some saw female bicyclists as independent and confident to be able to bicycle in traffic, as expressed by this male participant from Tucson: “She is a badass. She is exercising, she cares about her health.” In addition, some of the male participants, like this one in New Orleans, thought that women bicyclists are attractive, “I’m going to look, to see her.” Others are drawn to a sense of shared lifestyles. As a male participant from Baltimore notes, “Personally, it is something that I would look for in a partner. I’m single, so whenever I see someone on a bike like oh, that is someone who has a similar lifestyle than me, so it automatically makes the grounds for a good match.”

While some male participants explicitly expressed their attraction to female bicyclists and joked about making comments about their appearance, female participants found it very uncomfortable to be verbally targeted. For instance, all women in the Memphis community group agreed that comments by male bicyclists made them uncomfortable. As one female participant expressed, “men make comments... [makes me] a little annoyed. I don't think men get those kinds of comments.”

However, many women indicated that they did not feel safe or comfortable while bicycling, and male participants similarly voiced concerns over female bicyclists’ safety due to their scarcity and, in some cases, religious identity. For instance, in Fort Collins, a male participant said, bicycling “is almost like a boy's club...[Female bicyclists] are in the minority, and they get singled up and focused on when you show up to an event where there are mostly male cyclists.” In addition, male participants in Portland conveyed that it is not safe for female bicyclists, especially Muslim women, to bicycle in public because they are easily identified by their hijabs. As one male participant conveyed, “I don't think there is anywhere safe [for Muslim women] in Portland.” Muslim women indicated that Muslim men are not targeted in the same way that they are because it is difficult to tell if a male bicyclist is Muslim or not: “I don't really feel worried because that's usually what I see, men on bikes. It's kind of hard to target a Muslim man, to know if he is Muslim or not, because he doesn't have a hijab on.” A similar sentiment was voiced by a female participant in Memphis who expressed a “sense of envy that [male bicyclists] feel comfortable enough to ride and feel safe enough. That's something that I cannot get over – feeling safe to ride.”
Most women, Black/African American, and Hispanic/Latino community focus group participants did not see themselves represented in mainstream print/social media focused on bicycles/bicycling, noting that the dominant images portrayed continue to be those of White, male bicyclists.

Participants also pointed out differences in body type and appearance in print/social media, and some did not see themselves represented in the images of slim, healthy, athletic-looking bicyclists with sophisticated bicycle equipment and clothing. Other participants also noted that bicycle advertisements/marketing campaigns tend to portray bicycling mostly as a recreational activity, and do not depict it as a legitimate mode of transportation.

Participants who felt underrepresented in bicycling media coverage/imagery—primarily Black/African American and Hispanic/Latino participants—emphasized that it is important to see people like themselves included in cultural imagery to shift perceptions of bicycling and bicyclists. As one Memphis participant noted: “Oh, she is Black. I can do that too.” Seven out of eight participants in New Orleans also expressed that having racially/ethnically diverse imagery could encourage people to bicycle more frequently. Body type and size was also a noted factor in how participants relate to popular bicycling ad/marketing imagery. As one Black/African American female participant from Memphis remarked, “Whenever I see pictures of cyclists or anyone with a bicycle, I just automatically think it is not for me as someone who is over a size ten and who is Black.” In addition, a Denver participant with disabilities also noted that there needs to be more representation of people with disabilities in bicycle advertisements, as well as more conversations about disabilities in cycling spaces.

Departing from the responses from other focus groups, Portland participants felt positive about images of bicycling in the media because they reinforced the environmental benefits of bicycling, reflecting Portland’s image as a pro-environmental city. As one participant noted, “It makes me feel like, you know as Oregonians, we are known for green living, so it would remind me of that again. It’s a positive thing; it’s a good thing. Less car, more bikes.”
Focus groups with greater Black/African American and Hispanic/Latino participation, such as those in Tucson, Portland, and Memphis, expressed strong sentiments of fear of police due to negative experiences with racial profiling and police harassment.

Views on the Police as an Effective Partner for Bicycle Safety Education and Enforcement

The majority of community focus group participants, especially those who identified as Black/African American and/or Hispanic/Latino, indicated that the police couldn’t be trusted as partners. Focus groups with greater Black/African American and Hispanic/Latino participation, such as those in Tucson, Portland, and Memphis, expressed strong sentiments of fear of police due to negative experiences with racial profiling and police harassment. As noted by a Tucson participant: “We are not breaking the law, but we are still being pulled over being on a bike. We are being questioned on status...they are there to just criminalize us and over police us. Even when our kids are on bikes, they get hassled by the cops.” This sentiment is consistent with perspectives shared by other participants who pointed out that police would approach and target black and brown community members on bicycles a lot more than White community members. As a Tucson participant shared, “We are Latinos, [the police] won’t [harass a] White male. That’s why we pictured a White male. They wouldn’t pull a gun because they have all the uniform for cycling. We don’t.” Or, as noted by a Providence participant, “People that look like me don’t feel safe. As a minority, I don’t think [the police] will help my community.”

In addition, many Portland participants expressed unfavorable views of the police because of police hostility that they experienced previously in other countries before immigrating to the US. As one participant remarked, “Most of the community members, myself included, come from countries where the police are not as friendly as here. Seeing people in uniform immediately triggers something not positive.” Furthermore, the current political climate in the US – increasing police shooting incidents in Black/African American neighborhoods and fear in Hispanic/Latino communities due to changing immigration policies – also exacerbated participants’ distrust of police. In the case of Baltimore, distrust is tied to community experience with recent police abuse and violence that led to the death of Freddie Gray in 2015. As one participant described, “If [the police was] involved in bicycle safety, and if I got a ticket on the bike...I would lose my temper. I agree with the whole thing with Freddie Grey. There is abusive power with the whole police force. If they targeted in that direction and give people tickets on bikes, I think that will create more problems.”
Participants also thought that the police would not be an effective partner because bicycle safety enforcement is not prioritized among other police priorities. As one Baltimore participant indicated, “The police have larger pressing matters before they manage anything else.” In the Tucson business focus group, two participants who were police officers agreed that the police could not play a major role in bicycle education—“If we can’t respond to burglaries, I don’t think we can spend a lot of time teaching people how to ride bikes.” One reason that bicycle safety is not as prioritized is the greater attention that the police still place on cars and drivers. As one New Orleans participant conveyed, “I think there is a notion that there is a hierarchy of use of the road, that the cars own the road, and the bicycles don’t belong there as much as the cars do.” Participants also pointed to police officers’ lack of awareness and training on bicycle safety laws. As one Memphis participant indicated, “I see the police as reactive, and not proactive in terms of making traffic safer and other safety issues. I believe that a lot of the police don’t understand the rules of the road as they apply to bicycles. There are stories where a bicyclist is in an accident; they are just going to blame the bicyclist and just let the driver go free. Give them slap on the wrist.” Another participant from New York pointed to the newness of bicycling in US cities, “I don’t think they know what to do with cyclists. I think it’s still kind of a new thing, this enthusiasm for bicycling.”

While the majority of participants expressed anxiety and fear about local police involvement in bicycle programs, a few respondents, particularly those with prior positive interactions with police, were more optimistic about the potential of police as partners. Some participants expressed both concerns and optimism, noting that police have “a lot of work to do to get past their reputation, but I think the potential is there. I think they could get out there…you see them in communities, and they do get out, and they are better able to interact in a community setting where the community eventually becomes much more comfortable with them” (Providence participant). Some participants felt that if police “were patrolling neighborhoods on bikes, that will feel less threatening...If bikes can change the interaction that they have in our neighborhoods and make them feel more accessible, I just think that might change how I want to interact with them” (Portland participant). While this type of neighborhood bicycle patrol is not about bicycle safety education and enforcement per se, participants thought it could improve community-police relations, as well as the image of bicycling in their communities.
Views on Local Bicycle Collectives/Shops as an Effective Partner for Bicycle Safety Education and Enforcement

In comparison to the doubts expressed about police, the local bicycle collective/shop was considered as a more trustworthy and suitable partner for bicycle safety education. As noted by this Memphis participant: “They have a sense of, this is my neighborhood, it belongs to us. It’s a safe place to go, and I trust them.” In seven out of the ten focus groups, all participants agreed that the bicycle collective/shop could be an effective educational partner. Participants indicated that bicycle shops/collectives are already connected and engaged with the community, and they have expertise on how to safely ride bikes. Bicycle shops/collectives also organize group rides, and many offer bike rentals, which expands access to bikes and provides a comfortable group riding environment.

However, some participants noted that not all bicycle shops are equally accessible or welcoming. This is well articulated by a Tucson community focus group member who said that it “depends what bike shop. There are luxurious bike shops when they don’t even look at you when you walk in. There are homie’s bike shop…there are always doors open, and you have bikers who help you build our own bike.” Participants noted that some bike shops are not only unaffordable, but also do not have community engagement programs. These shops were not viewed as effective partners because they are not connected to their communities. A few Black/African American and Hispanic/Latino participants further indicated that they would not be comfortable going into bicycle shops with a predominantly White staff and customer base.

Views on Local Government as an Effective Partner

More than half of the participants in most groups thought that local governments could be an effective partner in bicycle safety enforcement and education. Some participants pointed to local government’s role in developing educational outreach materials and implementing bicycle-friendly infrastructure to support this position, stating that, “The City DOT already is (an effective partner), they have items on the website, they give out helmets. I think it needs to be contagious to other city departments” (New York City participant). Others felt reassured that educational efforts delivered by cities would keep them safe given that local entities are responsible for making and/or enforcing such laws.

Those who doubt local government’s ability to be an effective partner pointed to ineffective marketing and outreach to low-income and minority communities. As noted by this Providence resident: “The City definitely tries to be more inclusive, but I think an issue would be, like where I am from, it’s low income...Even if they have them in English and Spanish, a lot of those parents wouldn’t be able to go [to educational events] because they are working their two jobs. They don’t have transportation to the event. I think things like that will get in the way even if they are trying to be more inclusive.” Participants in Baltimore reported doubts due to experiences with new bicycle-related initiatives, such as bike-share, which haven’t been effective because the City did not properly promote or manage the program. Participants also felt discouraged due to the City’s failure to make tangible infrastructure improvements.
Opinions and Experiences with Bike Share

Most focus group participants have not used bike share, and a few were not familiar with bike-share programs at all. Participants without prior bike share experience noted that they own bikes and/or use other means of transportation. Some commented on the high cost of using bike share. Other participants reported positive experiences using bike share. In Providence, participants had positive experiences with the bike-share system (JUMP), noting, “it’s easy to get a bike, the app is easy to use, it saves time, and it’s fun.” Baltimore participants complained that the bikes were “terrible...the bikes were just really bad. They were really heavy...their app wasn’t the easiest to use, it’s not the best API. I just found myself often times if I did want to try to take one, I’m either unable to take it from the dock or find one at the dock.”

While most business group participants were generally supportive of bike-share programs, they shared concerns about equity, insufficient community outreach, and safety of bike-share users. Such support only goes so far, though, as most would not support a bike share station directly in front of their business due to space constraints. In addition, some business group participants expressed concerns over dockless bike-share programs due to improperly parked bicycles and difficulty with the app for less tech-savvy people. Even though a few participants preferred dockless bikes for their convenience, more participants preferred docked bike-share programs due to these concerns.

Opinions and Experiences with Docked/Dockless, E-Scooters/E-Bikes

Both business and community focus groups had mixed opinions about e-scooter/e-bikes. For instance, none of the community participants in Austin and Providence (and only one-fourth of New York City participants) viewed dockless e-scooters or e-bikes favorably. Views were more balanced in New Orleans with about half favorable and more clearly favorable in Memphis and Fort Collins where most participants supported dockless e-scooters. Key concerns expressed by participants were the lack of community outreach and safety enforcement, underage riding, having more than one rider per scooter, and improper parking of e-scooters. Those who expressed support noted that e-scooters serve those who are physically uncomfortable/unable to bicycle, address first-and last-mile connectivity, and provide an environmentally friendly mobility option. In addition, some participants in cities with e-scooter pilot programs also noted that the e-scooter program brought a new group of people into bicycle infrastructure advocacy as vulnerable road users.

From discussions with business participants, support for e-scooters include their ability to draw customers to businesses, improve accessibility in high-traffic areas, and provide an alternative option for those worried about arriving too sweaty to work: “I used the scooter today to go to a meeting in a suit. I don't have to pedal” (Baltimore business focus group participant). However, participants were concerned about having so many different transportation modes on the road that travel at varying speeds. Discussions also pointed to the need for educational efforts on e-bike/e-scooter safe operations and enforcement of safety regulations. As noted by an Austin business attendee: “I think they [e-scooters] are here to stay. I think the City needs to figure out where they should be, and there should be more enforcement. I think the things that I see people do as far as running red lights and driving scooters on the wrong side of the road. Pretty crazy.”
CONCLUSIONS & IMPLICATIONS FOR FUTURE RESEARCH AND PRACTICE

The community and business focus groups illuminated common experiences and challenges that come with bicycling and bicycle infrastructure across the ten Big Jump cities, as well as distinctive issues that pertain to different communities within places. One key theme shared across all focus groups was the racial and gender disparity of bicycle use and perception. As such, the following section provides some recommendations and implications for future research that center around bicycle equity, in terms of who has access to bicycles and bicycle infrastructure, who feels comfortable bicycling in public, how planning is carried out for bicycle-related projects, and who is defining the metrics for bicycle equity.
1. Meaningfully Engage with Historically-Marginalized Communities: On Their Turf

Engaging with historically marginalized communities is crucial for facility planning, implementation, and promotion of bicycling. Effective engagement means going to people in their places of work, play, and residence, and not expecting them to come to traditional meetings. Effective engagement also means having inclusive outreach teams to represent the communities that cities/planners are engaging with. For instance, environmental justice (EJ) communities and disadvantaged communities can build leadership capacity through identifying community members to serve as transportation equity ambassadors who can participate in planning processes. Community engagement should be integrated into short- and long-term planning and decision-making processes about specific infrastructure investments, as well as into the design/operation of bike-share and other micromobility programs to ensure equitable access.

