

## Survey #1 Results

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# O'ahu Bicycle Master Plan Update

Department of Transportation Services  
City & County of Honolulu

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June 2008



Prepared by:  
Helber Hastert & Fee, Planners

Work Product No. 1.5.4

## Table of Contents

1. Introduction .....	1
2. Format and Contents of Survey .....	1
3. Respondent Demographics .....	2
4. Results.....	2
5. Survey Evaluation/Lessons Learned.....	3

Appendix A: Survey Template

Appendix B: Summary of Survey Results

Appendix C: Complete Survey Results (cd-rom)

Appendix D: Specific Facilities Improvements

## 1. Introduction

This report is a work product of the O'ahu Bicycle Master Plan Update being prepared for the City and County of Honolulu, Department of Transportation Services. The *O'ahu Bicycle Master Plan Update Work Plan* (Helber Hastert & Fee, May 2008) identifies the Survey #1 results as Work Product 1.5.4.

The purpose of the survey was to gather information about bicycling on O'ahu. Its objective was to collect data on bicycle ridership patterns, levels of use, problem areas for bicyclists, and potential improvements.

This first survey was intended to give a general idea of the types of bicycle riders and their needs. Additional surveys are contemplated and may address more specific information about routes, improvements, and policies.

## 2. Format and Contents of Survey

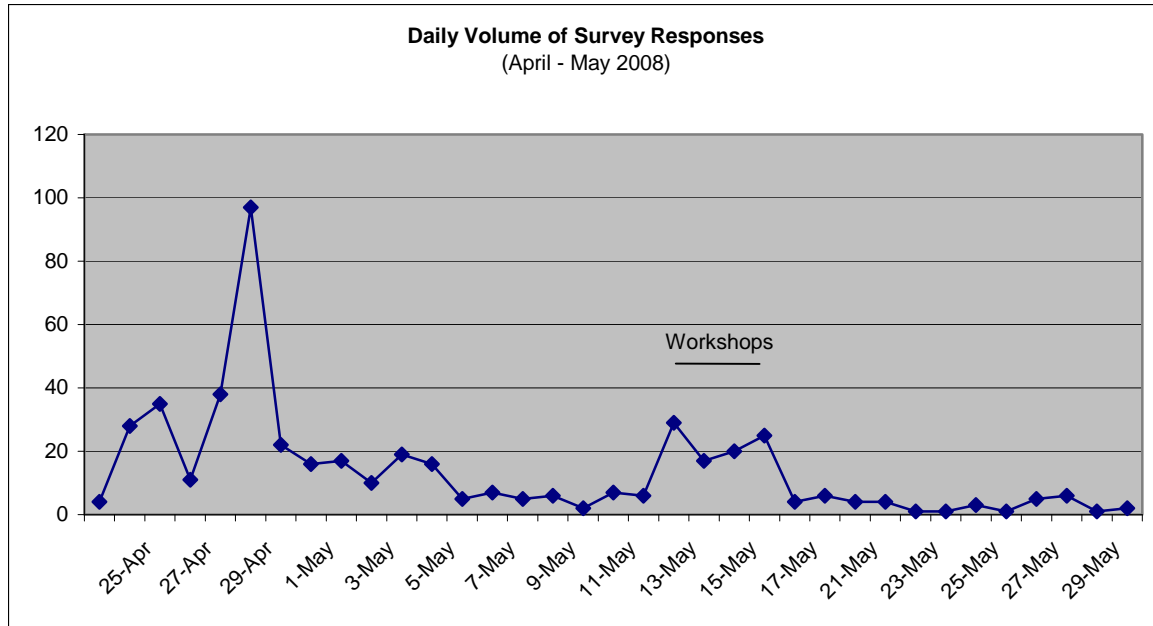
### Format and Contents

An online survey program called *SurveyMonkey.com* was used to create and manage the survey. A link to the survey was posted on the O'ahu Bike Plan website. Local bike shop owners, the Hawaii Bicycle League, interested bicycle advocates, and other bicycling groups were notified and asked to participate in the survey. Printed surveys were made available at the public workshops in May and at the Bike to Work Day rally on May 16, 2008 (See Appendix A).

The survey contained 16 questions and a section where participants could provide their contact information. Questions varied from single response (i.e. "Yes" or "No") to multi-response (e.g. "check all that apply") and open-ended questions (e.g. "where is a specific problem area"). *A summary of the responses can be found in Appendix B and a complete list of all the responses in Appendix C.*

### Timeline

The survey was open for responses for a period of thirty-eight days, starting on April 24, 2008 and ending on May 31, 2008. In all, 472 surveys were started, with 415 being completed. The highest levels of responses occurred from April 25–30 and May 13-15.



### 3. Respondent Demographics

Various demographics information was collected for gender, age, and location of home, work, and school. Common characteristics for respondents were:

- 66% of the respondents were male
- 30-45 year olds and 45-60 year olds were the most represented
- Most respondents lived in Manoa/Makiki, Kaimuki, or Kailua
- Most respondents worked in Manoa/Makiki, Downtown Honolulu, or Kalihi
- Most respondents went to school in Manoa, Downtown Honolulu, or Kailua

*A complete summary of the demographic data on respondents can be found in Appendix B.*

### 4. Results

Various questions were asked about why people bicycle, where they bicycle, what facilities and amenities they would like, and some of the problems and obstacles that they face. The following section provides a summary of these answers, and *a complete summary of the responses and results can be found in Appendix B.*

- Most people bicycle for exercise/health, pleasure, and commuting to school and work
- The majority of people ride everyday
- Most respondents ride less than 5 miles (1-way)
- Off-street paved bike paths are the most popular facility

- The most popular riding destinations are East Honolulu, Waikiki, UH Manoa, Downtown Honolulu, and Ala Moana/Kakaako
- The least favorite places to ride are Downtown Honolulu, Ala Moana/Kakaako, UH Manoa, Kailua/Kaneohe, and Waikiki
- Routes are undesirable due to riding too close to cars/too many cars, high speed traffic, and rough surfaces
- Routes that need the most improvements are in Downtown Honolulu, Kailua/Kaneohe, and UH Manoa
- Most respondents have ridden a bicycle on O'ahu within the last 6 months
- Almost all respondents would like to ride more often for pleasure, exercise/health, errands, and to commute to school/work
- The major hindrances to riding are a lack of bike lanes, paths, and routes, too much traffic, and poor bikeway conditions

## 5. Survey Evaluation/Lessons Learned

This survey provided a good starting point for understanding the levels of ridership and needs of bicyclists on O'ahu. The responses pointed to several key areas where existing bike facilities and amenities need improvement as well as the establishment and improvements of routes.

A shortcoming of this survey is that it was unable to reach a broad representation of the population. There was only one respondent that was under the age of 17 and few responses/comments from the Leeward side of the island. This likely indicates that younger people and citizens that live on the Waianae Coast may have been uninformed about the O'ahu Bike Plan. A greater emphasis on targeting these stakeholders may lead to a better representation of riders in future public outreach efforts and survey(s).

The next round of surveys could be designed to obtain more specific information from riders. It could also include questions regarding specific City policies on bicycling.

