Appendix E: Online Engagement Results; Pedestrian Safety Public Survey

Stakeholder involvement in the Pedestrian Safety Action Plan (PSAP) included the establishment of a Pedestrian Safety Action Committee, which held three meetings over the course of the PSAP's development, and a regionwide online survey, facilitated by the Texas Department of Transportation. The Pedestrian Safety Public Survey utilized TxDOT's MetroQuest survey tool, was live for two months between May 6 and July 5, 2019, and solicited feedback from 1,045 respondents. The following document summarizes the results of the survey, which was shared with NCTCOG members and regional stakeholders on the Pedestrian Safety Action Plan site: nctcog.org/pedsafetyplan

Online Engagement Results

Pedestrian Safety Public Survey

North Central Texas Council of Governments

Sustainable Development, Bicycle and Pedestrian Planning February 2020

Table of Contents

1.	Introduction	E-1
2.	Online Engagement, Logistics and Outreach	E-3
3.	Summary of Findings	E-5
4.	Addressing Pedestrian Barriers	E-8
5.	Locating Pedestrian Barriers and Areas of Concern	E-12
6.	Identifying User Priorities	E-20
7.	Conclusion	E-29

Introduction

The North Central Texas Council of Governments (NCTCOG) and the Texas Department of Transportation (TxDOT) conducted an online survey as part of an overall public involvement strategy in developing a regional Pedestrian Safety Action Plan (PSAP). The purpose of the PSAP is to serve as a guide for state, regional and local governments for improving pedestrian safety across the Dallas-Fort Worth metropolitan planning area. The Plan identifies current conditions and offers potential engineering, educational and enforcement countermeasures to improve pedestrian safety. On February 14, 2019, NCTCOG's Regional Transportation Council took action to establish a Regional Safety Position, stating that:

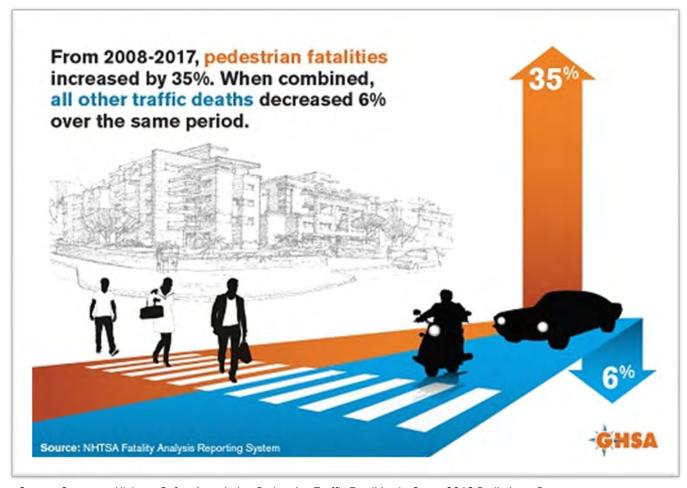
"Even one death on the transportation system is unacceptable. Staff will work with our partners to develop projects, programs, and policies that assist in eliminating serious injuries and fatalities across all modes of travel."

The State of Texas, as well as the cities of Dallas and Fort Worth, are designated by the Federal Highway Administration as Pedestrian and Bicycle Focus States and Cities, respectively, due to the high ratio of pedestrian-related crashes and fatalities.



Source: NCTCOG

Nationwide, the number of pedestrian fatalities has been on the rise within recent years. The Governors Highway Safety Association (GHSA) found that the number of pedestrian fatalities increased by 35 percent over a tenyear period (4,414 deaths in 2008 to 5,977 deaths in 2017); whereas, the combined number of all other traffic deaths declined by six percent during the same period. Pedestrian deaths as a percentage of total motor vehicle crash deaths increased from 12 percent in 2008 to 16 percent in 2017; relatedly, a continued uptick in pedestrian fatalities has been forecast as the 2018 preliminary data is analyzed, according to the GHSA and State Highway Safety Offices.



Source: Governors Highway Safety Association Pedestrian Traffic Fatalities by State: 2018 Preliminary Data

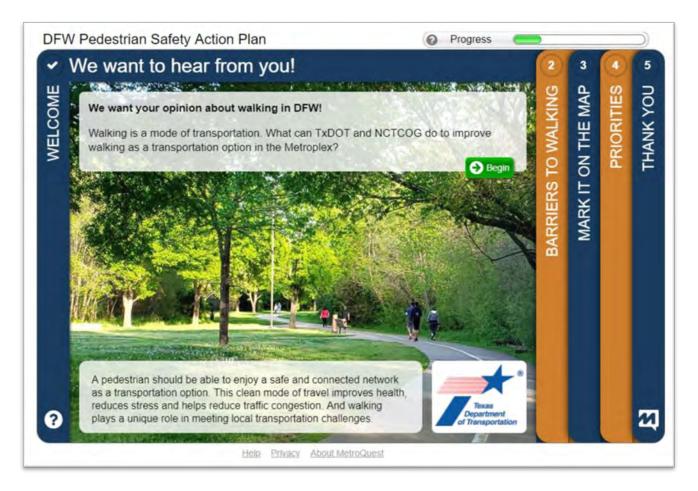
¹ Governors Highway Safety Association (2019). *Pedestrian Traffic Fatalities by State*: 2018 Preliminary Data. [online] Available at: https://www.ghsa.org/sites/default/files/2019-02/FINAL_Pedestrians19.pdf [Accessed 2019].