In addition to physical infrastructure and/or policy planning processes, community engagement must also be central to the design and delivery of educational initiatives, as well as the design and delivery of marketing/promotion efforts of public sector entities, the bicycle industry, and e-bike/e-scooter providers. As part of these efforts, additional research and outreach should be conducted to unpack and better understand concerns about the effects of gentrification that stem from bicycle-related initiatives as they can reinforce historic disinvestment in disadvantaged neighborhoods that have already borne the brunt of racist government policies. In addition, research should also be carried out to understand and learn from programs from other parts of the country that are expanding and encouraging people in EJ communities to bicycle for transportation and/or recreational purposes. Identifying threshold issues critical to program success is important to determine which programs have the greatest potential to be expanded and/or scaled up.

Agencies and organizations involved in bicycle planning, programming, and advocacy should meet communities where they are, both literally and figuratively. This means not only building on and refining existing bicycle-related initiatives, but strengthening and building partnerships with other organizations that have established relationships with disadvantaged populations and are engaged in social justice advocacy. For instance, communities can partner with local organizations to expand the availability of bicycles in EJ/disadvantaged communities by identifying existing recycle-a-bicycle programs that can make bicycles available to all those who are interested in riding but don't have the resources to purchase a bicycle, light, helmet and lock. (continue on next page)
1. Meaningfully Engage with Historically-Marginalized Communities: On Their Turf

The Community Cycling Center (CCC), a non-profit organization in Portland’s collaboration with New Columbia and Haceinda, two minority neighborhoods in North Portland, is an example of an effort to understand and address barriers to bicycling in minority communities through meaningful partnerships. The effort focused on working with residents to gather data on their concerns, and forwarded community organizing and resident-led efforts for bicycle safety and education trainings, events, workshops, and infrastructure building, including setting up a bicycle repair shop and bicycle skills park in the community. CCC was featured in The American League of Bicyclists 2014 Report The New Movement: Bike Equity Today for its efforts. The report recognizes several other community organizations and groups that have developed meaningful relationships with low-income and minority communities, engaging with them on their turf to address barriers to bicycling in their communities.

It is also important to train leaders from historically marginalized communities who can promote bicycle use and safety awareness in their neighborhoods. Creating opportunities for people to be trained as community bicycle educators and ambassadors is important for expanding the visibility of minority bicyclists and empowering local residents to teach basic bicycle riding/traffic and bicycle maintenance skills. For instance, the New Jersey Bicycle and Pedestrian Resource Center—as managed by VTC—organizes the Ambassadors in Motion (AIM) program where trained ambassadors go into communities to educate and conduct outreach to all road users to promote safe active transportation. The program serves as a model to potentially build networks of neighborhood-based ambassadors within the Big Jump Cities. Similarly, the Community Pedestrian and Bicycle Safety Training Program (CPBST) offered by the Safe Transportation Research and Education Center (SafeTREC) at the University of California, Berkeley in collaboration with California Walks (CalWalks), is another model for such efforts. The program provides a tailored, resident-driven plan to train local bicycle advocates and build their skills in bicycle education and safety issues. It can include expert-led presentations, safety assessments of designated areas, and more customized interactive sessions, focusing on the needs of the community.

Lastly, improving relationships and partnerships between communities and local law enforcement is critical to the overall health of urban communities. In recognition of this, developing partnerships between local law enforcement, bicycle/pedestrian advocates, and community health organizations to fund and organize Open Street type events and having neighborhood representation on local police commissions and patrol/watch programs are both crucial to transforming community/police perceptions and relations.
2. Don’t Shy Away from Conducting Focus Groups in and with Communities of Color

One of the key lessons learnt over the course of the project was the overall lack of experience, confidence, and familiarity many of the local partners had with engaging and recruiting people of color to participate in both focus groups. Considering the importance of and many benefits associated with focus groups and other qualitative forms of outreach, it is important that local partners use this experience and others to build rapport with communities of color and continue conducting focus groups when and where appropriate. To do so successfully, it is imperative that local partners work with local trusted community advocates, stakeholders or professional focus groups agencies to secure suitable (i.e., welcoming and comfortable) focus group meeting locations and to help recruit participants of color; b) provide food, beverages, childcare and other incentives for focus groups participation; c) identify a local or national experienced researcher and/or facilitator of color to aid in the development of research and focus group goals and objectives, focus group guide/questionnaire, and overall facilitation of the focus groups; and d) be flexible and open in regards to the meeting time and day of the week or weekend.

For other more general and important tips and tools, please consider this toolkit below:
3. Expand Private-Sector Encouragement Programs

Businesses have an important role to play in encouraging bicycling among their employees. Providing incentives, such as parking cash out (where employees can choose to receive a taxable cash income instead of a free/subsidized parking space at work), commuter tax benefits (where allowed by State law), and amenities such as shower facilities, changing areas, and safe indoor bicycle storage, could encourage employees to drive less and commute to work via bicycle or other active modes. In addition, organizing encouragement events, such as bike-to-work day or an annual miles contest, can help foster a cycling culture within companies. Businesses could also consider providing guaranteed-ride homes or other forms of transportation support when employees are unable to bike home. For companies who have invested in leasing off-street parking and/or purchasing parking permits for employees, these strategies translate into savings for business owners. Savings are also realized via health benefits that can affect health insurance rates and employee productivity over the long-term. An example of such efforts could be the year-round Bike to Work program offered by The Burke Group, a consultant engineering and surveying firm in Rosemont, IL. The program was introduced by the firm in 2006 and includes commuter benefits ($0.75 per mile), bicycle amenities (such as secured parking, on-site locker/shower facilities, and bike maintenance resources), quarterly/annual giveaways for miles, and bicycling challenges. Over 180 employees have participated in the program to date, with over 400,000 commuting miles, which corresponds to about 800,000 pounds in carbon reductions and over $85,588 in gas savings. The program has been nationally recognized by multiple organizations, including USDOT funded Best Workplaces for Commuters (BWC) award, and American League of Bicyclists’ Platinum-Level Bicycle Friendly Business (BFB) award.

Importantly, these types of initiatives need to be implemented beyond the traditional business sectors that have historically embraced bicycling and other demand management strategies.
4. Develop Tailored and Culturally-Relevant Educational Materials, Marketing, and Outreach Strategies

Education on bicycle safety and road sharing is important for drivers, bicyclists, e-scooter riders, as well as for police officers. The police must be better informed about how traffic laws apply to bicyclists so that they can enforce safety for all road users. Drivers’ education should include training on safe passing laws, how to properly share the road with cyclists, how to identify bicycle hand signals, and how to look out for cyclists when opening car doors.

Bicycle education programs that go beyond the traditional government spaces, such as those at major institutions, places of employment, religious institutions, bike shops, and schools can help educate and train the public on how to safely operate bicycles and how to conduct routine maintenance, such as patching and changing tires. Communities can test the feasibility of a neighborhood-based buddy program, offer bicycle skill training sessions, and/or organize on-the-road, social rides with community partners to encourage and empower more people to bicycle. For instance, participants from the Denver business focus group mentioned a program called Neighborhood Navigators that is run by Bicycle Colorado. New riders who are not comfortable bicycling alone can request a navigator (an experienced bicyclist) through the program to accompany them on a local bicycle trip. The program enables newer bicyclists to learn safety etiquette and to feel safer riding, especially in congested areas like downtown Denver. Bike School, another program by Bicycle Colorado, focuses on providing tailored education and safety trainings and workshops for communities to empower more people to ride safely and confidently. The program offers learn-to-ride classes, bicycle rodeos, group rides, and maintenance clinics for people of all ages and level of experience, including drivers. The program also partners with a range of local organizations to offer more tailored and specific solutions to encourage communities to bicycle. For instance, in 2017, Bike School contributed to the opening of a resident-led bicycle library in a West Denver Community, in collaboration with seven other organizations, including the local health, open space, youth, and bicycle repairing groups.

Bicycle marketing and educational materials produced by the bicycle industry, government, and non-profit sectors should be culturally relevant and more representative of actual communities. For instance, integrating minority voices and images into a social media campaign could encourage minority and disadvantaged populations to ride a bike for recreation or transportation. Education and safety trainings could also include information on local laws and legal rights of bicyclists, especially for disadvantaged and undocumented populations who are more likely to be stopped by police. Multicultural Communities for Mobilities (MCM), now known by People for Mobility Justice (PMJ), is a community organization recognized by The American League of Bicyclists for their tailored and relevant education classes in this regard. Furthermore, not all types of bicycling and bicycles are equally embraced from place to place. Having a multi-pronged outreach strategy to reach targeted groups via different mediums, platforms, and messages could be effective not only for encouraging bicycling, but also for diversifying long-held-perceptions and stereotypes of bicyclists so that more people can envision themselves riding a bike for fun or transportation.
5. Build and Invest in Bicycle Infrastructure: Both the Big and the Small Stuff

Most community focus group participants, regardless of race, ethnicity, gender, or age, indicated that the availability of protected bicycle lanes was the top factor that would increase their comfort and safety while bicycling. The installation of well-lit protected bicycle lanes is especially important to encourage women and other less experienced cyclists to bicycle more comfortably in high traffic urban areas. Where it is not possible to install protected bicycle lanes, cities should consider and incorporate other types of complete streets measures within existing transportation networks, such as contraflow bike lanes, safer pedestrian crossings, and enhanced pavement and sidewalk conditions.

MEMFix, a community-based program in Memphis, Tennessee, is an example of a collaborative and resident-driven effort to redesign streets and neighborhoods, including installing semi-permanent protected bike lanes. The program witnessed its biggest success in a one-year pilot that converted about half of a four-lane highway along the Mississippi River to a bicycling/walking pathway for the community. The program has orchestrated multiple demonstration projects including a protected bike lane, many of which have led to permanent street improvements. Memphis is one of the six cities that participated in PeopleForBikes’ Green Lane Project and received technical assistance focusing on advancing protected bike lane projects in the city.

The lack of secure bicycle parking continues to be a barrier to increasing bicycling mode share. Convenient, compact, and secure bicycle parking in highly congested areas can help draw customers to local businesses and expand bicycle commuting. Increasingly, bicycle depots are being added in and proximate to parking garages in downtown areas and can be incorporated into public and private garages in the future. It is time for cities to embrace bicycle parking guidelines and ordinances that require both short- and long-term bicycle parking for future commercial and multi-family housing developments.

In 2016, Portland began its Bicycle Parking Code Update Project, which aimed at increasing the minimum short- and long-term bicycle parking requirements in the city. The project included an extensive stakeholder engagement process that involved difficult conversations with real estate developers, builders, Portland Business Alliance, and affordable housing advocates. These conversations along with community surveys on bicycle parking demand, resulted in multiple updates and revisions of the code, until the code was approved. The following table from the adopted Bicycle Parking Code Update Ordinance compares the revised long-term parking requirements in the city with comparable cities.
5. Build and Invest in Bicycle Infrastructure: Both the Big and the Small Stuff

While adding protected bicycle lanes and well-designed parking would address some of the concerns identified, the focus groups shared mixed feelings and perceptions about how bicycle infrastructure was read by residents. For instance, all business focus groups indicated that the broader business community in their cities would have an indifferent or negative attitude towards adding bicycle lanes, mainly due to concerns about displacing existing on-street parking spaces. Additionally, some focus group participants, especially those identified as Black/African American and/or Hispanic/Latino, perceived bike lanes as signs of gentrification and did not consider such infrastructure as serving their communities. It is therefore crucial to rethink what effective community outreach means so that planning processes can hold space for difficult discussions, serve as co-educational opportunities, and ultimately lead to more inclusive policy-making.