# **Appendix A: Survey Template**

## **Work Product 1.5.4**



# Bicycle User (& Non-User) Survey

## O'ahu Bike Plan

The City and County of Honolulu is updating its Bicycle Master Plan and needs your input! The goal of the *O'ahu Bike Plan* is to provide sufficient bicycling facilities to meet the commuting and recreational needs of both novice and experienced riders. If you **never or rarely** ride, but would like to bike more often, please see Section C.

*Fill out this survey online! Go to [oahubikeplan.org](http://oahubikeplan.org).*

### A. RIDING

#### 1. Where and why do you ride? (check all that apply)

- I don't ride (*We still want to hear from you; please go to Section C.*)
- To get to school/work
- For pleasure
- For exercise/health
- For errands/shopping
- Don't have a car/don't drive
- Other (describe) \_\_\_\_\_

#### 2. How often do you ride a bike (on average)?

- Daily
- Weekly
- Monthly
- Rarely

#### 3. What is the average distance of your rides (1-way)?

- Less than 2 miles
- 3-5 miles
- 6-15 miles
- 16+ miles

### B. BIKEWAYS

#### 1. Where do you ride most often / enjoy riding the most? (Street or bike path names; start & end points)

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

#### 2. Please rank your preference of bicycle facilities on a scale of 1 to 4 (1 = most preferred, 4 = least preferred)

- \_\_\_\_\_ Off-street paved bike paths
- \_\_\_\_\_ On-street bike lanes
- \_\_\_\_\_ Bike routes or roadway shoulders (i.e., no marked lane)
- \_\_\_\_\_ Unpaved trails or dirt paths

#### 3. Where are your least favorite places to ride / Where would you like to ride more if bikeway conditions were improved? (Street or bike path names; start & end points)

\_\_\_\_\_

\_\_\_\_\_

#### 3a. What makes these routes undesirable? (check all that apply)

- Rough surfaces
- Storm drains/grates/steel plates
- Debris in the road (glass, etc.)
- Ride too close to cars/too many cars
- High speed traffic
- Poor lighting
- Other (specify) \_\_\_\_\_

#### 4. Is there a route you use or would like to use that currently does not have any bicycle facilities and should? (Please be specific: e.g., *Bike lane on Hawai'i Kai Drive between Keahole St. and Lunalilo Home Road*)

Need:  Bike Path    Bike Lane    Route Signage  
on/at: \_\_\_\_\_

### C. WHY NOT BIKE MORE OFTEN?

#### 1. When was the last time you rode a bicycle on O'ahu?

- Within the last 6 months
- 6 months to 2 years ago
- More than 2 years ago
- Never

#### 2. Would you like to ride more often? Yes No If yes, what kinds of additional bike trips would you take? (check all that apply)

- To get to school/work
- For pleasure
- For exercise/health
- For errands/shopping
- Other (describe) \_\_\_\_\_

3. What prevents you from riding more often (if you wanted to)? (check all that apply)

- I don't know how to ride safely in traffic
- Too much traffic
- No bike paths, lanes or routes
- Bikeways/roads in poor condition
- Inadequate bike storage at destination
- No shower /change facilities at destination
- Destinations are too far away
- Weather
- Roads are too steep
- I have to transport people or things
- Other reason: \_\_\_\_\_

D. TELL US ABOUT YOURSELF

Male       Female

Age:     17 and under     18-30     30-45     46-60     61 or older

Home Zip Code:    \_\_\_\_\_

Work Zip Code:    \_\_\_\_\_

School Zip Code:    \_\_\_\_\_

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**KEEP IN TOUCH!**

To receive information on the City's Bikeway Planning process--including how you can get involved--provide your contact information below.

Name: \_\_\_\_\_

E-mail Address: \_\_\_\_\_

Mailing Address: \_\_\_\_\_

Telephone: \_\_\_\_\_

Fax: \_\_\_\_\_

Mail or fax this survey to:

Helber Hastert & Fee, Planners  
733 Bishop Street, Suite 2590  
Honolulu, HI 96813  
Fax: 808-545-2050

**Or fill it out online at: [oahubikeplan.org](http://oahubikeplan.org)**

Visit the O'ahu Bike Plan website at: [www.oahubikeplan.org](http://www.oahubikeplan.org) for project progress and related bicycling information.

E-mail: [info@oahubikeplan.org](mailto:info@oahubikeplan.org)  
Plan Update Consultant (Helber Hastert & Fee): 545-2055 ext 237  
City & County Bicycle Coordinator: Chris Sayers / Tel: 768-8335 / Email: [csayers@honolulu.gov](mailto:csayers@honolulu.gov)

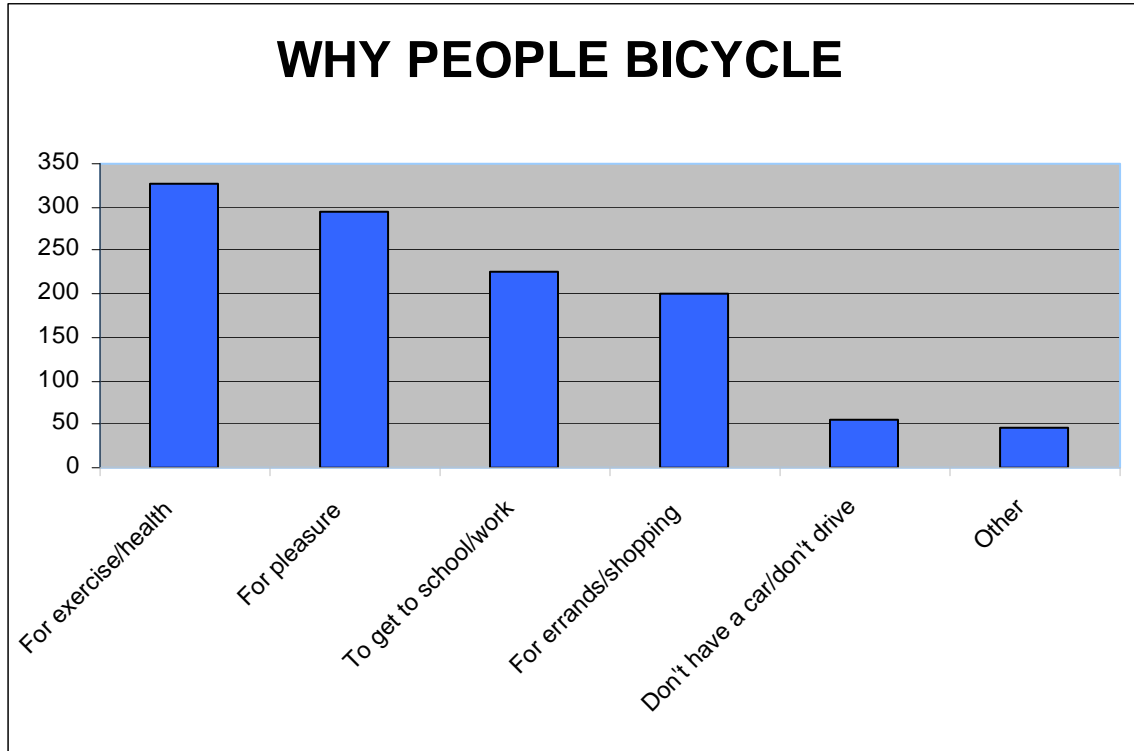
*Mahalo for participating in the bikeway planning process!*