² Ibid

³ Ibid

Online Engagement, Logistics and Outreach

An online engagement tool, MetroQuest, was facilitated by TxDOT to solicit public feedback in support of the PSAP. The site was composed of five sections, entitled *Welcome*, *Barriers to Walking*, *Mark it on the Map*, *Priorities*, and *Thank You*, the closing section. The link was posted on NCTCOG's PSAP page, www.nctcog.org/pedsafetyplan, from May 6, 2019 through July 5, 2019. The survey took approximately 5 to 7 minutes to complete and was available online 24/7.



MetroQuest online survey opening page. Source: NCTCOG.

The survey was advertised via the following methods:

Social Media

Pictures, text, and links to the survey were shared through social media by NCTCOG, TxDOT, member governments, bicycle/pedestrian committees, local advocacy groups, local/regional/state transportation planning agencies, the Pedestrian Safety Action Committee, and individuals.

Email Reminders, Notifications and Newsletters

NCTCOG's Bicycle and Pedestrian Advisory Committee, which includes approximately 55 members, was sent survey updates and information on a regular basis. NCTCOG's Surface Transportation Technical Committee was also included in outreach efforts. Further, individuals from NCTCOG's "interested parties" mailing list, comprised of roughly 725 active transportation stakeholders, were sent links and updates, encouraging participation in the survey.

Material Distribution at Regional Events

Posters and informational materials to encourage survey participation were displayed and distributed at several popular regional events. Events included EarthX, an Earth Day celebration held at Fair Park in Dallas, and Bike to Work Day, wherein materials were distributed to morning commuters throughout the region's most popular transit facilities.



Promotional material used to advertise the survey. Source: NCTCOG

Incentives

Participants that completed the entire survey and included their contact information were added to a list for a randomized drawing to win one of two gift cards, valued at \$100 each.



Promotional material used to advertise the survey. Source: NCTCOG

Summary of Findings

Respondents identified the absence of sidewalks and trails as the top barrier to walking as a mode of transportation. Existing sidewalk and trail conditions and bad driver behaviors were also cited as barriers, to a lesser degree. Comments on these barriers further noted lack of connectivity to destinations, scooters and other micro-mobility devices as obstacles, and a lack of tree coverage/shade as concerns.

Participants marked areas on a regional map to identify common destinations that respondents currently travel to by any mode, areas with elements that may serve as pedestrian barriers, areas lacking in walkable facilities, and areas where safety is a concern. Amongst these, safety concerns generated the most dropped markers on the map, with the top tagged safety concern being speeding cars along pedestrian routes. The second highest category of identified areas of concern were those areas lacking sidewalks along roadways. The most identified destinations to which respondents would prefer walkable access were shopping centers, followed closely by schools. Respondents also noted on the map a lack of pedestrian facilities to cross highways as the top pedestrian barrier.

Respondents were given the opportunity to rank pedestrian issues under several broad categories including accommodations, safety, education, and overall perceptions of walking as a mode choice. These rankings indicated that regional preference for walking facilities is either a 5-10-foot-wide sidewalk or a shared-use path in lieu of narrow sidewalks or using roadway shoulders as walking areas. Participants indicated that lighting was

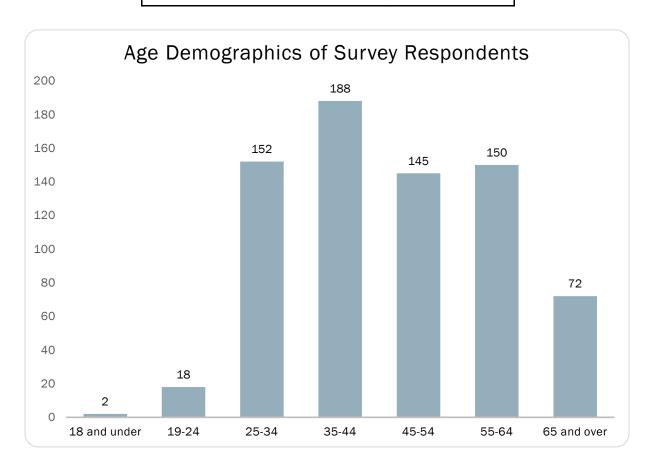
the topmost safety element they preferred on pedestrian facilities, as well as a buffer separation between sidewalks/paths and roads.

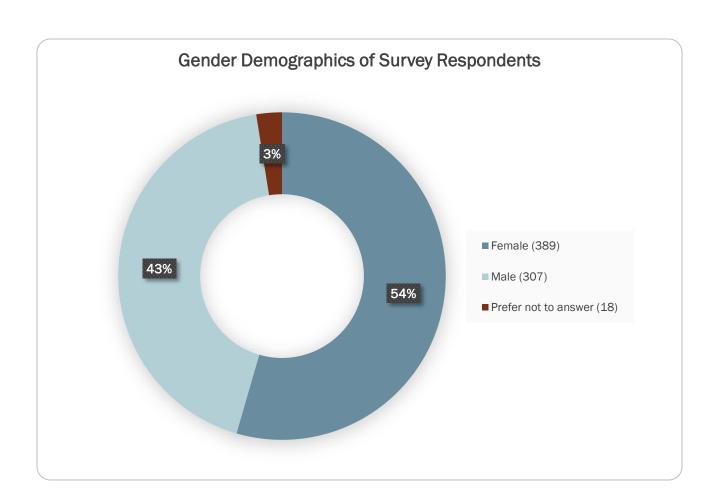
Participants indicated that drivers were in the most need of additional resources and materials needed to effectively educate them on how to share the road with pedestrians. Pedestrians and bicyclists were also noted as needing more education regarding safely sharing travel space (bicyclists) and knowing their role in sharing or walking along the roadway (pedestrians), albeit to a lesser degree than drivers.