### Bike Parking Requirements Comparison

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<td>Household Living Multi Dwelling</td>
<td>Standard A 1.5 per unit&lt;br&gt;Standard B 1.1 per unit</td>
<td>2 per unit (75% long-term &amp; 25% short-term)</td>
<td>1 per unit</td>
<td>1 per unit up to 2-bedrooms, 1/2 space per additional bedroom</td>
<td>1 per unit for buildings containing more than 100 dwelling units, 100 spaces plus 1 for every 4 units</td>
<td>1 per unit; unless garages are provided, in which case, none are required</td>
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<tr>
<td>Retail Sales &amp; Services</td>
<td>Standard A 1 per 3,800 sq. ft.&lt;br&gt;Standard B 1 per 7,500 sq. ft.</td>
<td>1 per 4,000 sq. ft.</td>
<td>1 per 2,000 sq. ft.</td>
<td>1 per 2,000 sq. ft.</td>
<td>1 per 7,500 sq. ft.</td>
<td>1 per 8,000 sq. ft.</td>
<td></td>
</tr>
<tr>
<td>Retail Sales &amp; Services - Restaurant &amp; Bar</td>
<td>Standard A 1 per 2,300 sq. ft.&lt;br&gt;Standard B 1 per 4,800 sq. ft.</td>
<td>1 per 5,000 sq. ft.</td>
<td>1 per 2,000 sq. ft.</td>
<td>5% of capacity of persons</td>
<td>1 per 7,500 sq. ft.</td>
<td>N/A</td>
<td></td>
</tr>
<tr>
<td>Office</td>
<td>Standard A 1 per 1,800 sq. ft.&lt;br&gt;Standard B 1 per 3,500 sq. ft.</td>
<td>N/A</td>
<td>1 per 5,000 sq. ft.</td>
<td>1 per 2,000 sq. ft.</td>
<td>1 per 5,000 sq. ft.</td>
<td>1 per 3,000 sq. ft.</td>
<td></td>
</tr>
<tr>
<td>Medical Centers</td>
<td>Standard A 1 per 2,700 sq. ft.&lt;br&gt;Standard B 1 per 5,500 sq. ft.</td>
<td>1 per 4,000 sq. ft.</td>
<td>1 per 5,000 sq. ft.</td>
<td>1 per 2,000 sq. ft.</td>
<td>1 per 15,000 sq. ft. (Hospitals or In-Patient Clinic)&lt;br&gt;1 per 5,000 (Medical Offices or Out-Patient clinic)</td>
<td>1 per 7,000 sq. ft.</td>
<td></td>
</tr>
</tbody>
</table>

APPENDIX: CITY SUMMARIES

SURVEY & FOCUS GROUP SUMMARIES FOR:
CLICK ON ANY CITY TO JUMP TO THEIR RESULTS

» Austin, TX  » New Orleans, LA
» Baltimore, MD  » New York City, NY
» Denver, CO  » Portland, OR
» Fort Collins, CO  » Providence, RI
» Memphis, TN  » Tucson, AZ
Focus Group Recruitment Methodology
With assistance from PeopleForBikes, VTC worked with staff from the City of Austin, Texas to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. Both focus groups were facilitated by Charles T. Brown of VTC and were held on January 22, 2019. The business focus group included 6 participants and was held from 9:00 AM – 10:30 AM at the Austin Transportation Department, which is located at Barton Oaks Plaza, Building 5, Suite 300, 901 S. MoPac, Austin, Texas. Breakfast was provided. The community focus group included 11 participants and was held from 6:30 PM – 8:00 PM at the Cepeda Branch Library, 651 N. Pleasant Valley Rd, Austin, Texas. Each community focus group participant received $50 cash upon completion of the focus group as well as food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics
This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for Austin are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.
Community Focus Group Survey Results

Many of the community focus group participants (11 in total) from Austin were relatively new residents, with about two-thirds of participants who have lived in the City for just ten years or less. The focus group had a young demographic – nearly half of the participants (45%) were in the 25-44 age cohort and two-thirds of participants were 44 years old or younger. There were a lot more female (73%) than male (27%) participants in the focus group, and nearly three-quarters of participants were single with the balance either married or in a civil union. In terms of educational attainment, 55% of the participants had a four-year college degree, followed by 36% with some college or vocational school experience. About two-thirds of community group participants had household incomes of $49,000 or less in 2017.

Similar to the City as a whole, White focus group participants were the largest share (55%). Different from the City, however, the focus group had a higher percentage of Native Hawaiian/other Pacific Islander participants (27%) while the City has a much smaller share of Native Hawaiian/other Pacific Islanders (less than 1%). The focus group had a relatively even representation of Hispanics (45%) and non-Hispanics (55%), in comparison to the City’s higher percentage of non-Hispanic individuals (66% per the 2017 ACS estimates).
Community Focus Group Survey Results

Most community focus group participants did not have any school-age children (82%). Two-thirds indicated that they had never ridden bicycles with their children over the past year, and almost all participants learned how to bicycle by age 12. About half of the participants (45%) were occasional riders, followed 27% who bicycled very frequently and another 27% who very rarely or never rode their bikes. Participants conveyed that utility (38%) and recreation (38%) were the two primary purposes of bicycling, with the balance of exercise/fitness (25%). Just over half (55%) indicated that they used road, touring, and/or hybrid bicycles (55%) most prevalently. Lastly, all participants thought that bicycle infrastructure investments would very positively (20%) or positively (80%) affect their communities.

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th>No Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Do you have school-age children (5-18 years) living in your household?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>2</td>
<td>18%</td>
</tr>
<tr>
<td>No</td>
<td>9</td>
<td>82%</td>
</tr>
<tr>
<td>Total</td>
<td>11</td>
<td>100%</td>
</tr>
<tr>
<td>Have you ridden bicycles with any of your children in the past year?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>3</td>
<td>33%</td>
</tr>
<tr>
<td>No</td>
<td>6</td>
<td>67%</td>
</tr>
<tr>
<td>Total</td>
<td>9</td>
<td>100%</td>
</tr>
<tr>
<td>When did you learn to ride a bicycle?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>I don’t know how to ride a bike</td>
<td>1</td>
<td>9%</td>
</tr>
<tr>
<td>Between the ages of 2-12</td>
<td>9</td>
<td>82%</td>
</tr>
<tr>
<td>Between the ages of 12-18</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>At the age of 18+ (as an adult)</td>
<td>1</td>
<td>9%</td>
</tr>
<tr>
<td>Total</td>
<td>11</td>
<td>100%</td>
</tr>
<tr>
<td>Bicycle Frequency</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Very Frequently</td>
<td>3</td>
<td>27%</td>
</tr>
<tr>
<td>Frequently</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Occasionally</td>
<td>5</td>
<td>45%</td>
</tr>
<tr>
<td>Rare</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Very Rare</td>
<td>2</td>
<td>18%</td>
</tr>
<tr>
<td>Never</td>
<td>1</td>
<td>9%</td>
</tr>
<tr>
<td>Total</td>
<td>11</td>
<td>100%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th>No Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bicycle Trip Purpose</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Utility</td>
<td>6</td>
<td>38%</td>
</tr>
<tr>
<td>Recreation</td>
<td>6</td>
<td>38%</td>
</tr>
<tr>
<td>Exercise/Fitness</td>
<td>4</td>
<td>25%</td>
</tr>
<tr>
<td>Racing</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Total</td>
<td>16</td>
<td>100%</td>
</tr>
<tr>
<td>Bicycle Type</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cruiser</td>
<td>3</td>
<td>33%</td>
</tr>
<tr>
<td>Folding Bicycle</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Road, Touring and/or Hybrid</td>
<td>6</td>
<td>67%</td>
</tr>
<tr>
<td>BMX, Mountain, Cyclo-cross</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Total</td>
<td>9</td>
<td>100%</td>
</tr>
<tr>
<td>How would investments and policies in bicycle infrastructure affect your community?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Very Negatively affect</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Negatively affect</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>No change or affect</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Positively affect</td>
<td>8</td>
<td>80%</td>
</tr>
<tr>
<td>Very Positively</td>
<td>2</td>
<td>20%</td>
</tr>
<tr>
<td>Total</td>
<td>10</td>
<td>100%</td>
</tr>
</tbody>
</table>
Business Focus Group Survey Results

Out all businesses represented by business focus group participants (six in total), two-thirds of them had been in operation in Austin for 21 years or more, with the balance open for five years or less. Half of the businesses represented were small with 20 or fewer employees. Similar to the community focus group, most of the participants (83%) thought that bicycle infrastructure investments would help their businesses grow.

In terms of employees and customers’ commute modes, most participants indicated that zero to 20 percent of their customers and employees walked, bicycled, took transit, or used rideshare services to reach their businesses. Two participants had over 80% of their customers who bicycled to reach their businesses, yet these businesses were bicycle-related organizations and shops. Participants had more customers and employees who drove to their businesses. Participants’ responses reflect city-wide traveling preferences, where up to 83% of workers 16 years old and above drove to work in Austin, and more than 90% of occupied housing units in Austin had access to at least one vehicle (2017 ACS Estimates).
In Austin, there were 11 participants in the community focus group and six participants in the business focus group. The following are key highlights from the community focus groups.

**Community Focus Group**

- When asked to imagine the “typical cyclist,” the majority of participants in the community focus group described a young White bicyclist who was wearing either spandex or “regular” clothing. Unlike most of the focus group participants in other cities who primarily saw a white male as a typical cyclist, the community focus group participants identified both men and women in their descriptions.

- While half of the participants had positive perceptions towards bicyclists in the community because it is a good alternative form of transportation and a lifestyle choice that they hoped to pursue, many participants expressed great concern for bicyclists’ safety on the road.

  "I worry a lot about [bicyclists] just because the bike lanes are sometimes super narrow. They are already on a narrow street, and I’m worried to pass them. I also wish I have some more information about how to be a car around bicyclists because sometimes I don’t know if I’m overcorrecting."

- Most female participants in the community group felt that men had a negative perception of female bicyclists and saw them as vulnerable on the road.

- Community group participants were most comfortable bicycling on trails, bicycle lanes, and in low-traffic neighborhoods. More than half of the focus group— all identified as female—had concerns about not knowing how to safely ride in and with traffic. On the other hand, the lack of dedicated and well-lit bike lanes prevented most participants from bicycling more often.

- A little more than one-third of the community group participants (all of whom except one identified as a minority) expressed reservations about the police serving as an effective partner to educate residents about bicycle safety. Participants pointed out existing distrustful relationships between the community and local police— “We don’t need more cops coming into the neighborhood at all.” Participants thought that local neighborhood groups and community organizers would have more potential to collaborate on bicycle safety education.

- Around three-fourths of community group participants identified personal hygiene as a critical factor that influences travel decisions.

- Most participants were concerned about e-scooters in the City because a lot of users don’t abide by operation and parking regulations.
In Austin, there were 11 participants in the community focus group and six participants in the business focus group. The following are key highlights from the business focus groups.

**Business Focus Group**

» Business focus group participants indicated that visibility is the most crucial factor in providing secure parking, such as having bicycle parking within view of employees or a camera to monitor bicycle parking in garages. Covered bicycle parking and ease of use for locking bicycles were also factors noted as ineffective bicycle parking designs. Some participants indicated that indoor bicycle storage areas are ideal for employee parking.

» In comparison to the community focus group, which did not have a lot of frequent bicycle riders, all business focus group participants knew how to bicycle, had ridden in the past twelve months, and most of them bicycle fairly frequently to commute to work. Some of them even owned several bikes for different purposes.

» Business focus group participants identified two main types of bicyclists that they saw in the community: African Americans who bicycled for necessity and fearless commuters who bicycled to work. Many of them saw bicyclists collectively as allies and advocates because they thought increased visibility of bicyclists would encourage the City to invest in bicycle infrastructure improvements.

> “[I see bicyclists in the community as] advocates. The more [bicyclists] we can get, the better we can do on bike infrastructure and the implementation we are trying to get done here in town.”

» All business focus group participants agreed that it is beneficial for the City to invest in bicycle infrastructure to reduce motor vehicle traffic and to increase health and safety for bicyclists. However, they also pointed out several concerns, such as lack of funding, lack of a critical mass of bicyclists to make bicycling more acceptable in the community, and traffic issues that would arise from overlaying bicycle infrastructure on the road designed only to move cars.

» Participants noted that businesses could play an essential role in encouraging bicycling in the City. They could provide bicycle parking and incentives for employees, such as showers at work, and businesses should be aware of the benefits of bicycling. One noted that companies should educate their delivery truck drivers about the dangers of ignoring bicyclists on the street.

» Similar to the community focus group, half of the business focus group participants expressed concerns for e-scooters, as users don’t abide by safety regulations, resulting in safety issues for other street users, especially pedestrians. However, many of them were also supportive of e-scooters as they are particularly convenient in high-traffic areas and for first-/last-mile connectivity.
Focus Group Methodology
With assistance from PeopleForBikes, VTC worked with staff from the City of Baltimore and Bikemore: Baltimore Bike Advocacy Organization to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. Both focus groups were facilitated by Charles T. Brown of VTC and were held on March 25, 2019. The business focus group included 18 participants and was held from 2:00 PM – 4:00 PM at the office of Ballard Spahr, which is located at 300 E. Lombard Street in Baltimore, MD. Snacks and drinks were provided by the host. The community focus group included 14 participants and was held from 6:00 PM – 8:00 PM at the Enoch Pratt Free Library Waverly Branch, 400 E 33rd St, Baltimore, Maryland. Each community focus group participant received $50 cash upon completion of the focus group as well as food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics
This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for Baltimore are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.
Community Focus Group Survey Results

Out of all community focus group participants (14 in total), half of them were long-time residents who have lived in Baltimore for 21 years or more. Seventy-one percent of participants fell under the 25-44 age cohort. The focus group had a relatively even distribution of female and male participants, and the majority (79%) were single. Half of the participants had a four-year college degree or a graduate degree, and a little over one-third (35%) were either less than high school or a high school/GED graduate. Furthermore, over two-thirds (65%) had household incomes of $49,000 or less, and no participants had household incomes of $150,000 or more. Similar to the City as a whole, Black/African American participants were the largest share (71%) across all racial groups. On the other hand, the focus group had a much higher representation of Hispanic individuals (43%) than the City (5% per 2017 ACS estimates).