## **Appendix B: Summary of Survey Results**

### **Work Product 1.5.4**

**Section A: Question 1 - Where and why do you ride?**

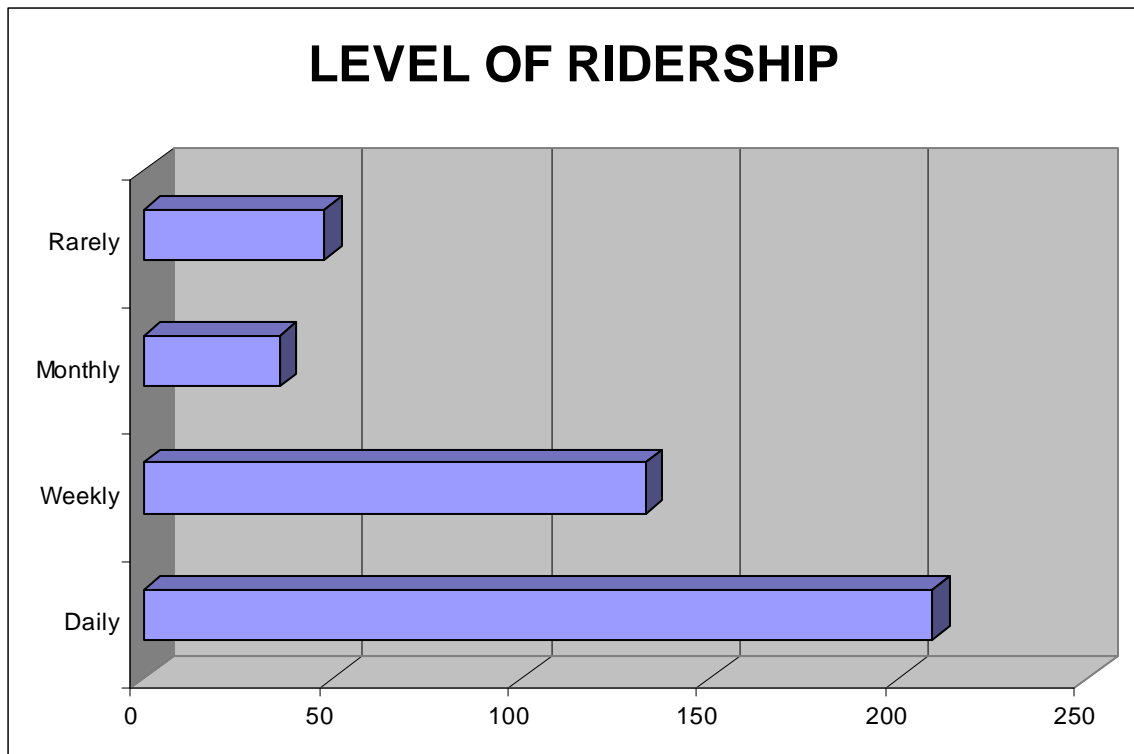
The majority of respondents choose to bicycle for exercise, health, and pleasure. Other popular reasons include commuting to school and work, running errands and shopping.



| Where and why do you ride? (check all that apply) |                  |                |
|---------------------------------------------------|------------------|----------------|
| Answer Options                                    | Response Percent | Response Count |
| I don't ride                                      | 14.0%            | 67             |
| To get to school/work                             | 47.0%            | 225            |
| For pleasure                                      | 60.9%            | 295            |
| For exercise/health                               | 67.4%            | 327            |
| For errands/shopping                              | 41.5%            | 201            |
| Don't have a car/don't drive                      | 11.5%            | 55             |
| Other (please specify)                            | 9.6%             | 45             |
| <i>answered question</i>                          |                  | <b>481</b>     |
| <i>skipped question</i>                           |                  | <b>10</b>      |

**Section A: Question 2 – How often do you ride a bike?**

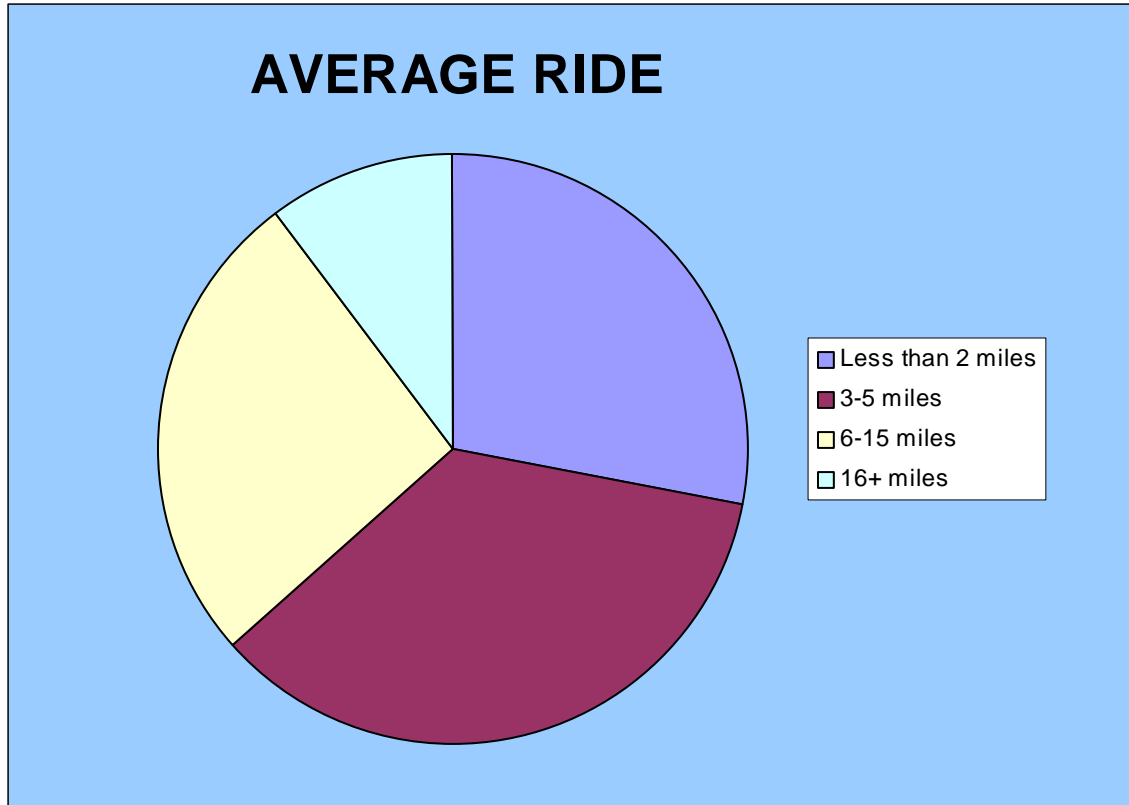
Most respondents indicated that they ride bicycles either daily or weekly.