Overall opinions indicated that participants would like to use walking as a mode choice more often than they already do. Further, rankings indicated that most respondents would walk more, given a higher degree of existing sidewalks and trails near their residences that could connect them to destinations.

In total, 1,045 participants completed the survey to voice their opinions on pedestrian safety in the region. Of the respondents who provided their demographic information:

Individual Residential Postal Codes Reported: 709





Addressing Pedestrian Barriers

The section entitled *Barriers* to *Walking* (second section, following the welcome screen) asked participants to select the three pedestrian barriers they would most like to see addressed. Following the top three selection steps, respondents were asked to further *rank* those three selections in order of importance, with the first ranked as most important and the second and third ranked as being of lesser importance (in that order). The figures below illustrate the ranking procedure.

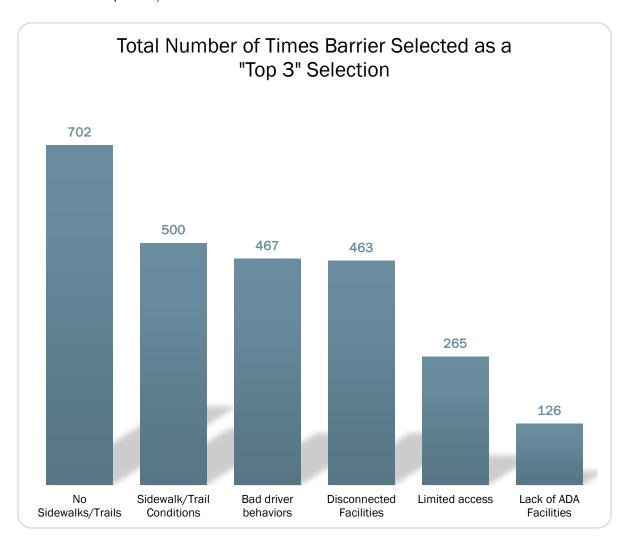




Pedestrian barriers were accompanied by photos, illustrating each described scenario. The pedestrian barrier options to select/rank were:

- Disconnected Facilities: Referring to a poorly connected sidewalk and/or trail system
- Bad Driver Behaviors: Drivers parking on sidewalks, blocking ramps, failing to yield to pedestrian right-ofway, distracted driving, etc.
- No Sidewalks/Trails: Walking facilities are non-existent
- Lack of ADA Facilities: ADA curb ramps/connectors are lacking or in poor condition
- Sidewalk/Trail Conditions: Poor conditions that prohibit carefree walking, including vegetation, cracks, bumps, and missing segments of sidewalks, paths and trails
- Limited Access: Access is limited by construction, highways, bridges, waterways, rail infrastructure, etc.

Participants in the survey most often identified "no sidewalks/trails" as being one of the top three barriers (702 times selected or 27.8 percent), followed next by "sidewalk/trail conditions" (500 times selected or 19.8 percent), "bad driver behaviors" (467 times selected or 18.5 percent) and "disconnected facilities" (463 times selected or 18.4 percent).



Respondents were given the opportunity to provide comments with their responses for each category, as well as a catchall comment area, denoted as the "Suggested Other Items" option. A summary of themes from the total (191) collected comments within this section of the survey is as follows:

No Sidewalks/Trails:

39 comments included the following themes/topics:

Lack of sidewalks and trails along roadways that connect to destinations

Bad Driver Behaviors:

- Drivers not yielding to pedestrian right-of-way
- Speeding and running red lights/stop signs general illegal maneuvers
- Parking practices that make conditions unsafe for pedestrians
- Distracted drivers

Sidewalk Trail Conditions:

25 comments included the following themes/topics:

- Scooters and scooter riders creating cluttered sidewalks for pedestrians
- Road design is auto-centric
- Lacking tree coverage and shade during hot weather

Disconnected Facilities:

17 comments included the following themes/topics:

Trails and sidewalk networks should be continuous and connected to destinations

Lack of ADA Facilities:

6 comments included the following themes/topics:

- Lack of ADA ramps and signals
- Recently installed facilities do not meet current design standards

Limited Access:

18 comments included the following themes/topics:

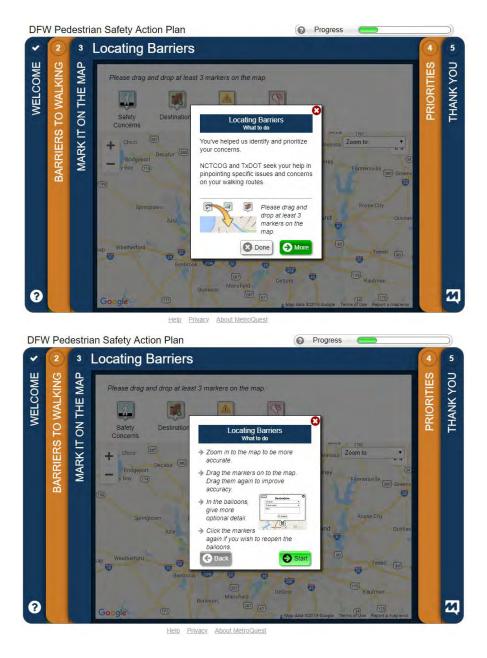
- · Barriers such as highways, railroads, and streets with many lanes
- Sidewalks not maintained during construction
- Lack of connection to other facilities