### Community Focus Group Demographic

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th># Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>How long have you lived in this city?</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5 Years or less</td>
<td>1</td>
<td>8%</td>
</tr>
<tr>
<td>6-10 Years</td>
<td>2</td>
<td>17%</td>
</tr>
<tr>
<td>11-20 Years</td>
<td>3</td>
<td>25%</td>
</tr>
<tr>
<td>21-30 Years</td>
<td>2</td>
<td>17%</td>
</tr>
<tr>
<td>31 Years or more</td>
<td>4</td>
<td>33%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>12</td>
<td>100%</td>
</tr>
<tr>
<td><strong>Age</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>18-24 Years</td>
<td>1</td>
<td>7%</td>
</tr>
<tr>
<td>25-44 Years</td>
<td>10</td>
<td>71%</td>
</tr>
<tr>
<td>45-64 Years</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>65 and above</td>
<td>1</td>
<td>7%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>14</td>
<td>100%</td>
</tr>
<tr>
<td><strong>Gender</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>7</td>
<td>54%</td>
</tr>
<tr>
<td>Female</td>
<td>6</td>
<td>46%</td>
</tr>
<tr>
<td>Trans</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>13</td>
<td>100%</td>
</tr>
<tr>
<td><strong>Estimated Total Household Income (2017)</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than $25,000</td>
<td>4</td>
<td>29%</td>
</tr>
<tr>
<td>$25,000-$49,999</td>
<td>5</td>
<td>36%</td>
</tr>
<tr>
<td>$50,000-$74,999</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>$75,000-$99,999</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>$100,000-$149,000</td>
<td>1</td>
<td>7%</td>
</tr>
<tr>
<td>$150,000-$249,000</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>$250,000 or more</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>14</td>
<td>100%</td>
</tr>
</tbody>
</table>
Community Focus Group Survey Results

A little under half of the participants have school-age children (43%). More than three-fourths (77%) of participants did not bicycle with their children over the past year, and most participants (93%) learned how to ride a bicycle by age 12. In comparison to other focus group conducted as part of this project, the Baltimore community group had a larger share of participants that bicycled rarely to never (43%). Recreation (46%) was the main purpose for bicycling for most participants, followed by exercise/fitness (29%), and utility (25%). Road/touring/hybrid bike (46%) was the most popular bicycle type for participants. Most participants thought that bicycle infrastructure investments would positively and very positively affect their communities (86%).

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th>N Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Do you have school-age children (5-18 years) living in your household?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>6</td>
<td>43%</td>
</tr>
<tr>
<td>No</td>
<td>8</td>
<td>57%</td>
</tr>
<tr>
<td>Total</td>
<td>14</td>
<td>100%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th>N Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Have you ridden bicycles with any of your children in the past year?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>3</td>
<td>23%</td>
</tr>
<tr>
<td>No</td>
<td>10</td>
<td>77%</td>
</tr>
<tr>
<td>Total</td>
<td>13</td>
<td>100%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th>N Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>When did you learn to ride a bicycle?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>I don’t know how to ride a bike</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Between the ages of 2-12</td>
<td>13</td>
<td>93%</td>
</tr>
<tr>
<td>Between the ages of 12-18</td>
<td>1</td>
<td>7%</td>
</tr>
<tr>
<td>At the age of 18+ (as an adult)</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Total</td>
<td>14</td>
<td>100%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th>N Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bicycle Frequency</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Very Frequently</td>
<td>3</td>
<td>21%</td>
</tr>
<tr>
<td>Frequently</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Occasionally</td>
<td>5</td>
<td>36%</td>
</tr>
<tr>
<td>Rarely</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>Very Rarely</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>Never</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>Total</td>
<td>14</td>
<td>100%</td>
</tr>
</tbody>
</table>
Business Focus Group Survey Results

Out of all businesses represented by the business focus group participants (18 in total), over two-thirds (65%) of them were established in Baltimore for 21 years or more. Similar to the community focus group, the business focus group’s largest cohort of participants were between 25-44 years old (65%). While a little more than one-third (39%) of participants worked in professional services/offices or bank/financial services, close to two-thirds (61%) indicated “other” as their business type. Close to half of participants worked in businesses with over 150 employees, and the rest of the participants worked in businesses of varying sizes. Similar to community focus group participants, most of the business focus group participants (71%) were generally supportive of bicycle infrastructure and believed that bicycle infrastructure investments would help their businesses grow.

Driving was the primary mode of transportation to reach participants’ businesses for customers and employees – more than three quarters of participants indicated that 40-100% of their customers and employees drove to their businesses. Transit was also often used by customers and especially by employees. Rarely any customers or employees walked, biked or used Uber/Lyft/Taxi to get to participants’ businesses – more than half of the participants indicated that less than 20% of their customers and employees used these transportation modes. The results of the Baltimore business focus group survey reflect the city-wide trends. More than two-thirds (69%) of workers 16 years and above drove to work, followed by 18% of workers who took transit to work in 2017. In addition, 71% of all occupied housing units had access to at least one vehicle (2017 ACS estimates).
There were 14 participants in the Baltimore community focus group and 18 participants in the Baltimore business focus group. The following are key highlights from the community focus groups:

Community Focus Group

» Community focus group participants, especially those who identified as Black/African American and/or Hispanic/Latino, did not resonate and connect with images of bicyclists in print/social media because they usually portrayed a slim and fit person and were often associated with advertisements of healthy lifestyles and products. The sense of discouragement is captured in the following quote from an African American female participant:

“Whenever I see pictures of cyclists or anyone with a bicycle, I just automatically think it is not for me as someone who is over a size 10 and is black.”

» Most community focus group participants positively perceived bicyclists in the community as being healthy, environmentally conscious and brave for riding in traffic. However, some of them thought that bicyclists weren’t paying enough attention to traffic laws and were taking up too much space on the road.

» All community focus group participants did not see the local police as an effective partner for bicycle safety education and enforcement. They associated the police with abusive power after the Freddie Gray incident in 2015. Furthermore, a little over half of the participants thought that the local government/municipality would not be an effective partner because of the lack of effective long-term planning and community engagement for bicycle-related infrastructure projects.

» Negative perceptions of Baltimore’s public safety—partially derived from media portrayals of Baltimore—greatly affected people’s willingness to bike, especially for non-Baltimore residents.

» Only two out of 14 participants used the Baltimore Bike Share program previously and had a negative experience because the bicycles were heavy and uncomfortable and the app was difficult to use. Others expressed that they never tried the Baltimore Bike Share program because of the lack of available bicycles for rent in their neighborhoods.
There were 14 participants in the Baltimore community focus group and 18 participants in the Baltimore business focus group. The following are key highlights from the business focus groups:

**Business Focus Group**

» Among several challenges that discouraged business focus group participants’ employees and colleagues to bicycle to work, such as lack of bike parking, traffic safety, and poor road quality, lack of personal hygiene was identified as an important concern particularly for female bicyclists. They reflected that having decent presentation was crucial for work especially if they were going to meetings or seeing potential clients and customers.

» Business focus group participants pointed out there was a lack of equity and inclusivity of bicycle infrastructure investments in Baltimore – low-income communities typically did not receive adequate resources and funding to have proper pedestrian/bike-friendly infrastructure. As one participant pointed out:

> “In other parts of the city...where there are just people living and those people are people of color, they see the investments aren’t being made in their communities; they see that there’s an inequity of investment and that’s a real problem...Until we get ahead and build support with a real mindfulness, I think that we’re going to continue to have these issues about bike lanes being for white people.”

» Business focus group participants stated that the broader business community would have ambivalent/negative views towards bicyclists. Participants remarked that businesses would not associate bicyclists as their potential customers or employees – they would perceive bicycling as a novelty and not as a viable form of transportation.

» Similar to the community focus group, business focus group participants also positively perceived cyclists that patronized their businesses and those who bicycled in their communities as being brave, healthy and cost-efficient. A few of them reflected that they enjoyed seeing bicycle infrastructure being used by bicyclists. However, they were also concerned and unhappy when bicyclists were not following traffic laws.

» Business focus group participants remarked that bicycling was a very divisive issue particularly between cyclists and drivers and between those who were against and those who were supportive of bicycle infrastructure in Baltimore. Participants agreed that having more people bicycling would help to mediate potential conflicts among different interest groups. As one participant adequately described:

> “People who are against bike infrastructure can be as nasty as they want to be, but people who ride bikes have to be just on their best behavior at all times in order to even exist. I think that’s very frustrating. I think there’s a leadership problem. I think honestly one of the best ways is just to have more people riding.”

» The three business focus group participants that tried the Baltimore Bike Share program before stated that the program was not very successful. On the other hand, while there were mixed reviews about the e-scooter program, participants who tried e-scooters before had more positive feedbacks, as they were more convenient to use for commuting purposes.
Focus Group Methodology
With assistance from PeopleForBikes, VTC worked with staff from Bicycle Colorado to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. Both focus groups were facilitated by Charles T. Brown of VTC and were held on November 8, 2019. The business focus group included 9 participants and was held from 9:00 AM – 10:30 AM. Breakfast was provided. The community focus group included 9 participants and was held from 12:00 PM – 1:30 PM, with lunch provided, and each community focus group participant received $50 cash upon completion of the focus group. Both focus groups were held at The Alliance Center, 1536 Wynkoop St., Denver, Colorado.

Focus Group Demographics/Business Characteristics
This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for Denver are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.

The following page covers focus group survey findings and highlights from the focus group discussions.
Community Focus Group Survey Results

Community focus group participants (9 in total) have lived in Denver for varied lengths of time - half resided in the City for up to 20 years, with the other half living in Denver for 31 years or more. Participants were distributed across the age spectrum, with 55% 45 years old and above. Male and female participants were evenly split, and two-thirds of participants were married/in a civil union. Overall, the group had high educational levels - 78% of participants had either a four-year or a graduate degree. Household incomes varied from less than $25,000 to as high as $100,000 to $149,000. Similar to the City’s population as a whole, White focus group participants were the largest share (67%), followed by Black/African American (22%), and Hispanic (22%) participants.
Community Focus Group Survey Results

While a little under half of the participants (44%) had school-age children, Denver had the highest share of participants (56%) who bicycled with their children in the past year out of all community focus groups that were conducted in this study. The majority of participants (78%) learned to bicycle by age 12, and 44% of the participants bicycled on a very frequent to frequent basis. All participants primarily used road/touring/hybrid bicycles. Except for one person, all participants agreed that bicycle infrastructure would very positively to positively affect their communities.

### COMMUNITY FOCUS GROUP DEMOGRAPHIC

<table>
<thead>
<tr>
<th>DEMOGRAPHIC VARIABLES</th>
<th># Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Do you have school-age children (5-18 years) living in your household?</td>
<td>Yes</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>5</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>9</td>
</tr>
<tr>
<td>Have you ridden bicycles with any of your children in the past year?</td>
<td>Yes</td>
<td>5</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>9</td>
</tr>
<tr>
<td>When did you learn to ride a bicycle?</td>
<td>I don't know how to ride a bike</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>Between the ages of 2-12</td>
<td>7</td>
</tr>
<tr>
<td></td>
<td>Between the ages of 12-18</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>At the age of 18+ (as an adult)</td>
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</tr>
<tr>
<td></td>
<td>Total</td>
<td>9</td>
</tr>
<tr>
<td>Bicycle Frequency</td>
<td>Very Frequently</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td>Frequently</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td>Occasionally</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td>Rarely</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>Very Rarely</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>Never</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>9</td>
</tr>
</tbody>
</table>

### COMMUNITY FOCUS GROUP DEMOGRAPHIC

<table>
<thead>
<tr>
<th>DEMOGRAPHIC VARIABLES</th>
<th># Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bicycle Trip Purpose</td>
<td>Utility</td>
<td>5</td>
</tr>
<tr>
<td></td>
<td>Recreation</td>
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</tr>
<tr>
<td></td>
<td>Exercise/Fitness</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>Racing</td>
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<tr>
<td></td>
<td>Total</td>
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</tr>
<tr>
<td>Bicycle Type</td>
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<tr>
<td></td>
<td>Folding Bicycle</td>
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</tr>
<tr>
<td></td>
<td>Road, Touring and/or Hybrid</td>
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</tr>
<tr>
<td></td>
<td>BMX, Mountain, Cyclo-cross</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>8</td>
</tr>
<tr>
<td>How would investments and policies in bicycle infrastructure affect your community?</td>
<td>Very Negatively affect</td>
<td>0</td>
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<tr>
<td></td>
<td>Negatively affect</td>
<td>1</td>
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<td></td>
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<td></td>
<td>Very Positively</td>
<td>5</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>9</td>
</tr>
</tbody>
</table>
Business Focus Group Survey Results

Two-thirds of business focus group participants (66%) worked in relatively new businesses that were established in the past ten years. The business focus group had a younger demographic than the community group, with 57% of participants between 25-44 years old. Close to half of participants (44%) worked in professional services/office, one worked in retail, and the rest selected “other” as their business type. Participants worked in businesses of various sizes, with a third at businesses with 0-20 employees, and almost half at businesses with over 150 employees. Over half of participants thought bicycle infrastructure would help their businesses grow, and with the remainder identifying a neutral impact on their businesses.