| How often do you ride a bike (on average)? |                  |                |
|--------------------------------------------|------------------|----------------|
| Answer Options                             | Response Percent | Response Count |
| Daily                                      | 49.0%            | 209            |
| Weekly                                     | 31.5%            | 133            |
| Monthly                                    | 8.4%             | 36             |
| Rarely                                     | 11.1%            | 48             |
| <i>answered question</i>                   |                  | <b>426</b>     |
| <i>skipped question</i>                    |                  | <b>64</b>      |

**Section A: Question 3 – What is the average distance of your rides (1-way)?**

Most respondents indicated that they usually bike less than five miles one-way.



| What is the average distance of your rides (1-way)? |                  |                |
|-----------------------------------------------------|------------------|----------------|
| Answer Options                                      | Response Percent | Response Count |
| Less than 2 miles                                   | 28.0%            | 118            |
| 3-5 miles                                           | 35.3%            | 149            |
| 6-15 miles                                          | 26.6%            | 114            |
| 16+ miles                                           | 10.1%            | 43             |
| <i>answered question</i>                            |                  | <b>424</b>     |
| <i>skipped question</i>                             |                  | <b>66</b>      |

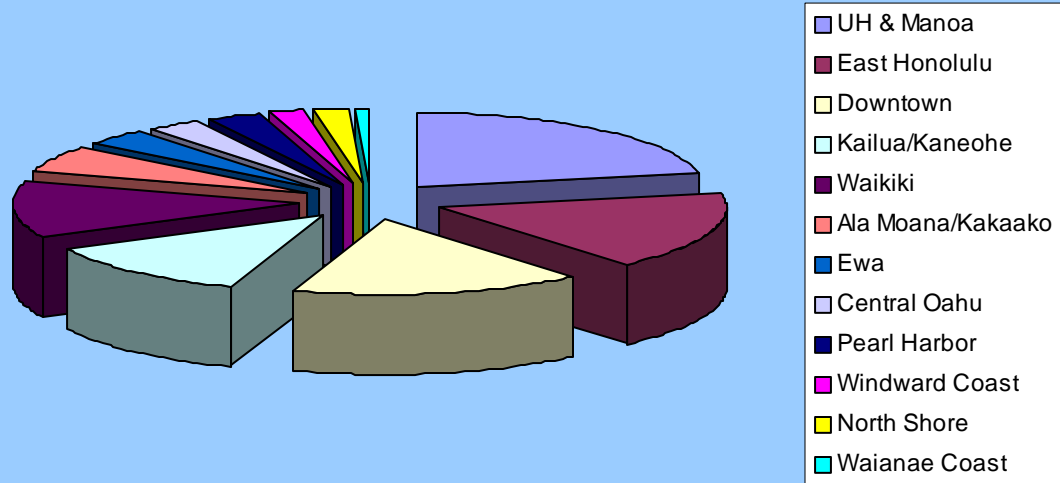
**Section B. Question 1 – Where do you ride most often/enjoy riding the most?**

This was an open-ended question that asked about specific roads and routes. The responses were categorized geographically into 12 sections of the island. These sections were:

- 1) East Honolulu
- 2) Waikiki
- 3) UH Manoa, Kaimuki, and Makiki
- 4) Downtown Honolulu
- 5) Ala Moana/Kakaako
- 6) Pearl Harbor/Waipahu
- 7) Kailua/Kaneohe/Waimanalo
- 8) North Shore
- 9) Waianae Coast
- 10) Windward Coast
- 11) Ewa District
- 12) Central Oahu

Using these specific sections, it was determined that the area around the University of Hawai'i and Manoa was the most popular area to ride, followed by East Honolulu, Downtown Honolulu, and the Kailua/Kaneohe area.

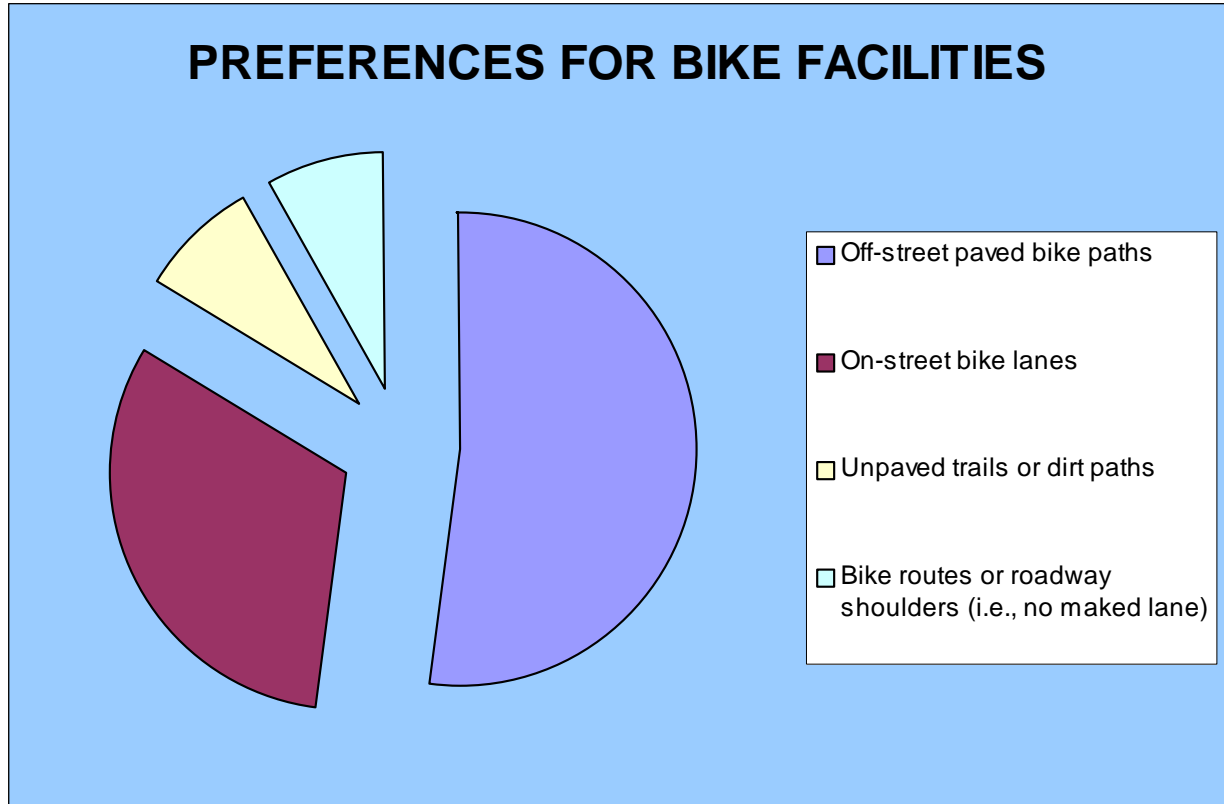
## WHERE BICYCLISTS RIDE



| Region            | # of reponses |
|-------------------|---------------|
| UH & Manoa        | 74            |
| East Honolulu     | 57            |
| Downtown          | 56            |
| Kailua/Kaneohe    | 42            |
| Waikiki           | 41            |
| Ala Moana/Kakaako | 20            |
| Ewa               | 12            |
| Central Oahu      | 11            |
| Pearl Harbor      | 10            |
| Windward Coast    | 7             |
| North Shore       | 6             |
| Waianae Coast     | 3             |

**Section B: Question 2 – Please rank your preference of bicycle facilities on a scale of 1 to 4 (1= most preferred, 4 = least preferred)**

The most popular facilities were off-street paved bike paths. The least favorable were unpaved trails or dirt paths.