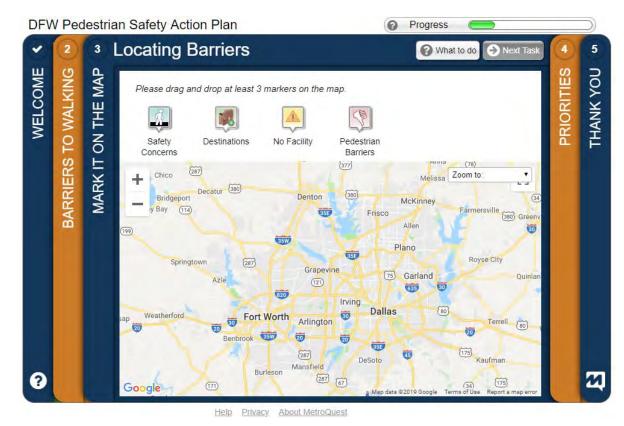
Suggested Other Items (for Safe Pedestrian Travel):

- Lack of traffic signals and pedestrian crossings
- Lack of traffic calming measures, including road diets, speed bumps, etc.
- Auto-centric designed infrastructure, including wide streets

Locating Pedestrian Barriers and Areas of Concern

The third section of the survey, entitled *Mark it on the Map*, displayed a map and drop-markers of four classifications: safety concerns, destinations, no facility, and pedestrian barriers. Participants were asked to drag and drop at least three markers to the map to identify areas with specific issues and concerns on their walking routes. Options to locate on the map included: areas where respondents may have detected dangerous conditions (safety), places where they frequently walk (destinations), areas where they have encountered a lack of existing facilities (no facility), or places where they feel barriers – such as the ones described in section two – may be present (pedestrian barriers). Each marker opened a "balloon" wherein respondents were given the option to provide more detail regarding the types of concerns, destinations, facilities or barriers they had identified (drop-down list) or to leave comments, which are summarized on pages 16-19.





Available details for respondents to select from a drop-down list within each marker balloon were as follows:

Safety Concerns

- Lack of sidewalks
- Missing sidewalk segments
- Visually unappealing surroundings
- Lack of wayfinding/signage
- Crime
- Vehicles parked on sidewalks or blocking sidewalks
- Lack of lighting
- Speeding cars along route

Destinations

- Job Locations
- Medical Facilities
- Shopping Centers
- Schools
- Community Centers

- Destinations need safe/easy access
- Government Buildings

No Facility

- Where are facilities missing
- No ADA accommodation
- No sidewalk along roadway
- Other
- No crosswalk across street

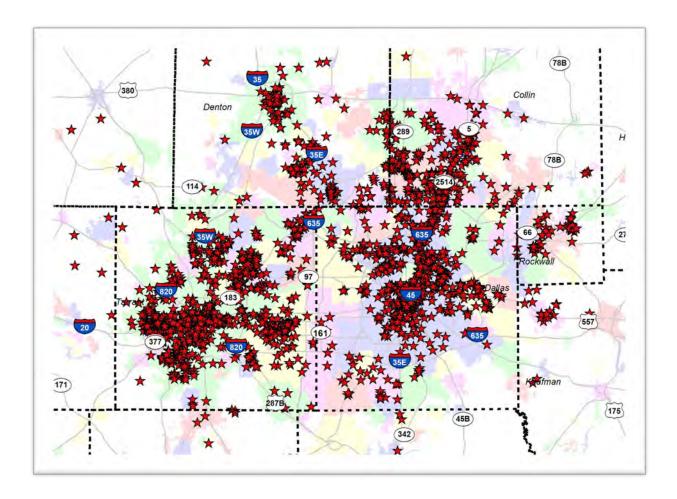
Pedestrian Barriers

- No sidewalk across bridge
- No sidewalk across highway
- No sidewalk across railroad
- Obstacles to pedestrians
- No sidewalk across waterway
- Other

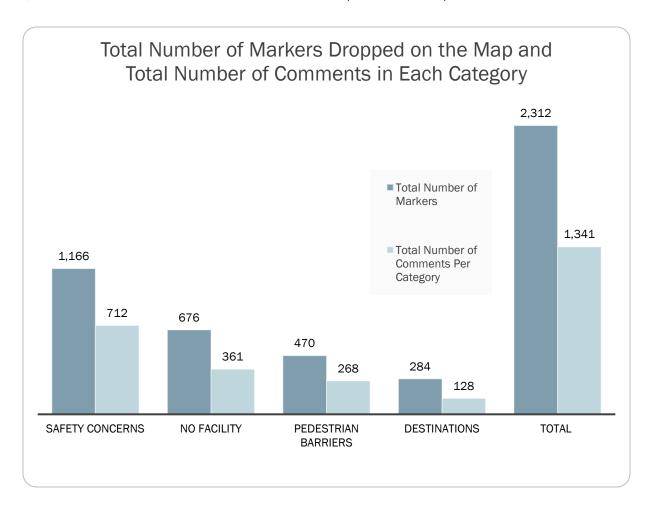
The results of the mapping exercise are identified in the charts on the following pages.