Most businesses represented did not report high shares of employees and customers who walk or bicycle to their businesses. Two businesses estimated that 20-60% of their customers took transit to reach them, and five businesses estimated that 20-60% of their employees took transit to work. There was a very small percentage of employees and customers who used rideshare services. Driving remains the predominant mode for customers and employees of most businesses represented. The distribution of transportation modes among participants’ customers and employees reflects city-wide trends, where driving was the most popular means of transportation to work for those above 16 years old (78%) and where 90% of occupied housing units in Denver had access at least one vehicle (2017 ACS estimates).
DENVER, CO // FOCUS GROUP HIGHLIGHTS

There were nine participants in the Denver business focus group and nine participants in the Denver community focus group. The following are key highlights from the community focus groups:

Community Focus Group

» All participants owned or had regular access to a bicycle except for one participant due to disabilities. They were most comfort bicycling in their local neighborhoods, followed by sidewalks and separated bike paths.

» When participants were asked about family and friends’ reactions if they start to bicycle, some of them commented that family and friends who also bicycled on a regular basis would be supportive, while those who did not bicycle would be concerned and would think participants are “crazy” for spending so much time to bicycle for commuting purposes.

» Most participants who identified as Black/African American or Asian did not think that they were properly represented in the promotion of bicycles in the City through media. Other participants commented that bicycle advertisements often portrayed bicycling as a recreational activity, and not necessarily as a legitimate mode of transportation for commuting purposes. Participants, including one who had disabilities, remarked that diverse representation in bicycle advertisement is important to encourage more people to feel comfortable bicycling in the community and to incorporate more perspectives in conversations around bicycles.

“No [I don’t feel represented], but it is important to me because I want to see my community healthy, I want to see people of color represented in that category. My community is suffering because we are not healthy... I would love to see people of color women or men representing outdoor activities, healthy living, lifestyle because I think it is contagious.”

» All participants, except one, had not tried the bike-share system (BCycle) in Denver. Some participants never tried it because they used their personal bicycles, and others had negative opinions about bike share because a lot of people improperly parked dockless bikes, which blocked the public right-of-way.

» Less than one-third of the participants thought that the local police could be an effective partner to enforce safe bicycle regulations because of the community’s negative relationship with the police, and the police’s lack of knowledge on bicycle regulations. Some also noted that the police seemed to prioritize the interests of drivers over bicyclists on the road.

» Aside from factors such as time and weather, participants responded that past experiences of near-hits or crashes with drivers while bicycling, lack of connectivity and safe routes for bicycling, such as on Federal Avenue, and lack of bicycle repair skills inhibited them to bicycle more frequently.

» In terms of e-scooters, participants thought that there is a lack of community outreach from the government to enforce e-scooter regulations, especially when regulations were changed. They were particularly concerned about underage riding and having more than one rider per e-scooter. However, some participants also noted that the e-scooter program not only has provided another option for first-/last-mile trips, but also has created a new group of people who would advocate for better infrastructure and stronger street and neighborhood connectivity for vulnerable road users.
DENVER, CO // FOCUS GROUP HIGHLIGHTS

There were nine participants in the Denver business focus group and nine participants in the Denver community focus group. The following are key highlights from the business focus groups:

Business Focus Group

» All business focus group participants knew how to ride a bicycle and everyone had bicycled in the past year. Almost all participants rode for both commute and recreational purposes. However, one participant who was on a bicycle race team commented that it is crucial to make downtown Denver safer to encourage more people to commute via bicycling because even some participants of the race team did not feel comfortable riding in downtown Denver.

“I think a lot of it is a form of recreation. I think that is how it is perceived. I think you need to make it a lot safer for people to ride their bikes downtown. I am on a race team and there are people who would not ride downtown or the Cherry Creek path because they envision it as not being safe. Racers bike on the streets, but not downtown.”

» All participants thought that helmets should not be mandatory for bicyclists.

» In comparison to other business focus groups that were conducted for this study, there were more businesses in the Denver focus group (67%) that provided incentives, such as indoor bicycle parking and showers, for employees who commuted via bicycles. Participants reflected that there is a growing number of businesses in Denver that are providing bicycle amenities because not only are they crucial for businesses to get LEED-certification, but also are becoming an important quality that prospective employees seek in companies. While most participants indicated that larger corporations are usually less supportive of bicycle infrastructure, some participants pointed out that it is easier for larger non-retail businesses than smaller businesses to provide bicycle-related amenities as it has the financial capability and the physical space to do so.

» Participants pointed out that younger millennial-age customers from smaller and recently started firms/organizations would be more likely to be interested in bicycling. However, some clients would not bicycle to participants’ offices especially if they needed to dress up for meetings or other work purposes. (continues on next page)
DENVER, CO // FOCUS GROUP HIGHLIGHTS

There were nine participants in the Denver business focus group and nine participants in the Denver community focus group. The following are key highlights from the business focus groups:

Business Focus Group

(continued from previous page)

» Whereas other business focus groups conducted in this study indicated that the broader business community would have negative views towards bicycle infrastructure, Denver participants reflected that the broader business community was becoming more supportive of bicycling infrastructure because it raises property values and provides alternative mode of transportation to promotes healthy living for employees.

» When participants were asked to picture bicyclists in their community, most of them saw White cyclists as the norm.

» While most participants were supportive of bicycle infrastructure, they also pointed out numerous concerns. Participants commented that the greater Denver population would be frustrated if a bike lane replaces a car lane or parking spaces, or if bike infrastructure construction requires them to detour from their usual routes. Some were concerned that adding bicycle infrastructure might become a means of gentrification in historically underserved neighborhoods. They emphasized that bicycle infrastructure planning must incorporate protected bike lanes and ensure strong connectivity and must happen in tandem with effective education/enforcement initiatives to promote safe riding.

» One participant indicated that her business was part of a pilot program through Bicycle Colorado called Neighborhood Navigators, where really experienced bicyclists would accompany people who were less comfortable with bicycling on commute trips to destinations such as downtown Denver. Some participants noted that programs such as Neighborhood Navigators are important for encouraging more people to bicycle downtown, especially since existing bicycle trails are congested. Interestingly, most participants of the program were women.

» Participants were generally supportive of e-scooters because it is convenient, and it provides a non-motorized form of transportation for individuals who previously would not bicycle/walk or would typically use rideshare services. However, participants also pointed out several concerns related to safety and e-scooter speed and suggested that there should be more education and enforcement around e-scooter use. One participant was concerned about the ramifications when pilot programs end or when e-scooter companies are pulled out from cities, as those who use e-scooters to commute would revert to driving or other motorized forms of transportation.

“I’ve seen people fall off the scooter and blood everywhere right in front of me when I was in a restaurant, so I know the impact they have for injuries...You know, and that’s what gets the news, but a lot more people die in cars every day, and it’s not on the news.”
Focus Group Methodology
With assistance from PeopleForBikes, VTC worked with staff from the City of Fort Collins, Colorado to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. Both focus groups were facilitated by Charles T. Brown of VTC and were held on August 29, 2018. The business focus group included 12 participants and was held from 5:00 PM – 6:30 PM. The community focus group included 16 participants and was held from 7:00 PM – 8:30 PM. Both focus groups were held at the Old Town Library, 201 Peterson Street – Community Room 1 & 2. Each community focus group participant received $50 cash upon completion of the focus group, and both focus groups received food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics
This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for Fort Collins are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.

The following page covers focus group survey findings and highlights from the focus group discussions.
Community Focus Group Survey Results

Community focus group participants (16 in total) have lived in Fort Collins for varied lengths of time, ranging from five years or less to 31 years or more. A little under half of the participants fell in the 25-44 age cohort (44%) and the other half fell in the 45-64 age cohort (50%). A little over half of the participants (56%) were female, and about two-thirds of the participants were married/in civil union or living with a partner (63%). Most participants had either a four-year college degree (56%) or a graduate degree (25%). Furthermore, the distribution of household incomes for community focus groups participants was concentrated in the $50,000 to $149,000 range (81%). Similar to the City as a whole, the focus group had a majority of White participants (80%) and non-Hispanic participants (86%).

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th># Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>How long have you lived in this city?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5 Years or less</td>
<td>3</td>
<td>21%</td>
</tr>
<tr>
<td>6-10 Years</td>
<td>3</td>
<td>21%</td>
</tr>
<tr>
<td>11-20 Years</td>
<td>3</td>
<td>21%</td>
</tr>
<tr>
<td>21-30 Years</td>
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<td>14%</td>
</tr>
<tr>
<td>31 Years or more</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>Total</td>
<td>14</td>
<td>100%</td>
</tr>
<tr>
<td>Age</td>
<td></td>
<td></td>
</tr>
<tr>
<td>16-24 Years</td>
<td>1</td>
<td>6%</td>
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<tr>
<td>25-44 Years</td>
<td>7</td>
<td>44%</td>
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<tr>
<td>45-64 Years</td>
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<td>65 and above</td>
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<td>0%</td>
</tr>
<tr>
<td>Total</td>
<td>16</td>
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</tr>
<tr>
<td>Gender</td>
<td></td>
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<tr>
<td>Male</td>
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<td>Female</td>
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<td>Trans</td>
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<tr>
<td>Total</td>
<td>16</td>
<td>100%</td>
</tr>
<tr>
<td>Estimated Total Household Income (2017)</td>
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</tr>
<tr>
<td>Less than $25,000</td>
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<tr>
<td>$25,000-$49,000</td>
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<td>0%</td>
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<td>$250,000 or more</td>
<td>1</td>
<td>6%</td>
</tr>
<tr>
<td>Total</td>
<td>16</td>
<td>100%</td>
</tr>
</tbody>
</table>
Community Focus Group Survey Results

Most focus group participants were childless (93%), and more than two-thirds of them (69%) did not bicycle with their children in the past year. All participants learned how to ride the bicycle by age 12. In comparison to other focus groups conducted as part of this project, the Fort Collins group participants had the highest number of participants who bicycled very frequently (60%) and frequently (20%). Recreation was the most common bicycle purpose (44%), followed by utility (31%). Road/touring/hybrid bikes was the most popular bicycle type that community focus group participants used (73%). Lastly, all community focus group participants thought that bicycle infrastructure investments would very positively (75%) and positively (25%) affect their communities.
Business Focus Group Survey Results

A little over half of the business focus group participants worked in businesses that were established for 21 years or more. In comparison to the community focus group’s age distribution, the business focus group skewed a little older, with three-fourths of the participants in the 45-64 age cohort. While 58% worked in retail, professional services/office, bank/financial services, or manufacturing, 42% selected “other” as their business type. Participants worked in businesses of various sizes, with 42% of them working in businesses with zero-20 employees. While all community focus group participants were supportive of bicycle infrastructure investments, 36% of business focus group participants were unsure or neutral about the effects of bicycle infrastructure investments on their businesses.

Most of the businesses had fewer than 20% of their customers and employees who reached them via walking, bicycling, taking transit, or using rideshare/taxi. Driving is the most common transportation mode, as most businesses estimated that at least 40% of their customers and employees drove. The distribution of transportation modes among participants’ customers and employees reflect city-wide trends, where 80% of workers 16 years old and older used a car/truck/van as their primary means of transportation, and 95% of occupied housing units in Fort Collins had at least one available vehicle (2017 ACS estimates).
There were 16 participants in the Fort Collins community focus group and 12 participants in the Fort Collins business focus group. The following are key highlights from the community focus groups:

**Community Focus Group**

» The Fort Collins community focus group participants were all relatively active cyclists. All participants from the community focus group knew how to bike, had access to a bicycle, and had ridden their bikes in the past year. Bicycle was also the preferred transportation mode for most of the participants.

» Most community focus group participants did not identify with representations of bicyclists in print or social media primarily because of their race/ethnicity, age, and lack of athleticism.

» On a scale of one to five, one being not so common and five being very common, most participants indicated a three or above for seeing women, children and families on bicycles in their communities. Participants from other cities did not see women, children, and families on bicycles as much as participants in the Fort Collins community focus group.

» Most participants responded that they were comfortable bicycling on bicycle lanes, bicycle paths, and low volume/neighborhood streets. Some of them were comfortable biking anywhere as long as there is a road shoulder.

» The majority of participants did not view the police as an effective partner for bicycle safety and education because they were not trained well. In fact, there was already a robust volunteer program that teaches the public on bicycle safety.

» While participants in the community focus group thought that e-scooter is a good alternative especially for those who are less comfortable to ride a bicycle, they were also concerned about bicyclists’ safety when e-scooters use bike lanes as most crashes happen when there is a big disparity in speed on the road.
There were 16 participants in the Fort Collins community focus group and 12 participants in the Fort Collins business focus group. The following are key highlights from the business focus groups:

Business Focus Group

- Similar to the community focus group, all business focus group participants knew how to ride a bicycle, had access to a bicycle and had ridden a bicycle within the past 12 months.

- Business focus group participants remarked that they pictured a white athletic male wearing spandex and using an expensive bike/bicycle equipment as a typical bicyclist. However, some of them indicated that their perceptions of a typical cyclist varied across different geographic contexts (Old Town/Downtown versus exurban parts of Fort Collins). As participants remarked:
  
  “What I first thought of was a middle-aged lycra guy, but when I really thought about it for a couple of minutes, I realized that is not what I see day to day. I see families and I see all kinds of people using bikes.”