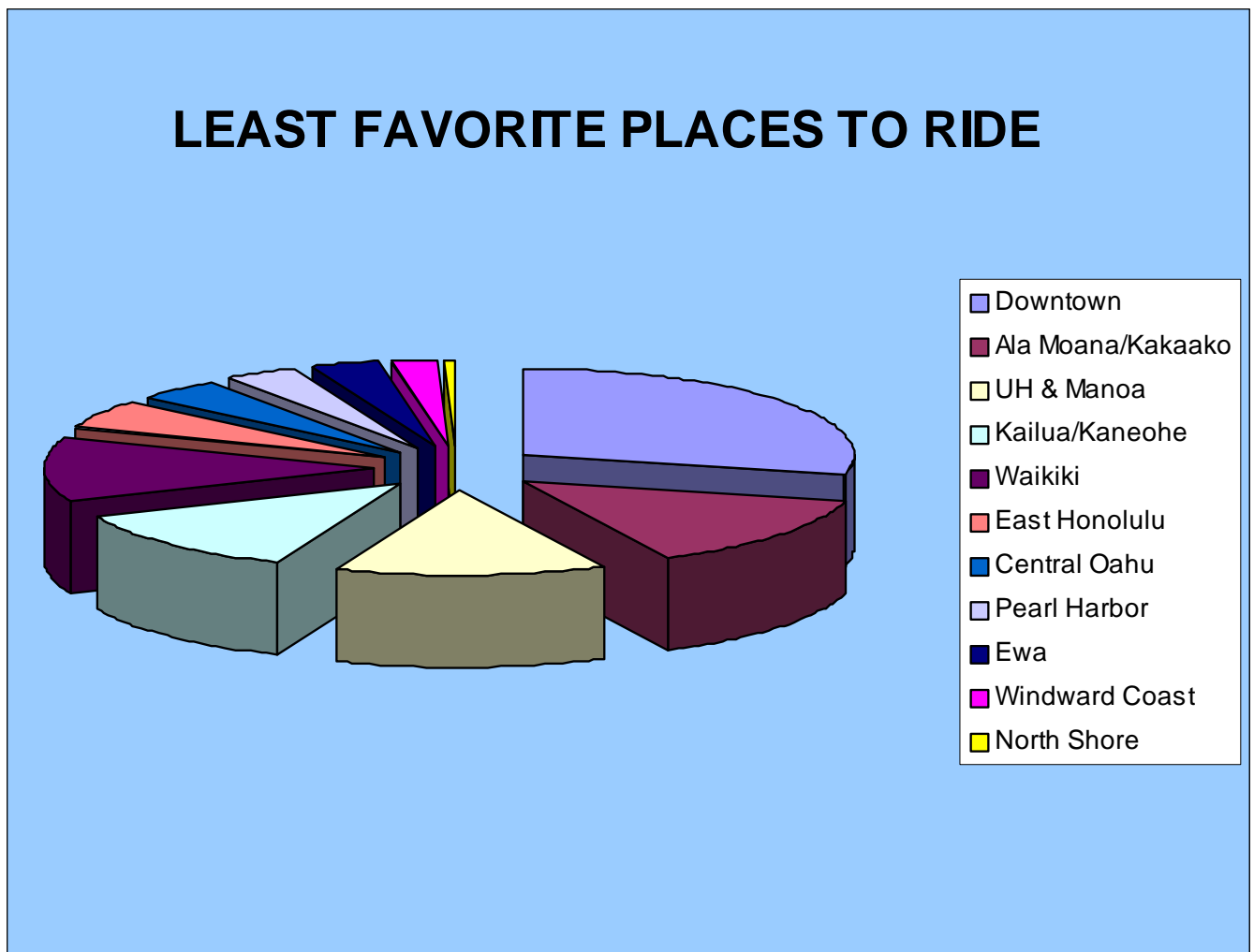


| Please rank your preference of bicycle facilities on a scale of 1 to 4 (1 = most preferred, 4 = least preferred) |            |            |            |            |                          |                |
|------------------------------------------------------------------------------------------------------------------|------------|------------|------------|------------|--------------------------|----------------|
| Answer Options                                                                                                   | 1          | 2          | 3          | 4          | Rating Average           | Response Count |
| Off-street paved bike paths                                                                                      | <b>209</b> | 85         | 56         | 20         | 1.701657                 | 362            |
| On-street bike lanes                                                                                             | 124        | <b>161</b> | 58         | 26         | 1.938889                 | 360            |
| Bike routes or roadway shoulders (i.e., no marked lane)                                                          | 34         | 68         | <b>156</b> | 115        | 2.961539                 | 364            |
| Unpaved trails or dirt paths                                                                                     | 33         | 44         | 83         | <b>209</b> | 3.263889                 | 360            |
|                                                                                                                  |            |            |            |            | <i>answered question</i> | <b>408</b>     |
|                                                                                                                  |            |            |            |            | <i>skipped question</i>  | <b>82</b>      |

**Section B: Question 3 – Where are your least favorite places to ride/ Where would you like to ride more often if bikeway conditions were improved?**

For this question, the previously mentioned categorization method (see Section B: Question 1) was used. The results were somewhat mixed, but the top three least favorite places to ride were Downtown Honolulu, Ala Moana/Kakaako, and around the UH Manoa area.