Participants of the survey most commonly added markers to the map indicating "safety concerns" (1,166 drops), followed next by "no facility" (676 drops), "pedestrian barriers" (470 drops), and "destinations" (284 drops). A total of 2,596 markers were dropped on the map.

The map below shows the locations where respondents dropped a total of 2,596 markers to identify a problem or concern. Keyhole Markup Language (KML) files identifying the location of the markers and associated comments were provided to each local jurisdiction to make them aware as to the concerns of their constituents.

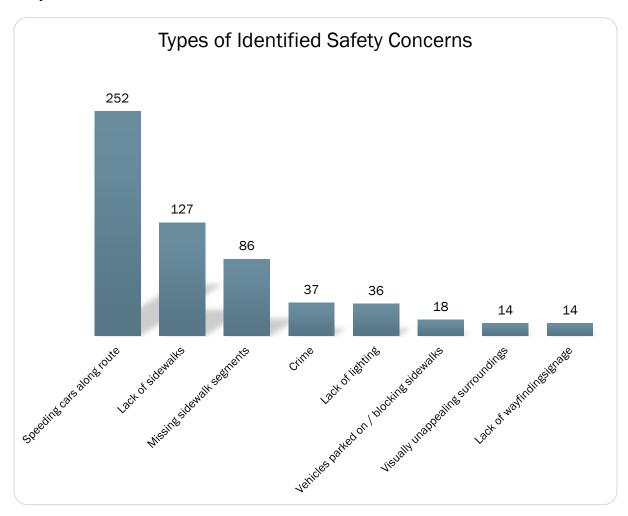


Respondents were given the opportunity to provide comments with each marker dropped on the map, totaling 1,469 comments. Some location markers did not have a specific comment provided.



The following pages provide a summary of location marker details and comments for each of the four main categorized groups: safety concerns, no facilities, pedestrian barriers, and destinations.

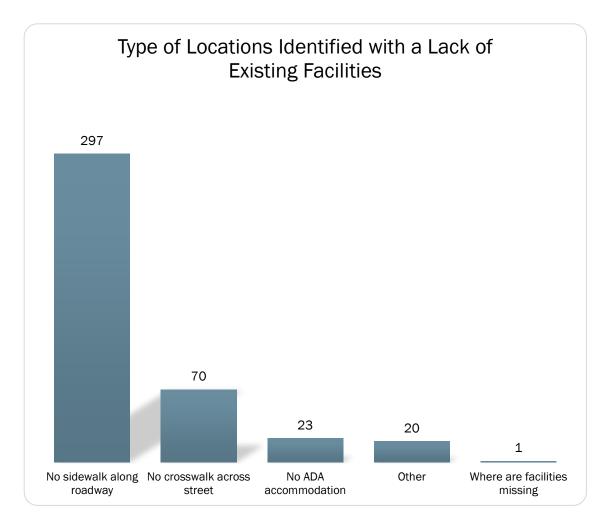
Safety Concerns



The most frequently identified concerns within the *Safety* category were "speeding cars along route" (252) and "lack of sidewalks" (127). Missing sidewalk segments was also identified often (86).

- Speeding cars along route makes it feel unsafe/uncomfortable
- Dangerous drivers are distracted or do not respect the pedestrian in the crosswalk
- Roadways lack crosswalks and are designed to prioritize vehicular volume and speed
- Lighting and marked crosswalks would increase feeling of safety

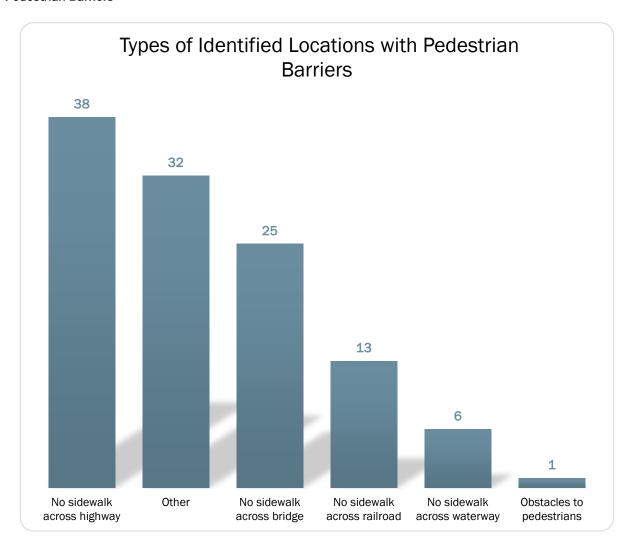
No Facility



The most frequently identified concern within the *No Facility* category was "no sidewalk along roadway" (297). No crosswalk along the street was also identified frequently (70).