  “If you use the terminology cyclists, I am picturing spandex-wearing, full-on gear...a $6000 or $8000 bike, hammering down the country roads. A lot of it depends on the environment that I put myself in. If I am in town here...I think of the gal in a skirt, without the helmet checking her phone, maybe pulling the dog on the other hand on the leash. If I am in the neighborhood around a bike trail, I think of the kids.”

- In comparison to other business focus groups’ mixed responses towards bicycle infrastructure, the business focus group participants in Fort Collins all thought that it would be extremely beneficial for the city to invest in bicycle infrastructure.

- The broader business community supported bicycling in the abstract because it is part of Fort Collins’ brand and culture. However, most businesses would not actually invest in bicycle-related infrastructure and amenities and would also think bicyclists as a hindrance especially when they drive. As one participant commented:
  
  “I think a lot of businesses don’t want to invest in racks. They don’t want to take up parking spaces. When it comes to actually make it happen, it’s more difficult. In the abstract, good.”

- Participants concurred that motorists that also bicycled were more empathetic of other cyclists’ vulnerability on the road but also were less tolerant when cyclists on the road demonstrate bad behavior.

- Participants expressed that businesses should play a role in removing barriers to bicycling because encouraging people to be more active could contribute to the general wellbeing of the workplace. They also noted that businesses should organize small workshops on bicycle safety training and provide transportation support especially for Hispanic and late-night workers.

- While business focus group participants were generally in favor of helmets, they saw helmet use as situational and activity based. Some of them associated people who wear helmets as recreational cyclists, and they saw those who don’t wear helmets as commuting or doing errands. Participants with children thought that helmets must be mandatory for children who are riding bicycles.

- Similar to the community focus group, all business focus group participants thought positively of e-scooters as an environmentally-friendly transportation mode. However, they were concerned about bicyclists safety when e-scooter users share the bike lane and travel at a faster speed.
Focus Group Methodology
With assistance from PeopleForBikes, VTC worked with staff from the City of Memphis, Tennessee to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. Both focus groups were facilitated by Charles T. Brown of VTC and were held on March 29th and 29th, respectively. The business focus group included 8 participants and was held from 7:15 AM – 8:45 AM at the office of BLDG Memphis, which is located at 1680 Jackson Ave., Memphis, TN 38107. Breakfast was provided. The community focus group included 12 participants and was held from 6:30 PM – 8:00 PM at the Revolutions Bicycle Co-Op, which is located at 1000 S. Cooper St., Memphis, TN. Each community focus group participant received $50 cash upon completion of the focus group as well as food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics
This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for Memphis are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.
Community Focus Group Survey Results

Half of the community focus group participants have lived in Memphis for 21 years or more, with the balance of participants who lived in Memphis ten years or less. Close to half (42%) of participants fell under the 25-44 age cohort, followed by those who belonged to the 45-64 age cohort (33%). There was a fifty-fifty split between female and male participants and about two-thirds were single (67%). Most participants had either a four-year college degree (42%) or a graduate degree (50%). Moreover, half of the community group participants had incomes $49,000 or less, which is a lower percentage than the City as a whole (61% per 2017 ACS estimates). The focus group had the same number of White and Black/African American participants (42%). Both the focus group (75%) and the City (93% per 2017 ACS estimates) had a larger share of non-Hispanic population than their Hispanic population.
Community Focus Group Survey Results

Most participants did not have children (83%), and over three-fourths had not ridden bicycles with children in the past year. All participants learned how to bicycle by age 12. One-third of the participants bicycled very frequently to frequently, 42% bicycled occasionally, and 25% bicycled rarely to never. Recreation was the dominant purpose for bicycling (48%), and close to three-fourths of the participants (73%) used a road/touring/hybrid bicycle. Most participants thought that bicycle infrastructure investments would positively to very positively affect their communities.
Business Focus Group Survey Results

The businesses represented in the business focus group (8 in total) were established in Memphis for varied lengths of time. Half of the focus group fell under the 25-44 age cohort, with the balance of participants who were 45 and above. Sixty-four percent of participants worked in personal service (13%), professional services/offices (13%), hotel/lodging (13%), and restaurant/food services (25%); the rest of the participants (38%) selected “other” as a business type. Three-fourths of the businesses represented were small businesses with zero to 20 employees. While all community group participants were supportive of bicycle infrastructure investments, business group participants had mixed opinions on the impact of bicycle infrastructure investments on their businesses – less than half (43%) were supportive of bicycle infrastructure investments, and the rest were neutral, unsure, concerned, or had other opinions about them.

Most businesses had fewer than 20% of their customers and employees who reached them via walking, bicycling, transit or rideshare/taxi, and most businesses had less than 10% customers and employees who order/do delivery services. Driving remains the most common transportation mode, as most businesses estimated that at least 40% of their customers and employees drove. The distribution of transportation modes among participants’ customers and employees reflects city-wide trends, where driving was also the most popular means of transportation to work for those above 16 years old (91%), and where 89% of occupied housing units in Memphis had at least one available vehicle (2017 ACS estimates).
There were 12 participants in the Memphis community focus group and eight participants in the Memphis business focus group. The following are key highlights from the community focus groups:

Community Focus Group

» When participants were asked to visualize a typical cyclist, most community focus group participants saw a white male who usually had expensive bicycle gear and clothing.

» Female community focus group participants who identified as African American responded that having diverse representation in bicycle-related advertisement would motivate and encourage other African American females to bicycle more – “Oh she is black, I can do that too.”

» Female community focus group participants expressed the lack of personal safety that they experienced while bicycling. All female participants responded that male cyclists would make comments to them while they bicycled. As one female participant expressed:

  “Sense of envy that they [male bicyclists] feel comfortable enough to ride and feel safe enough. That’s something I cannot get over – feeling safe to ride.”

» Forty-two percent of community focus group participants have used bike share bicycles. Most of them reflected that the bike share bicycles were heavy and difficult to use, but they could be beneficial and convenient for short trips.

» Almost half of the participants (most of whom identified as a racial minority) viewed personal hygiene as an important factor when deciding their method of travel; in addition, almost half of the participants (most of whom identified as female) viewed ability to repair and maintain bicycles as an important factor when deciding their means of transportation due to concerns over time and safety.

  “I have friends that commute and they have definitely gotten flats. I just thought about that happening to me and being lost and stranded. Not getting to work on time, not having anyone to help, being stuck with my bike.”

» Community focus group participants pointed out that they felt most uncomfortable bicycling on roads without a shoulder/bike lane; in particular, almost all participants specified Poplar Avenue and Union Avenue as unsafe roads for bicycling.

» Two-thirds of participants viewed the police as an effective partner and all participants viewed the local bike shop/collective as an effective partner for bicycle safety education and enforcement. Three-quarters of the participants saw the local government as an effective partner, but one-quarter of them disagreed because the government’s previous efforts that polarized the city, and the government’s detachment from communities. All except one participant agreed that racial segregation was still a problem in Memphis – “The City is divided…racially divided and economically divided.”
MEMPHIS, TN // FOCUS GROUP HIGHLIGHTS

There were 12 participants in the Memphis community focus group and eight participants in the Memphis business focus group. The following are key highlights from the business focus groups:

**Business Focus Group**

» Different from the image of a typical cyclist portrayed in the community focus group, most business focus group participants pictured an African American male with an inexpensive bicycle who was not abiding by traffic rules.

» Some business focus group participants pointed out that the time of day that employees get out of work is a major barrier for them to bicycle to and from work. For instance, one participant’s colleagues who got out of work after 2am would not bicycle home even if they bicycled to work. Another participant suggested that having wall-mounted vertical bike racks at the office would give late-night employees a safe option for bicycle storage.

» Participants collectively portrayed three perceptions of cyclists in the community. They enjoyed seeing cyclists who bicycled for exercise and fun; they were concerned over the safety of cyclists who rode on high traffic and dim roads; they were annoyed by groups of cyclists, often white males with bicycle outfit and gear, who took up too much space on the road.

> A group of bikers with spandex, helmets. About 30 of them riding down Quince...They’re all white, mostly, about 5% African American and no women. Sometimes really rude...just not allowing to share the roadway. Or yelling, ‘get out of the way.’

> "From what I’ve seen in Memphis and a lot of areas, the bike lanes are unutilized and a waste of money and a waste of a lane of traffic in so many areas where the traffic is already bad. All it does is congesting people over into one or two lanes."

» While participants had positive perceptions of customers who patronized their businesses via bicycles, they conveyed that the broader business community would have a more ambivalent or negative view towards bicycling in the city because bicycle lanes might take away parking spaces for their existing customers.

» A few business focus group participants expressed that one challenge for the city to invest in more bicycle infrastructure in Memphis is the lack of usage of bicycle infrastructure. Participants noted that a bike lane is not considered under-utilized when it is used by 20-50 people per hour.
Focus Group Methodology
With assistance from PeopleForBikes, VTC worked with staff from the City of New Orleans, Louisiana to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. Both focus groups were facilitated by Charles T. Brown of VTC and were held on December 4, 2018. The focus group took place immediately following each other between the time of 5:00 PM – 8:00 PM at the Rosa F. Keller Library in Broadmoor, New Orleans, LA. The business focus group included 10 participants and the community focus group included 8 participants. Each community focus group participant received $50 cash upon completion of the focus group and both groups received food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics
This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for New Orleans are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.

The following page covers focus group survey findings and highlights from the focus group discussions.
Community Focus Group Survey Results

Community focus group participants (8 in total) have lived in New Orleans for varied lengths of time, ranging from 5 years or less to 31 years or longer. Almost two-thirds of participants (63%) fell in the 45-64 age cohort, with the balance in the 25-44 age cohort. There was a fifty-fifty split between male and female participants, as well as between those who were single and those who were married/lived in a civil union. Most participants had either a four-year college degree (50%) or a graduate degree (38%).

The household incomes of community group participants varied from less than $25,000 to as high as $150,000 to $249,000. Similar to the City as a whole, Black/African American focus group participants were the largest share (57%), followed by White participants (43%).
Community Focus Group Survey Results

Community participants were generally evenly split between those with and without school-age children living at home. Just over half indicated they rode bikes with their children over the past year and almost all learned to bicycle by age 12. In comparison to other focus groups conducted as part of this project, the New Orleans community group had a higher number of participants who bicycled very frequently (57%) and frequently (14%). Compared to the groups from other cities where recreational use was predominant, the New Orleans community group had a higher percentage of people whose primary purpose for bicycling was for transportation (45%). Lastly, three-quarters of participants thought that bicycle infrastructure investments would very positively (57%) or positively (29%) affect their community.
Business Focus Group Survey Results

Half of the businesses represented in the focus group (5 total) had been in operation in New Orleans for 11 to 20 years. Only one business had been operating for over 20 years with the balance open for 10 years or less. Similar to the community focus group, the business focus group’s largest cohort of participants were between 45-64 years old (50%). While about 40% of participants worked in either the retail, hotel/lodging, or institutional sectors, most participants selected “other” as their business type. The majority of the businesses represented were small, with 70% of participants working in businesses with 20 or fewer employees. Participants were generally supportive of bicycle infrastructure – 70% thought bicycle infrastructure investments would help their businesses grow and 30% thought that their businesses would be unaffected by bicycle infrastructure investments.

With the exception of a few business where most customers arrived via bicycle or on foot, most businesses had fewer than 20% of their customers who reached them via walking, bicycling, transit or rideshare/taxi. In comparison to the business groups in the other cities that are part of this study, there were more New Orleans businesses with employees or customers who bicycled to work or to shop. Nonetheless, driving remains the most common transportation mode, as most businesses estimated that at least 40% of their customers and employees drove. The distribution of transportation modes among participants’ customers and employees reflects city-wide trends, where driving was also the most popular means of transportation to work for those above 16 years old (78%) and where 81% of occupied housing units in New Orleans had at least one available vehicle (2017 ACS Estimates).
NEW ORLEANS, LA // FOCUS GROUP HIGHLIGHTS

There were ten participants in the New Orleans business focus group and eight participants in the New Orleans community focus group. The following are key highlights from the community focus groups:

Community Focus Group

» All community focus group participants owned or had access to a bicycle. All of them knew how to ride a bicycle. Six out of seven have ridden in the past year.

» When asked to visualize the typical cyclist, a few participants pictured people using bike share (blue bikes). Participants noted that bike ridership increased in New Orleans after Hurricane Katrina; in particular, there are now more women, children and families on bikes in neighborhoods partly because blue bikes were brought into the City. However, only two participants had previously tried using bike share. There was consensus that the City’s bike share program should be more affordable.

» Three participants were comfortable bicycling anywhere and another two noted that they were comfortable bicycling anywhere except over bridges and on major roads. Compared to participants from other cities, community focus group participants from New Orleans were more comfortable bicycling on roads and in traffic.

» Most participants expressed that better bicycle infrastructure and connectivity across neighborhoods would encourage them to bicycle more frequently.

» All participants agreed that bike shops and the local government can be effective partners to promote bicycle safety. Participants also pointed out that city government has the power to improve bicycling infrastructure and to educate citizens on safe use of bike share. All participants agreed that the police are not an effective partner because they viewed cars with greater priority than bicycles on the roads. However, when further probed, participants indicated that the local police might have the potential to become an effective partner if they receive specific bicycle safety and enforcement training.

“"If the city says it is important, then it makes other people think that it is important as well.”