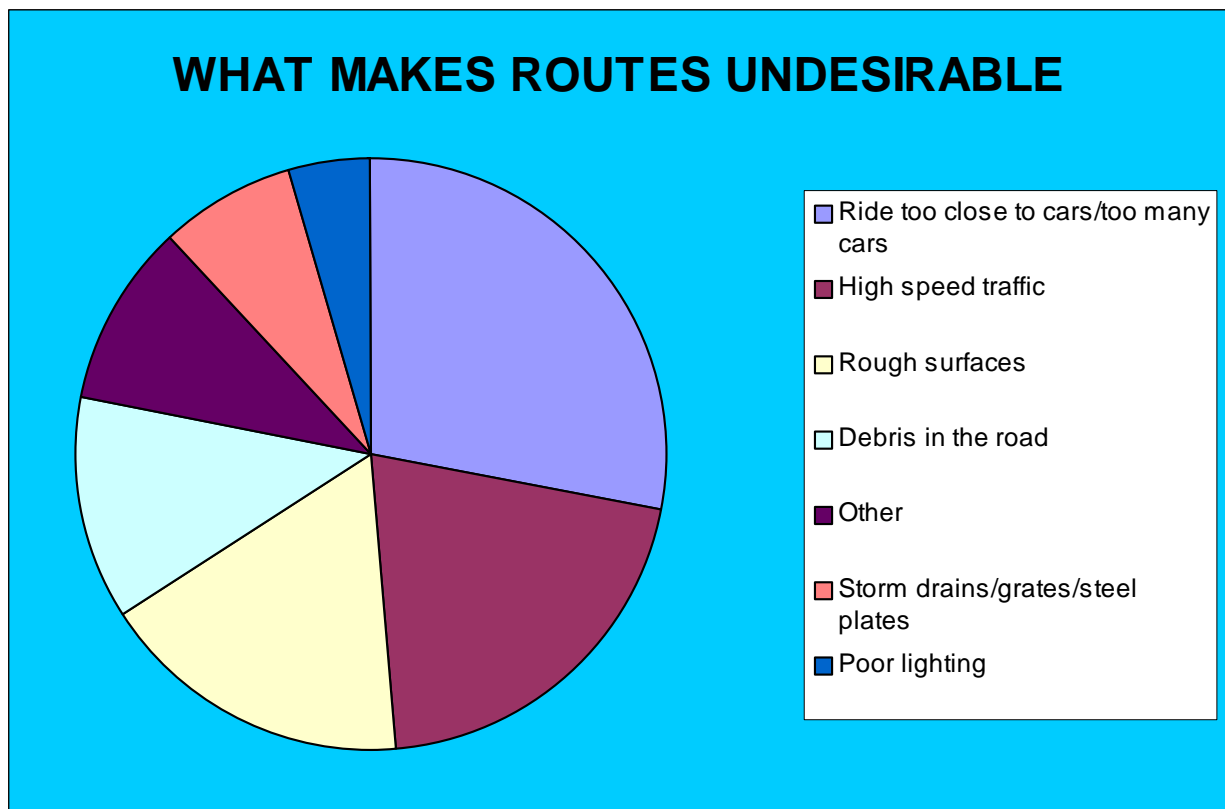
Some of the most popular places to ride (see Section B: Question 1) were also the least favorite places to ride. This may indicate that although a route is popular, its conditions may make it less than desirable for riders.



| Region            | # of reponses |
|-------------------|---------------|
| Downtown          | 88            |
| Ala Moana/Kakaako | 44            |
| UH & Manoa        | 41            |
| Kailua/Kaneohe    | 39            |
| Waikiki           | 37            |
| East Honolulu     | 17            |
| Central Oahu      | 13            |
| Pearl Harbor      | 11            |
| Ewa               | 10            |
| Windward Coast    | 7             |
| North Shore       | 2             |

**Section B: Question 3a – What makes these routes undesirable?**

The most common responses for these routes being undesirable were: cars are too close to the bicyclists/too many cars, high speed traffic, and rough surfaces.



| <b>What makes these routes undesirable? (check all that apply)</b> |                         |                       |
|--------------------------------------------------------------------|-------------------------|-----------------------|
| <b>Answer Options</b>                                              | <b>Response Percent</b> | <b>Response Count</b> |
| Rough surfaces                                                     | 55.2%                   | 218                   |
| Storm drains/grates/steel plates                                   | 24.4%                   | 96                    |
| Debris in the road (glass, etc.)                                   | 39.4%                   | 159                   |
| Ride too close to cars/too many cars                               | 90.7%                   | 359                   |
| High speed traffic                                                 | 66.3%                   | 262                   |
| Poor lighting                                                      | 14.5%                   | 58                    |
| Other (please specify)                                             | 32.4%                   | 125                   |
| <i>answered question</i>                                           |                         | <b>396</b>            |
| <i>skipped question</i>                                            |                         | <b>94</b>             |

**Section B: Question 4 – Is there a route that you use or would like to use that currently does not have any bicycle facilities and should?**

This open-ended question had a large number of responses, with the most common responses commenting on streets and routes in the Downtown Honolulu, UH Manoa, and Kailua areas.

The streets and routes that contained the largest number of comments were: Beretania St., King St., Kapiolani Blvd., Waialae Ave., Ala Moana Blvd., Kamehameha Hwy., Kalakaua Ave., Pali Hwy., Wilder Ave., University Ave., and Kapahulu Ave.

| Region                         | # of Comments |
|--------------------------------|---------------|
| Downtown                       | 16            |
| Kailua/Kaneohe/Waimanalo       | 15            |
| UH/Manoa/Kaimuki               | 10            |
| East Honolulu                  | 7             |
| Waikiki                        | 5             |
| Ewa                            | 5             |
| Ala Moana/Kakaako              | 4             |
| Pearl Harbor/Waipahu/Salt Lake | 2             |
| Waianae Coast                  | 1             |
| Windward Coast                 | 1             |
| Central Oahu                   | 1             |

Each of these streets had specific requests for bike lanes, paths, or routes. The following chart is a compilation of the top responses. *For a complete list of streets and requested facilities see Appendix D.*

| Is there a route you use or would like to use that currently does not have any bicycle facilities and should? | Lane | Path | Signage |
|---------------------------------------------------------------------------------------------------------------|------|------|---------|
| Beretania St.                                                                                                 | 34   | 1    | 2       |
| King St                                                                                                       | 32   | 1    | 2       |
| Kapiolani Blvd.                                                                                               | 17   | 2    | 1       |
| Waialae Ave                                                                                                   | 17   | 3    | 2       |
| Ala Moana Blvd.                                                                                               | 15   | 6    | 1       |
| Kam Hwy.                                                                                                      | 15   | 6    | 1       |
| Kalakaua Ave.                                                                                                 | 12   | 3    | 1       |
| Pali Hwy                                                                                                      | 11   | 3    | 3       |
| Wilder Ave.                                                                                                   | 9    | 0    | 1       |
| University Ave                                                                                                | 9    | 1    | 1       |

**Section C: Question 1 - When was the last time you rode a bicycle on O'ahu?**

The majority of respondents indicated that they had ridden a bicycle within the last six months.

| <b>When was the last time you rode a bicycle on O'ahu?</b> |                          |                       |
|------------------------------------------------------------|--------------------------|-----------------------|
| <b>Answer Options</b>                                      | <b>Response Percent</b>  | <b>Response Count</b> |
| Within the last 6 months                                   | 80.7%                    | 339                   |
| 6 months to 2 years ago                                    | 5.9%                     | 24                    |
| More than 2 years ago                                      | 8.8%                     | 37                    |
| Never                                                      | 4.6%                     | 19                    |
|                                                            | <i>answered question</i> | <b>420</b>            |
|                                                            | <i>skipped question</i>  | <b>71</b>             |

**Section C: Questions 2 and 2a– Would you like to ride more often? If yes, what kinds of additional bike trips would you take?**

Over 95% of respondents indicated that they would like to ride more often. Additional trips that they would like to take included riding for exercise, errands, pleasure, and health.