- No sidewalks along roadway and a lack of trails
- Lack of sidewalks connecting neighborhoods to retail, health centers, jobs
- Curb ramps and other ADA accommodations absent

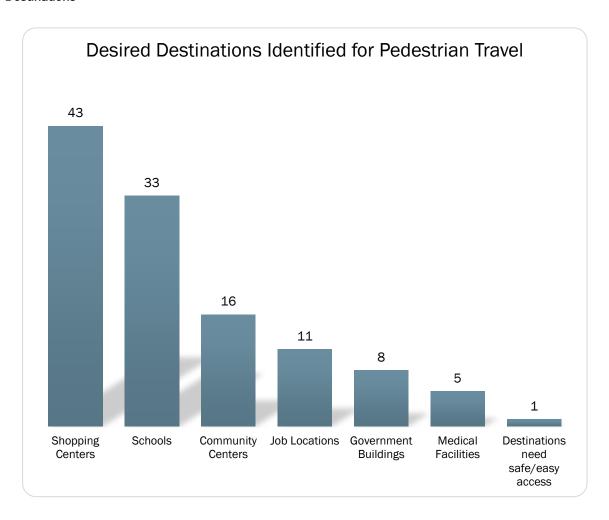
Pedestrian Barriers



The top identified concerns within the *Pedestrian Barriers* category were "no sidewalk across highway(s)" (38) and "no sidewalk across bridge(s)" (25). Many of the respondents that selected "other" within the *pedestrian barriers* category (32) used the comments to provide further details (summarized below).

- Grade-separated barriers such as railroads, highways, and waterways limit access
- Sidewalks should be maintained even during building or roadway construction
- Railroad crossings should be ADA friendly

Destinations



The most commonly identified types of locations that respondents currently travel by foot or would be willing to travel by foot, within the *Destination* category, were "shopping centers" (43) and schools (33). Community centers, job locations and government buildings (16, 11 and 8, respectively) were also noted as destinations where respondents walk or would walk if the appropriate pedestrian facilities were built.

- Mixed use and a variety of uses nearby are needed to increase likelihood of walking
- Missing and direct infrastructure limits ability to access nearby destinations
- Parks, transit, and schools, and shopping centers are important destinations

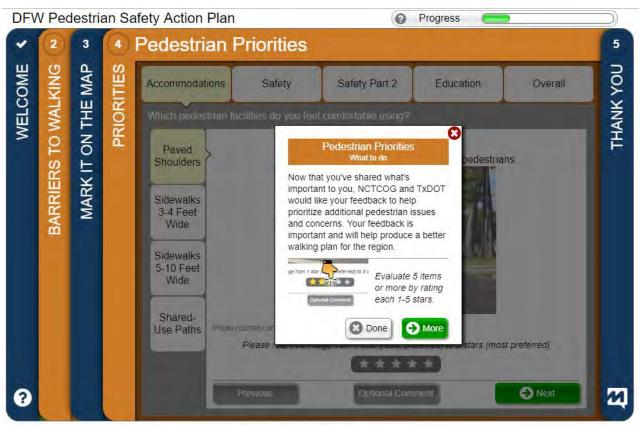
Identifying User Priorities

The Priorities section of the survey asked respondents to rate a series of four options, listed beneath four broad categories: Accommodations, Safety/Safety Part 2, Education, and Overall. The rating system allowed the respondents to give the sub-options between one and five stars, with one star representing the least preferred option, and five stars representing the most preferred option.

A generalized question was provided for each of the broad categories, which helped clarify the topic as respondents ranked the sub-options. Photos were also included with each sub-option to illustrate typical examples wherein the described conditions exist.

The guestions for each of the options were as follows:

Option	Question
Accommodations	Which pedestrian facilities do you feel comfortable using?
Safety	How valuable are these (sub-option) safety measures?
Education	Where should our focus be?
Overall	What are your opinions on the following (sub-options)?



Help Privacy About MetroQuest



Help Privacy About MetroQuest



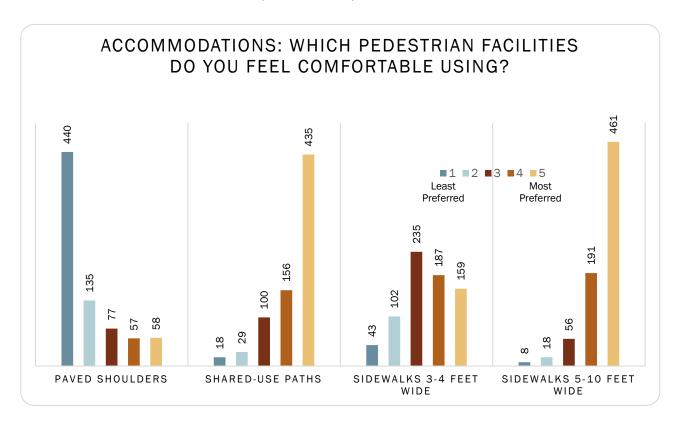
Help Privacy About MetroQuest

Pages 22-29 detail the sub-options respondents were asked to rate, a brief analysis of those responses, a graphical illustration of the responses, and a summary of comments:

Accommodations

A question was posed as to which accommodations respondents feel comfortable using:

- Paved Shoulders: A roadway shoulder can accommodate pedestrians
- Shared-Use Paths: At least 10-12 feet wide and are shared by multiple users, most commonly bicyclists and pedestrians
- Sidewalks 3-4 Feet Wide: Paved route for pedestrians
- Sidewalks 5-10 Feet Wide: Wider paved route for pedestrians



Respondents overwhelmingly gave the highest ranked preferences to 5-10-foot wide sidewalks and shared-use paths. Paved shoulders as pedestrian facilities received the lowest number of highest preferred (five-star) rankings, indicating a general disapproval of the facilities in terms of walkability/comfort. Respondents responded neutral-to-favorably to the 3-4-foot wide sidewalks; however, this preference was overshadowed by the wider (5-10-foot) facilities option.