“"[The police] would be [an effective partner], but they aren’t informed of bike rules or how things operate. Cops take sides with the cars.”
There were ten participants in the New Orleans business focus group and eight participants in the New Orleans community focus group. The following are key highlights from the business focus groups:

**Business Focus Group**

» Participants differentiated “cyclist” from “bicyclist.” Most business focus group participants perceived bicyclists as “regular” “everyday” riders and “cyclists” as people who ride or train more seriously.

» All business focus group participants really enjoyed their previous bicycle experiences. Participants enjoyed being healthy and active, being in nature, learning more about the city, having a greater sense of community, as well as having time to be alone.

  “Being a part of nature because you notice things. It’s like you are up in the air, like on a carpet instead on a bike.”

  “You are allowed to be you and it can be your time without anybody else.”

  “[Cycling] has an effect on the way I think about things and it’s hard to be in a bad mood after I had a good ride, even if it is in the rain or thunderstorm. I might be soaked to the bone but it’s quite fun too. I feel better after a ride.”

» Business focus group participants agreed that businesses should play a larger and more active role in encouraging and incentivizing their employees to bicycle more.

» Business focus group participants expressed concern that the broader business community would not have a positive view of bicycling because they would prioritize the need for on-street parking over bicycle infrastructure.

  “I strongly agree that most of the businesses do not agree with bikes or bike lanes. They believe that cars are the priority. They have to have parking spaces…”

» All participants except for one thought that it would be beneficial for the city to invest in bicycle infrastructure in their neighborhoods; however, they also expressed several concerns, such as lack of community engagement with planning efforts, as well as the lack of safety education for both bicyclists and motorists.

» Business focus group participants felt that bicycle safety education should be provided through the DMV and incorporated in driver’s education and driver’s license renewal systems. Participants also thought that the police (NOPD) should have more community engagement around bicycle safety laws and should issue tickets to bicyclists who do not follow traffic laws.
Focus Group Methodology

With assistance from PeopleForBikes, VTC worked with staff from the NYC Department of Transportation to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. The business focus group included 2 participants and was facilitated by Charles T. Brown of VTC. It was held on February 25, 2019, from 7:00 PM – 8:30 PM at the Elmhurst Hospital, 79-01 Broadway, Elmhurst, New York 11373. Food and drinks were provided. The community focus group included 13 participants and was facilitated by James Sinclair of VTC. It was held on February 21, 2019, from 7:00 PM – 8:30 PM at the Elmhurst Hospital, 79-01 Broadway, Elmhurst, New York 11373. Each community focus group participant received $50 cash upon completion of the focus group as well as food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics

This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for New York City are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.

The following page covers focus group survey findings and highlights from the focus group discussions.
Community Focus Group Survey Results

Community focus group participants (13 in total) have lived in New York City for varied lengths of time, with 46% of participants who lived in the City for 31 years or more. Seventy-percent of the participants were 45 years old or older, with the balance of participants who were between 25-44 years old. There was a relatively even split between male and female participants, and a little more than two-thirds of participants were single. More than two-thirds of participants had a four-year college degree (69%), and all participants had at least some college experience.

Almost three-quarters of the participants were in the $25,000-$49,000 or $50,000-$74,999 income ranges, which was a lot higher than the City’s percentage (34% per 2017 ACS estimates). The focus group had a similar share of White participants (43%) as the City but had zero percent of Black/African American participants. The New York City focus group had the highest percentage of Asian participants (27%) out of all other community focus groups conducted in this study and had a comparable share of non-Hispanics participants (77%) as the City (71% per 2017 ACS estimates).
Community Focus Group Survey Results

About three-quarters of participants did not have any school-age children, did not ride with their children in the past year, and learned how to bicycle by age 12. Sixty-one percent of participants rode their bicycles frequently (46%) and very frequently (15%), with the balance of participants who bicycled occasionally (15%) and rarely (23%). Recreation was the primary purpose for bicycling for half of the participants, and most people owned a road/touring/hybrid bike. The majority of participants thought that bicycle infrastructure investments would positively and very positively affect their communities, with 18% of participants who thought that bicycle infrastructure would have negative and very negative impacts.

### Community Focus Group Demographic

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th>Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Do you have school-age children (5-18 years) living in your household?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>3</td>
<td>23%</td>
</tr>
<tr>
<td>No</td>
<td>10</td>
<td>77%</td>
</tr>
<tr>
<td>Total</td>
<td>13</td>
<td>100%</td>
</tr>
<tr>
<td>Have you ridden bicycles with any of your children in the past year?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>3</td>
<td>25%</td>
</tr>
<tr>
<td>No</td>
<td>9</td>
<td>75%</td>
</tr>
<tr>
<td>Total</td>
<td>12</td>
<td>100%</td>
</tr>
<tr>
<td>When did you learn to ride a bicycle?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>I don’t know how to ride a bike</td>
<td>1</td>
<td>8%</td>
</tr>
<tr>
<td>Between the ages of 2-12</td>
<td>10</td>
<td>77%</td>
</tr>
<tr>
<td>Between the ages of 12-18</td>
<td>1</td>
<td>8%</td>
</tr>
<tr>
<td>At the age of 18+[as an adult]</td>
<td>1</td>
<td>8%</td>
</tr>
<tr>
<td>Total</td>
<td>13</td>
<td>100%</td>
</tr>
<tr>
<td>Bicycle Frequency</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Very Frequently</td>
<td>2</td>
<td>15%</td>
</tr>
<tr>
<td>Frequently</td>
<td>6</td>
<td>46%</td>
</tr>
<tr>
<td>Occasionally</td>
<td>2</td>
<td>15%</td>
</tr>
<tr>
<td>Rarely</td>
<td>3</td>
<td>23%</td>
</tr>
<tr>
<td>Very Rarely</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Never</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Total</td>
<td>13</td>
<td>100%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Demographic Variables</th>
<th>Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Utility</td>
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<td>17%</td>
</tr>
<tr>
<td>Recreation</td>
<td>12</td>
<td>50%</td>
</tr>
<tr>
<td>Exercise/Fitness</td>
<td>8</td>
<td>33%</td>
</tr>
<tr>
<td>Racing</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Total</td>
<td>24</td>
<td>100%</td>
</tr>
<tr>
<td>Bicycle Trip Purpose</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Utility</td>
<td>4</td>
<td>17%</td>
</tr>
<tr>
<td>Recreation</td>
<td>12</td>
<td>50%</td>
</tr>
<tr>
<td>Exercise/Fitness</td>
<td>8</td>
<td>33%</td>
</tr>
<tr>
<td>Racing</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Total</td>
<td>24</td>
<td>100%</td>
</tr>
<tr>
<td>Bicycle Type</td>
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<td></td>
</tr>
<tr>
<td>Cruiser</td>
<td>1</td>
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</tr>
<tr>
<td>Folding Bicycle</td>
<td>1</td>
<td>9%</td>
</tr>
<tr>
<td>Road, Touring and/or Hybrid</td>
<td>7</td>
<td>64%</td>
</tr>
<tr>
<td>BMX, Mountain, Cyclo-cross</td>
<td>2</td>
<td>18%</td>
</tr>
<tr>
<td>Total</td>
<td>11</td>
<td>100%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>How would investments and policies in bicycle infrastructure affect your community?</th>
<th>Participants</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Very Negatively affect</td>
<td>1</td>
<td>9%</td>
</tr>
<tr>
<td>Negatively affect</td>
<td>1</td>
<td>9%</td>
</tr>
<tr>
<td>No change or affect</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Positively affect</td>
<td>3</td>
<td>27%</td>
</tr>
<tr>
<td>Very Positively</td>
<td>6</td>
<td>55%</td>
</tr>
<tr>
<td>Total</td>
<td>11</td>
<td>100%</td>
</tr>
</tbody>
</table>
Business Focus Group Survey Results

The New York City business focus group only had two participants. One of them worked in a business that was established in the City for five years or less, and the other one worked in a business that was established in the City for 11-20 years. One of them was between 25-44 years old, and the other was between 45-64 years old. Both of them worked in professional services/offices that had zero-20 employees. In comparison to community focus group participants, who mostly had positive feedback about bicycle infrastructure investments, both of the New York City participants were either unsure or negative about the impact of bicycle infrastructure investment on their businesses.

While many participants from other focus groups in this study indicated that driving was the dominant mode of transportation for both their employees and customers, the New York City participants revealed that transit was the main means of transportation for their employees and customers, followed by driving. The focus group’s travel preferences reflect the citywide trend, where 57% of workers above 16 years old used transit to get to work in 2017. In comparison to other cities in this study, New York City also had a much lower percentage (45%) of people who had access to a vehicle.
There were 13 participants in the New York City community focus group and two participants in the New York City business focus group. The following are key highlights from the community focus groups:

**Community Focus Group**

- In comparison to other cities, New York’s community focus group participants did not characterize a White male cyclist with bicycle gear and equipment as a typical cyclist, but instead visualized a delivery worker/messenger as a typical cyclist.

- Personal hygiene was an important factor for 11 out of 13 community focus group participants when considering how to travel.

- Most participants were comfortable bicycling on a bicycle path, trail, or protected bicycle lane; two-thirds were comfortable bicycling on a non-protected bicycle lane. About half of the participants were comfortable bicycling on the sidewalk and preferred that their children bicycled on sidewalks, especially when protected bike lanes are absent.

- Community focus group participants reflected that it is important to apply driving knowledge and skill when bicycling in traffic and commented that bicycle safety training classes would be beneficial.

- Community focus group participants were frustrated over bike lanes that were improperly placed on busy roads. They mentioned that it was very unsafe to bike on Queens Blvd because the bike lane on Queens Blvd. is often blocked by parking or traffic.

  - “I do notice on Queens Blvd. that you have any emergency vehicle trying to pass through. If they are stuck in traffic, the only way they can get through is to use the bike lane. That’s really not right.”

  - “Bike lanes really have to select the right location. What they put on Queens Blvd. is definitely not the right location. I don’t see anybody riding any bikes on Queens Blvd. because it is dangerous.”

- While all participants viewed the local bicycle shop/collective as an effective partner to promote bicycle safety, most participants did not view the police as an effective partner due to their lack of safety enforcement for bicyclists that do not following rules on the road.
There were 13 participants in the New York City community focus group and two participants in the New York City business focus group. The following are key highlights from the business focus groups:

Business Focus Group

» All business focus group participants consider bicycling as a recreational activity.

» Participants reflected that the business community would not view bicycle infrastructure favorably mainly because it would take up parking spaces for their customers.

“A lot of businesses have closed on Queens Blvd. because people can’t find parking readily.”

» All participants did not want a bike share station in front of their businesses because of the lack of space.

» Business focus group participants suggested that if local businesses share testimonies of how bicycles have helped their businesses prosper, then that would encourage other local businesses to view bicycle infrastructure more favorably.

» Business focus group participants would prioritize transportation investment on public transit above all other modes to reduce automobile use and congestion.
Focus Group Methodology

With assistance from PeopleForBikes, VTC worked with staff from the City of Portland, Oregon to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. Both focus groups were facilitated by Charles T. Brown of VTC. The business focus group included 11 participants and was held on February 23, 2019, from 5:00 PM – 7:00 PM at the East Portland Community Office, 1017 NE 117th Avenue, Portland, OR. The community focus group included 12 participants was held on February 23, 2019, from 6:00 PM – 8:00 PM at the East Portland Community Office, 1017 NE 117th Avenue, Portland, OR. Each community focus group participant received $50 cash upon completion of the focus group and both groups received food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics

This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for Portland are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.
Community Focus Group Survey Results

Community focus group participants (12 in total) have lived in Portland for varied lengths of time, with 40% of participants living in Portland for 21-30 years. Most participants were between 25-44 years old. In comparison to most other community focus groups conducted in this study, Portland had a relatively young demographic. Three-quarters of participants were female, and a little under two-thirds of participants were single. Participants had various levels of educational attainment, with 42% who were a high school graduate/GED. Moreover, eighty-three percent of the participants had incomes $49,000 or less, which is higher than the City’s percentage (42%) by almost two-fold. Three-quarters of the participants identified as Black/African American, while the majority of the City’s population was White (77% per 2017 ACS estimates). Similar to the City as a whole (90%), the majority of participants did not identify as Hispanic (83%).
Community Focus Group Survey Results

One-third of participants had school-age children living in their households and had ridden bicycles with their children in the past year and close to two-thirds of them learned how to bicycle by age 12. In comparison to other community focus groups that were conducted for this project, there was a much higher share of participants (75%) who rarely to never bicycled. The main purpose of bicycling was recreation, and most participants primarily used either a cruiser or a road/touring/hybrid bike. While more than half of the participants (58%) thought that bicycle infrastructure investments would positively to very positively affect their communities, one-quarter of participants thought they would have no impact and 16% thought that they would in fact negatively or very negatively affect their communities.
Business Focus Group Survey Results

Businesses represented in the business focus group (11 in total) were established in Portland for varied lengths of time, with 40% of businesses that were established in Portland for 11-20 years. Similar to the community focus group, the business focus group’s largest cohort of participants was between 25-44 years old (70%). While 36% of participants worked in either the retail, professional service/office, hotel/lodging, 64% selected “other” as their business type. A little under two-thirds (63%) of participants worked in business with 50 employees or less, with the balance of participants working in businesses with over 150 employees. While only one person voiced concerns over the potentially negative impact of bicycle infrastructure on their businesses, only 40% were supportive as half of the participants were unsure/neutral about the impact of bicycle infrastructure on their businesses.