| <b>Would you like to ride more often?</b> |                         |                       |
|-------------------------------------------|-------------------------|-----------------------|
| <b>Answer Options</b>                     | <b>Response Percent</b> | <b>Response Count</b> |
| Yes                                       | 95.3%                   | 394                   |
| No                                        | 4.7%                    | 19                    |
| <i>answered question</i>                  |                         | <b>415</b>            |
| <i>skipped question</i>                   |                         | <b>75</b>             |

| <b>If yes, what kinds of additional bike trips would you take? (check all that apply)</b> |                         |                       |
|-------------------------------------------------------------------------------------------|-------------------------|-----------------------|
| <b>Answer Options</b>                                                                     | <b>Response Percent</b> | <b>Response Count</b> |
| To get to school/work                                                                     | 64.0%                   | 256                   |
| For pleasure                                                                              | 68.4%                   | 274                   |
| For exercise/health                                                                       | 67.9%                   | 272                   |
| For errands/shopping                                                                      | 64.0%                   | 257                   |
| Other (please specify)                                                                    | 11.8%                   | 46                    |
| <i>answered question</i>                                                                  |                         | <b>400</b>            |
| <i>skipped question</i>                                                                   |                         | <b>91</b>             |

**Section C: Question 3 –What prevents you from riding more often (if you wanted to)?**

The main reasons for not riding more often were due to a lack of bike routes and paths, too much traffic, and the poor condition of bikeways.

| <b>What prevents you from riding more often (if you wanted to)? (check all that apply)</b> |                          |                       |
|--------------------------------------------------------------------------------------------|--------------------------|-----------------------|
| <b>Answer Options</b>                                                                      | <b>Response Percent</b>  | <b>Response Count</b> |
| I don't know how to ride safely in traffic                                                 | 9.3%                     | 37                    |
| Too much traffic                                                                           | 59.6%                    | 246                   |
| No bike paths, lanes or routes                                                             | 78.4%                    | 321                   |
| Bikeways/roads in poor condition                                                           | 54.1%                    | 223                   |
| Inadequate bike storage at destination                                                     | 30.6%                    | 124                   |
| No shower /change facilities at destination                                                | 24.8%                    | 101                   |
| Destinations are too far away                                                              | 7.8%                     | 32                    |
| Weather                                                                                    | 7.8%                     | 32                    |
| Roads are too steep                                                                        | 7.3%                     | 29                    |
| I have to transport people or things                                                       | 19.0%                    | 77                    |
| Other (please specify)                                                                     | 21.1%                    | 84                    |
|                                                                                            | <i>answered question</i> | <b>410</b>            |
|                                                                                            | <i>skipped question</i>  | <b>81</b>             |

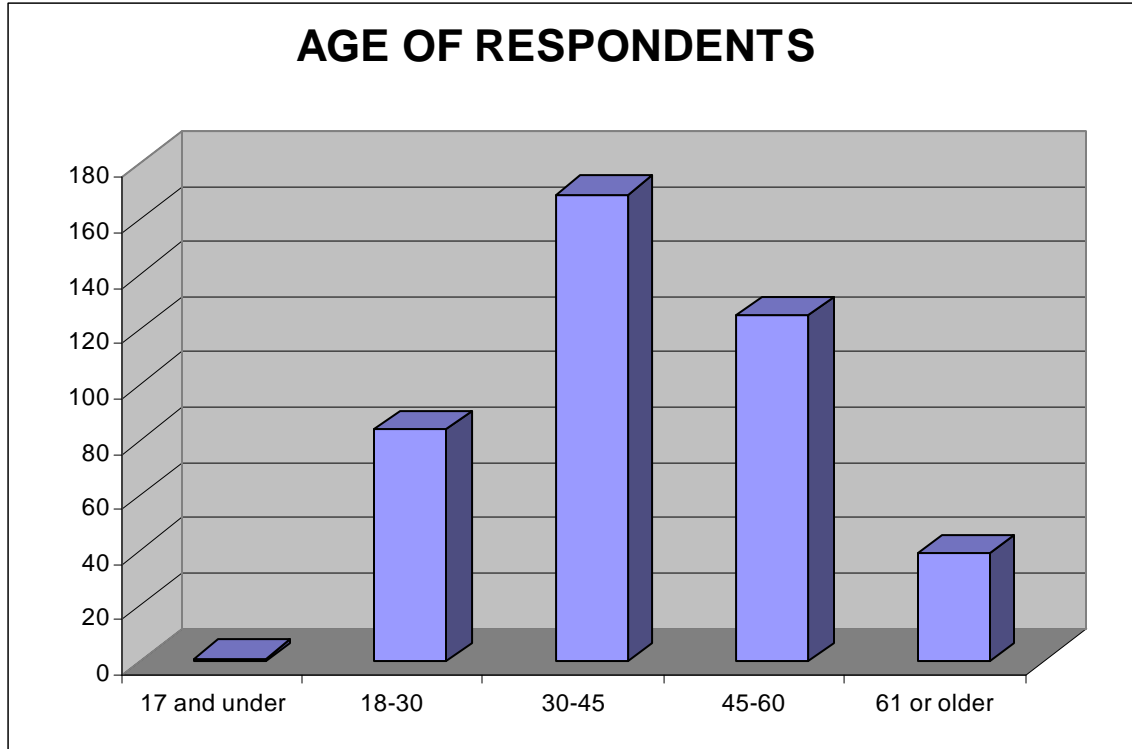
### Section D: Question 1 - Gender

Almost two-thirds of the respondents were male.

| Are you...     |                          |                |
|----------------|--------------------------|----------------|
| Answer Options | Response Percent         | Response Count |
| Male           | 66.0%                    | 283            |
| Female         | 34.0%                    | 148            |
|                | <i>answered question</i> | <b>431</b>     |
|                | <i>skipped question</i>  | <b>60</b>      |

## Section D: Question 2 – Age

The majority of the respondents were in the 30-60 year age range, with only minimal representation for people older than 61 years and younger than 17 years old.



| Age:                     |                  |                |
|--------------------------|------------------|----------------|
| Answer Options           | Response Percent | Response Count |
| 17 and under             | 0.2%             | 1              |
| 18-30                    | 20.1%            | 84             |
| 30-45                    | 40.4%            | 171            |
| 46-60                    | 29.9%            | 132            |
| 61 or older              | 9.3%             | 41             |
| <i>answered question</i> |                  | <b>429</b>     |
| <i>skipped question</i>  |                  | <b>62</b>      |

**Section D: Question 3 – What is your home zip code?**

The most common home zip codes were:

- 1) 96822 – Manoa/Makiki
- 2) 96816 – Kaimuki/Kapahulu
- 3) 96734 – Kailua
- 4) 96815 – Waikiki
- 5) 96826 – Moiliili

**Section D: Question 4 – What is your work and/or school zip code?**

The most common work zip codes were:

- 1) 96822 – Manoa/Makiki
- 2) 96813 – Downtown Honolulu
- 3) 96819 – Kalihi
- 4) 96814 – Kakaako, Ala Moana
- 5) 96816 – Kaimuki/Kapahulu

The most common school zip codes were:

- 1) 96822 – Manoa/Makiki
- 2) 96813 – Downtown Honolulu
- 3) 96734 – Kailua

## **Appendix C: Complete Survey Results**

### **Work Product 1.5.4**

Please see attached excel file on cd-rom

## **Appendix D: Specific Facility Improvements**

### **Work Product 1.5.4**

The following list is a compilation of the requested facility improvements. Specific streets are shaded gray and general areas/routes are colored tan.