A Summary of Accommodations comments is as follows:

Paved Shoulders

- Feels unsafe; would like a barrier between motor vehicles and pedestrians
- Unsafe drivers make this option undesirable

Shared Use Paths

55 comments included the following themes/topics:

- Bicyclists should be aware of and respectful of pedestrians
- Shared-use paths feel like the most comfortable option

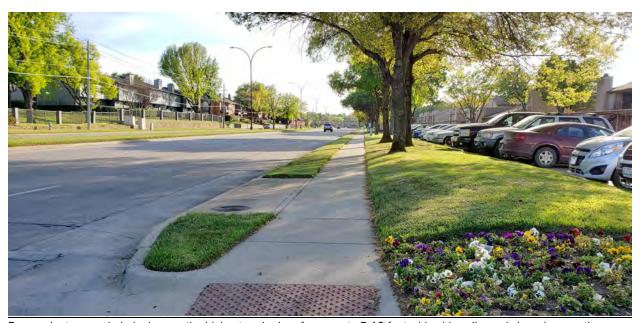
Sidewalks 3-4 Feet

53 comments included the following themes/topics:

- Could be a good option in neighborhoods
- Too narrow for more than one person, does not allow for wheelchairs to pass one another

Sidewalks 5-10 Feet

- Much better option than a narrower sidewalk as it allows for pedestrians to pass one another, including strollers and pets
- 5 foot is still too narrow, even wider preferred on busier streets

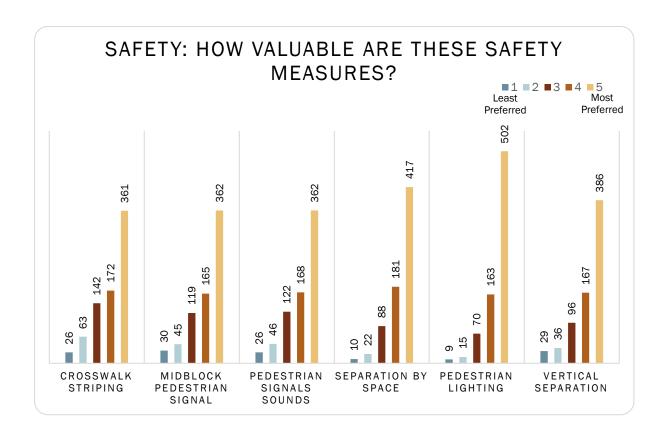


Respondents overwhelmingly gave the highest ranked preferences to 5-10-foot wide sidewalks and shared-use paths, which was indicated on the survey by the above image. Source: NCTCOG

Safety

A question was posed as to how valuable each of the following safety measures is to the respondents:

- Crosswalk Striping: Marked crosswalks at intersections
- Midblock Pedestrian Signal: Midblock street crossing with high visibility features to create safer crossing across a higher speed or higher vehicular volume roadway
- Pedestrian Signals/Sounds: Crossings with traffic control signals and sounds to help pedestrians
- Separation by Space: Sidewalks with a grass or paved buffer from the street curb
- Pedestrian Lighting: Crosswalks or sidewalks with street and/or pedestrian lighting
- Vertical Separation: Street trees or other items in the grass or paved buffer between the street and sidewalk



For the Safety category, respondents strongly ranked all of the safety measures. Amongst all available selections, having adequate lighting near walkable facilities garnered the most favorable rankings, followed closely by the option to have pedestrian facilities separated by space, and pedestrian facilities having a vertical separation. Crosswalk striping, midblock pedestrian signals and pedestrian signals/sounds were ranked similarly, just below the other options (all favorable).

A Summary of Safety comments is as follows:

Crosswalk Striping

63 comments included the following themes/topics:

Visual reminder to drivers to be considerate of pedestrians and alert to their crossing

- Signal timing should be relative to crossing distance
- Striping needs to be maintained and include high visibility crosswalks or 3D crosswalks

Midblock Pedestrian Signal

56 comments included the following themes/topics:

- Education to motorists and pedestrians should precede installation
- Should be signalized on high-speed roadways: pedestrian hybrid beacons vs Rectangular Rapid Flash Beacons

Pedestrian Signals/Sounds

45 comments included the following themes/topics:

- Should automatically be included per ADA
- Motor vehicles need to respect the crosswalk
- Implement "No turn on red" to further protect pedestrians

Separation by Space

42 comments included the following themes/topics:

- Separation by space is desired due to heavy motor vehicle traffic and high speeds
- When implemented, sidewalks should be straight

Pedestrian Lighting

35 comments included the following themes/topics:

Necessary and important to feeling of safety and visibility to motorists

Vertical Separation

- Street trees are desired for a feeling of protection from motor vehicle traffic
- Street trees would also provide shade during hot and sunny weather