The majority of businesses had 10% or less of their employees and customers who walked, bicycled, or used rideshare services to reach the participants’ businesses. Most businesses had 20% or less employees who used transit, and about one-quarter of the businesses estimated that 20-80% of customers reached them via transit. Driving remains to be the dominant transportation mode, with most businesses having 60% or more employees and customers who drove to their businesses. The distribution of transportation modes among participants’ customers and employees reflects city-wide trends, where driving was also the most popular means of transportation to work for those above 16 years old (67%), followed by transit (12%), and where 86% of occupied housing units in Portland had at least one available vehicle (2017 ACS estimates).
There were 11 participants in the Portland business focus group and 12 participants in the Portland community focus group. The following are key highlights from the community focus groups:

Community Focus Group

» The majority of community focus group participants did not identify as White. Most hadn’t biked recently and wouldn’t be motivated to bicycle given the dominant perception of the typical cyclist as a White male.

» Black/African American and Hispanic/Latino participants from the community group also noted that they wouldn’t wear spandex or use a helmet – “the traditional Portland bike rider outfit” – as some of them and their families and friends associated that with whiteness.

» Most participants from the community focus group felt that current bicyclist/bicycling images in print and social media used by current government initiatives to encourage bicycling were generally positive. They reinforced Portland’s reputation as a green and environmental city.

» Five out of seven female participants who wore hijabs felt targeted when bicycling. These participants indicated that Muslim men are not as targeted because they don’t wear hijabs. They also recalled enjoying biking more as children when they did not wear hijabs.

» Male participant: “I don’t think there is anywhere safe [for Muslim women].”

» While the inner city is bicycle friendly, participants reflected that bicycling is increasingly inaccessible for black and brown residents who are displaced from the inner city as others move in.

“‘It is so destructive to me, that ‘Keep Portland weird’ slogan...It’s very divisive. It’s like people who moved here versus people who have always lived here.’”

» Only three out of 12 participants from the community focus group viewed the local police as an effective partner to enforce bicycle safety because of police brutality in the US and past negative experiences with the police. Some participants indicated that their perceptions and interactions with the police might change if the police start to patrol the neighborhood on bicycles.
There were 11 participants in the Portland business focus group and 12 participants in the Portland community focus group. The following are key highlights from the business focus groups:

**Business Focus Group**

- Most participants in the business focus group felt that the business community tends to view bicycling as negative because it could decrease parking and make driving more challenging. However, newer businesses that are health- or environmentally conscious were noted as exceptions as they were more likely to support and encourage bicycling.

  "We have a new vegan grocery store, a new coffee shop, a new gym opening up. I think the businesses that are more health conscious are encouraging the health benefits of being active and not sitting in your care to get to wherever you go. Those kinds of businesses are open to biking and encouraging it."

- In terms of bicycle amenities and incentives at businesses, nine out of 11 participants’ businesses provided bicycle parking for employee, which is a higher percentage of businesses than most business focus groups from other cities. About half of the participants’ businesses offered incentives to employees or clients who commute via bicycle, public transit, or any alternative form of transportation.

- Participants identified that lack of community engagement and outreach, gentrification effects, cultural norms, and personal safety as the main challenges to expanding bicycling/bike infrastructure.

  "There are also the ethnic communities where biking is not super common or as prevalent as it is with others, and you cannot just put bike infrastructure somewhere and expect someone to do the education and outreach for that group and make it normal to bike again."

- More bicycle safety education is needed to make bicycling more inclusive. In addition, seven out of 11 participants conveyed that bicycle infrastructure has the potential to improve traffic safety and to foster a greater sense of community.

  "What if we teach people how to ride a bike?...Maybe it will help us not to be so divisive. Like oh those are the bikers and there is the trendy whoevers."
Focus Group Methodology
With assistance from PeopleForBikes, VTC worked with staff from the City of Providence, Rhode Island to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. The community focus group was facilitated by Charles T. Brown of VTC and was held on March 16, 2019. The community focus group included 10 participants and was held from 1:00 PM – 2:30 PM at the SWAP Community Center, 500 Broad Street, Providence, Rhode Island. Each community focus group participant received $50 cash upon completion of the focus group as well as food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics
This section covers key findings from the community group survey. The business focus group was not conducted in Providence. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic information from the 2017 American Community Survey estimates for Providence are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. It also inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.

The following page covers focus group survey findings and highlights from the focus group discussions.
Community Focus Group Survey Results

Community focus group participants (10 in total) have lived in Providence for varied lengths of time, with half of the residents who have lived in the City for 21 years or more. Out of all focus groups conducted in this study, Providence had the youngest demographic, with 60% of participants between 18-24 years old and 20% between 25-44 years old. The majority of participants were female (70%) and single (90%). Sixty-percent of participants had a four-year college degree or a graduate degree, with forty-percent of participants who had either less than high school or some college experience. A majority of participants (80%) had incomes $49,000 or less, which is a much higher share than the City as a whole (57% per 2017 ACS estimates). The focus group had an evenly split between White (40%) and Black/African American (40%) participants and had a majority of non-Hispanic individuals.
Community Focus Group Survey Results

Less than half (40%) of participants had school-age children living in their household, but almost all participants (90%) didn’t bicycle with any of their children in the past year. All participants learned to bicycle by age 12 and used a variety of bicycle types. Seventy-percent of the participants bicycled very frequently to occasionally and half of them bicycled primarily for recreational purposes. All of them thought that bicycle infrastructure investments would positively (50%) and very positively (50%) affect their communities.
There were ten participants in the Providence community focus group. The business focus group was not conducted in this City. The following are key highlights from the community focus groups:

Community Focus Group

» Because of nearby universities, such as Brown and RISD, a few participants pictured a White college student as a typical cyclist in Providence.

» Whereas participants from other focus groups that were conducted for this city perceived bicyclists in the community as bicycling for commuting or recreational purposes, many Providence participants perceived bicyclists in the community, especially kids, as having a lot of fun.

» Male participants perceived female bicyclists as “normal,” and as “any other cyclist,” but female participants reflected that they didn’t see other female cyclists frequently – “It’s mostly male and children.”

» Four out of the ten focus group participants had a good experience with the bike share program (JUMP) because it was easy to use, it saved time, and it was fun.

» Personal/traffic safety, poor transportation infrastructure, and lack of understanding on how to share the road with other roadway users were the primary reasons that prevented participants to bicycle more frequently.

  "...just not knowing how to react around bicyclists, and bicyclists not knowing how to react around drivers. I would also add bicycle infrastructure. There are no bike racks even in front of very popular business districts. It is ridiculous."

» Nine out of ten participants did not view the local police as a potentially effective partner due to previous negative interactions with the police. As one female participant of color described:

  "Not around my community. Just Providence period. People that look like me don’t feel safe. As a minority, I don’t think they will help my community."

» Nine out of ten participants thought bicycle helmets should be mandatory in the city. No participants were in favor of electric scooters coming to the city.
Focus Group Methodology
With assistance from PeopleForBikes, VTC worked with staff from the City of Tucson, Arizona to organize and recruit business professionals and community residents—using the criteria mentioned in the “Focus Group Methodology” section of the report—to participate in the business and community focus groups. Both focus groups were facilitated by Charles T. Brown of VTC. The business focus group included 9 participants and was held on March 27, 2019, from 8:00 AM – 9:30 AM. The community focus group included 18 participants was held on March 26, 2019, from 6:00 PM – 7:30 PM. Both focus groups were held at the office of Ward 5, 4300 S. Park Ave, Tucson, Arizona. Each community focus group participant received $50 cash upon completion of the focus group and both groups received food and drinks from a local establishment.

Focus Group Demographics/Business Characteristics
This section covers key findings from the community and business focus group surveys. While focus groups, by design, are not representative of any city as a whole, it is interesting to understand whether group demographics depart in significant ways from city-wide trends. For this reason, some demographic and transportation mode/car ownership information from the 2017 American Community Survey estimates for Tucson are included in this narrative.

The community focus group survey included demographic questions, as well as other questions centered on bicycle frequency, purpose, and types. The business focus group survey gathered background information about participants’ businesses and included questions on transportation modes. Both surveys inquired participants’ opinions and level of support for bicycle infrastructure investments. The survey results are primarily useful in helping to contextualize the focus group responses and discussions.

The following page covers focus group survey findings and highlights from the focus group discussions.
Community Focus Group Survey Results

The community focus group participants (18 in total) were all long-time residents – 56% of them lived in Tucson for 21 years or more, with the balance of those who lived in the City for 11-20 years. Participants were distributed across the age spectrum. There were slightly more females (59%) than males (41%), and two-thirds of the participants were single. Half of the participants had a less than high school experience or a high school graduate/equivalent degree, and only 22% had completed a four-year college degree. Most of the focus group participants had incomes $49,000 or less (89%), which is much higher than the City’s percentage (61% per 2017 ACS estimates). The focus group had a low share of White participants (11%) but had a majority Hispanic population (89%).
Community Focus Group Survey Results

Close to two-thirds of the participants (61%) did not have any school-age children, eighty-two percent had not ridden bicycles with their children in the past year. Most participants (88%) participants learned how to bicycle by 12 years old. The majority were not frequent bicycle riders, as 84% bicycled occasionally to rarely. Recreation (43%) and exercise/fitness (40%) were the top two primary purposes for bicycling and half of the participants preferred to use a cruiser bike when bicycling. Seventy-one percent of participants indicated that bicycle investments and policies would positively and very positively affect their communities.
Business Focus Group Survey Results

Out of all business focus group participants (9 in total), sixty-three percent of businesses represented had been established in Tucson for 21 years or more. In comparison with the age distribution of community focus group participants, the business focus group had a much larger share of participants who were 25–44 years old (67%). Forty-four percent of participants worked in retail, professional services/office, bank/financial services, restaurant/food services, with the balance of participants who selected “other” as their business type. About two-thirds of the participants worked in small businesses with 50 employees or less and thought that bicycle infrastructure investments would positively impact their businesses.

The majority of participants estimated that less than 20% of employees and customers walked or bicycled to reach their businesses and less than 10% of their employees or customers used rideshare services. While most participants also estimated that less than 10% of their employees took transit to work, there were some participants who estimated that 40% or less of their customers used transit to reach their businesses. Driving was the dominant transportation mode, as two-thirds and more of businesses estimated that over 60% of their customers and employees drove to their businesses. The distribution of transportation modes among participants’ customers and employees reflect city-wide trends, where 85% of workers 16 years old and older in Tucson drove to work in 2017, and 88% of occupied housing units had access to at least one vehicle (2017 ACS estimates).
There were 18 participants in the Tucson community focus group and nine participants in the Tucson business focus group. The following are key highlights from the community focus groups:

Community Focus Group

» Seven out of 18 community focus group participants viewed bicycling as primarily a recreational activity. Five participants were not comfortable to bicycle anywhere unless they were biking with a group of people due to poor road infrastructure and lack of traffic safety in Tucson.

» Most of the male participants perceived female bicyclists as independent and “bad ass.” On the other hand, females characterized male bicyclists on streets as common - “I see a lot of guys... it’s what you mainly see.”

» Ten out of 18 community focus group participants did not see the police as an effective partner to promote bicycle safety. Participants who worked in law enforcement from the business focus group said there was not enough resources in the police department to conduct bicycle safety education.

“We are Latinos, they won’t do that to a white male. That’s why we pictured a white male. They wouldn’t pull a gun because they have all the uniform for cycling. We don’t. If we are going to bike, we aren’t going to use helmets. Some people do.”

Response from a police officer: “If we can’t respond to burglaries, I don’t think we can spend a lot of time teaching people how to ride bicycles.”

» All community focus group participants viewed bike shops/collectives that engaged with the community as effective partners to educate people on bicycle safety.

“There are luxurious bike shops, when they don’t even look at you;”
“Or they look at you like you are not going to buy nothing, he is poor, versus like... what’s up man, what can I help you with?”
There were 11 participants in the Portland business focus group and 12 participants in the Portland community focus group. The following are key highlights from the business focus groups:

Business Focus Group

- Business focus group participants perceived cyclists that patronized their businesses as gutsy and fearless, especially if the customer was a woman who was bicycling with her kids. They also expressed a sense of respect for customers who bicycled to their businesses.

- Tucson is the number one training city for cyclists in the world. Participants reflected that they gradually got used to the groups of cyclists who come to Tucson to be trained professionally.

  “50% of all cyclists in Tucson aren’t even from Tucson. They are just here training professionally.”

- While everyone thought that adding bicycle infrastructure improvements would be beneficial, they also stated that more bicycle safety awareness and education is needed in the City to ensure the safety of all roadway users.

- Business focus group participants viewed those who used bicycles as their main form of transportation positively, and those who use bicycle for recreational purposes more negatively. They reflected that businesses might not view recreational cyclists as favorably because of their preexisting perceptions of cyclists being pretentious on the road.

  “Where I work, I see people in this area that are riding their bikes that are just being courageous and they are taking care of their responsibilities...There are other parts of the city where...cycling...is a form of recreation. I don’t see it quite as positively... the pretentiousness of giant packs of spandex-wearing cyclists...they just take over.”
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