| Is there a route you use or would like to use that currently does not have any bicycle facilities and should? | Lane | Path | Signage |
|---------------------------------------------------------------------------------------------------------------|------|------|---------|
| Beretania St.                                                                                                 | 34   | 1    | 2       |
| King St                                                                                                       | 32   | 1    | 2       |
| Kapiolani Blvd.                                                                                               | 17   | 2    | 1       |
| Waialae Ave                                                                                                   | 17   | 3    | 2       |
| Ala Moana Blvd.                                                                                               | 15   | 6    | 1       |
| Kam Hwy.                                                                                                      | 15   | 6    | 1       |
| Kalakaua Ave.                                                                                                 | 12   | 3    | 1       |
| Pali Hwy                                                                                                      | 11   | 3    | 3       |
| Wilder Ave.                                                                                                   | 9    | 0    | 1       |
| University Ave                                                                                                | 9    | 1    | 1       |
| Kapahulu Ave                                                                                                  | 9    | 1    | 1       |
| Nimitz Hwy                                                                                                    | 7    | 1    | 0       |
| McCully St.                                                                                                   | 6    | 0    | 0       |
| Kalaniana'ole Hwy                                                                                             | 6    | 0    | 1       |
| Kuhio                                                                                                         | 5    | 0    | 1       |
| Kalaheo Ave                                                                                                   | 5    | 3    | 0       |
| Young St                                                                                                      | 5    | 1    | 0       |
| Manoa Rd                                                                                                      | 5    | 1    | 1       |
| Kailua Rd                                                                                                     | 5    | 1    | 0       |
| Farrington Hwy                                                                                                | 4    | 2    | 1       |
| Oahu Rd.                                                                                                      | 4    | 0    | 0       |
| Oneawa                                                                                                        | 3    | 4    | 0       |
| Mokapu                                                                                                        | 3    | 1    | 0       |
| Kahekili Hwy                                                                                                  | 3    | 0    | 0       |
| Likelike Hwy.                                                                                                 | 3    | 0    | 0       |
| Queen St.                                                                                                     | 3    | 0    | 0       |
| Hawaii Kai Dr.                                                                                                | 2    | 1    | 0       |
| Wanaao                                                                                                        | 2    | 0    | 0       |
| Kaneohe Bay Dr.                                                                                               | 2    | 0    | 0       |
| Keolu Dr.                                                                                                     | 2    | 0    | 0       |
| Hamakua Dr.                                                                                                   | 2    | 0    | 0       |
| Ala Wai Blvd.                                                                                                 | 1    | 3    | 0       |
| Kaiwanui Marsh                                                                                                | 1    | 3    | 0       |
| Punaho St.                                                                                                    | 1    | 1    | 2       |
| Waipahu Depot Rd.                                                                                             | 1    | 2    | 0       |
| Mililani to Waipio                                                                                            | 1    | 2    | 0       |
| Keeaumoku                                                                                                     | 1    | 1    | 1       |

|                          | Lane | Path | Signage |
|--------------------------|------|------|---------|
| Pensacola St.            | 1    | 0    | 1       |
| Piikoi                   | 1    | 0    | 1       |
| East Manoa Rd            | 1    | 0    | 1       |
| UH Manoa to Downtown     | 1    | 1    | 0       |
| Bishop St.               | 1    | 1    | 0       |
| Wailua Rd                | 1    | 0    | 0       |
| Lunalilo Home Rd.        | 1    | 0    | 0       |
| Hunakai                  | 1    | 0    | 0       |
| Geiger Rd.               | 1    | 0    | 0       |
| Dole St.                 | 1    | 0    | 0       |
| School St.               | 1    | 0    | 0       |
| Metcalf                  | 1    | 0    | 0       |
| Dillingham               | 1    | 0    | 0       |
| Houghtailing             | 1    | 0    | 0       |
| Fort Barring Rd          | 1    | 0    | 0       |
| Ward Ave.                | 1    | 0    | 0       |
| H-3                      | 1    | 0    | 0       |
| Mililani to Downtown     | 1    | 0    | 0       |
| Ulune St                 | 1    | 0    | 0       |
| Anoi                     | 1    | 0    | 0       |
|                          |      |      |         |
| Makaha to Kaena Point    | 1    | 0    | 0       |
| Manoa to Airport         | 1    | 0    | 0       |
| UH to Waikiki            | 1    | 0    | 0       |
| South Shore              | 1    | 0    | 0       |
| Aina Haina to Airport    | 1    | 0    | 0       |
| UH Manoa to KCC          | 1    | 0    | 0       |
| Mililani to Waikele      | 1    | 0    | 0       |
| Ko'olina to Downtown     | 1    | 1    | 0       |
| Kalihi to Downtown       | 0    | 2    | 0       |
| Kaapa Quarry Rd.         | 0    | 2    | 0       |
| Mililiani to Pearl City  | 0    | 2    | 0       |
|                          |      |      |         |
| Downtown to Diamond Head | 0    | 2    | 0       |
| Kahala Ave.              | 0    | 1    | 1       |
| Fort Weaver Rd.          | 0    | 1    | 0       |
| Keawe St                 | 0    | 1    | 0       |
| Pupukea Rd.              | 0    | 1    | 0       |
| Roosevelt Ave            | 0    | 1    | 0       |
| Vineyard Blvd.           | 0    | 1    | 0       |
| Kihapai St.              | 0    | 1    | 0       |
| Makakilo Dr.             | 0    | 1    | 0       |
|                          |      |      |         |
| East Oahu to Downtown    | 0    | 1    | 0       |
| Ewa Beach to Waikiki     | 0    | 1    | 0       |

|                                          | Lane | Path | Signage |
|------------------------------------------|------|------|---------|
| Nanakuli to Waipahu                      | 0    | 1    | 0       |
| UH Manoa to Ala Moana Park               | 0    | 1    | 0       |
| Manoa to UH                              | 0    | 1    | 0       |
| Waipahu to Ewa Beach                     | 0    | 1    | 0       |
| Pearl City to Honolulu                   | 0    | 1    | 0       |
| Aliamanu Military Res. to Halawa Heights | 0    | 1    | 0       |
| Pearl Harbor to Hawaii Kai               | 0    | 1    | 0       |
| Manoa Stream Path                        | 0    | 1    | 0       |
| Pearl Harbor B.P. to Downtown            | 0    | 1    | 0       |
| Aiea to UH                               | 0    | 1    | 0       |
| Kapolei to Downtown                      | 0    | 1    | 0       |
| Ewa Beach to Waianae                     | 0    | 1    | 0       |
| Kapolei Shopping Areas                   | 0    | 1    | 0       |
| Ferry from Iroquis Point                 | 0    | 1    | 0       |
| Bike Path Thru Waipahu                   | 0    | 1    | 0       |
| Tantalus Loop                            | 0    | 1    | 0       |
| Nehoa St.                                | 0    | 0    | 2       |
| Kunia Rd.                                | 0    | 0    | 1       |
| Date St.                                 | 0    | 0    | 1       |
| Pauoa                                    | 0    | 0    | 1       |
| Monsarat                                 | 0    | 0    | 1       |