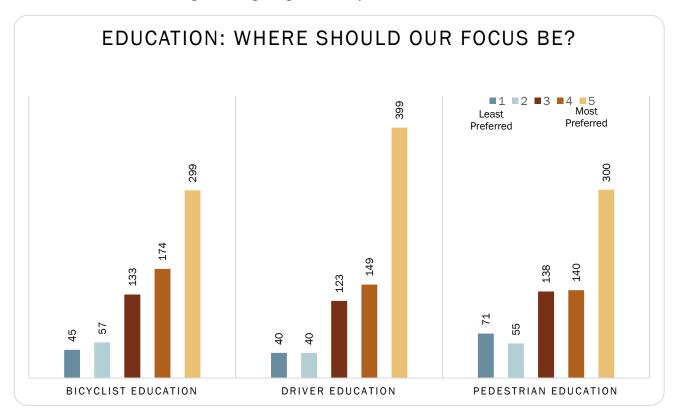


Amongst all available safety measures, having adequate lighting near pedestrian facilities garnered the most favorable response. Source: NCTCOG

Education

A question was posed as to where the focus of traveler education should be:

- Bicyclist Education: Additional resources and materials are needed to effectively educate bicyclists to safely share space with pedestrians
- Driver Education: Additional resources and materials are needed to effectively educate drivers to safely share the road with pedestrians as they cross the street
- Pedestrian Education: Additional resources and materials to effectively educate pedestrians on safety and their role in sharing or walking along the roadway



For the Education category, respondents indicated strong support for education of all roadway users. Amongst the choices, respondents ranked driver education as the most needed type of education, receiving the highest number of favorable ratings. Pedestrian education received the second highest number of favorable rankings, followed by bicyclist education. These results suggest that all travellers are more comfortable when all road users are more knowledgeable of their responsibilities and roles.

A Summary of Education comments is as follows:

Bicyclist Education

55 comments included the following themes/topics:

- Drivers should better understand bicyclist laws
- Bicyclists should follow the rules of the road as well

Driver Education

- Drivers are distracted and need to pay attention at crosswalks
- Drivers should better understand bicyclist laws
- Enforcement is needed along with education

Pedestrian Education

- Avoid victim blaming and lecturing
- "Use the crosswalk" is lost on pedestrians and motorists when there is no painted crosswalk
- Pedestrian education is good, but ultimately their safety is at the hands of motorists

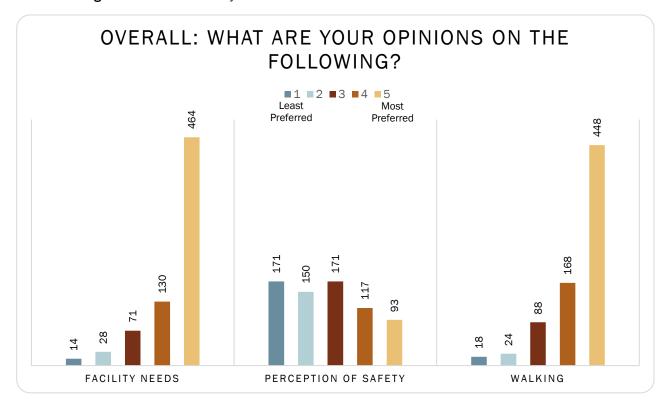


Survey respondents indicated strong support for education of all roadway users. Source: NCTCOG

<u>Overall</u>

Respondents were asked to rank each of the following sub-options:

- Facility Needs: I would walk more if there were sidewalks/trails near my house that connect to destinations
- Perception of Safety: If I had a child, I would let them walk to a nearby school or store
- Walking: I would like to travel by foot more than I do now



Overall, participants indicated strong support for more sidewalks that connect to destinations, and a desire to walk more by foot than they currently do. Amongst the choices, facility needs received the highest number of favorable rankings, followed closely by the option of walking as a modal choice. The perception of safety option, wherein respondents were asked if they would let their child walk to a nearby store or school, received the most equally distributed rankings, with as many respondents being neutral to the option as they were unfavorable to it.

A Summary of Overall comments is as follows:

Facility Needs

- Trails should be connected to destinations, not just for recreation
- Trails should be shaded
- Pedestrian crosswalk buttons should not be needed, pedestrian cycle should be automatically included in signal timing

Perception of Safety

61 comments included the following themes/topics:

- Inattentive drivers discourage allowing children to walk alone
- Sidewalk condition and connectivity at intersections impacts decision

Walking

40 comments included the following themes/topics:

- Sidewalk maintenance needs and lack of connections prevent many trips
- Personal Safety is a concern
- Walking is enjoyable and good for the environment



Overall, participants indicated strong support for more sidewalks that connect to destinations, and a desire to walk more by foot than they currently do. Source: NCTCOG

Conclusion

The survey captured the feedback of 1,045 respondents, predominantly within the 25-65+ age range at the time of the survey, with a slightly higher ratio of females-to-males (54 percent vs 43 percent respectively). Respondents indicated that they would like to walk more than they do now and would do so if more facilities were built within the region. Respondents also indicated that their preferred pedestrian facilities are wide sidewalks (5-10 feet) or shared-use paths (off-street), that connect users to shopping centers, schools, community centers, jobs, government buildings and medical facilities. Preferred facilities are also those that are safe for users of all ages and abilities, without missing sidewalk segments, which allow pedestrian passage across highways, bridges, railroads, waterways, and other barriers. Educational outreach should target drivers, pedestrians, and bicyclists, to ensure that coordination across all modes of travel is achieved, wherein comfort levels increase, and crashes of all types decrease.