

Pedestrian Facility Inventory Prepares for Future Planning in Lexington

Lexington Area Metropolitan Planning Organization

KEY ELEMENTS:



Understanding of existing conditions



Supports planning

The Lexington Area Metropolitan Planning Organization (MPO) created a pedestrian facility database to establish baseline conditions, identify deficiencies, and inform long range plans. From 2003 through 2007, the MPO successfully mapped and recorded pedestrian facilities over 85 square miles of Fayette County's urbanized areas.¹

Figure 1.1. Absent Pedestrian Facilities Along Major Roads in Fayette County

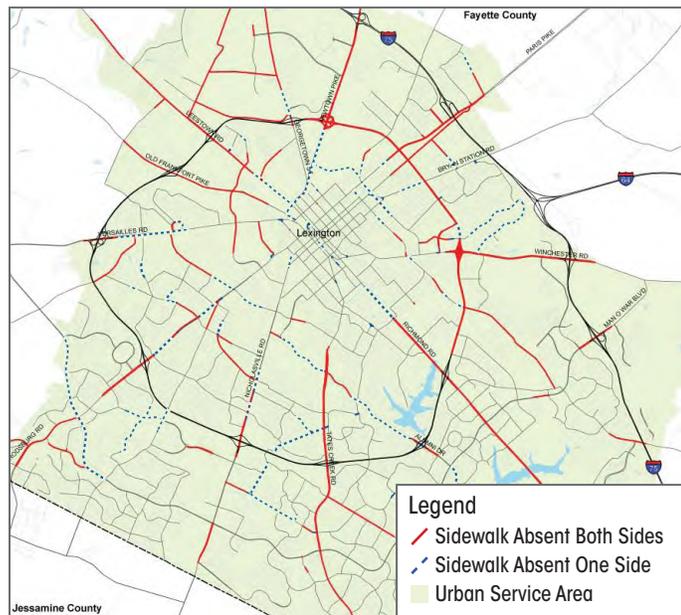


Figure 1. Absent pedestrian facilities along major roads in Fayette County during 2007 Bicycle and Pedestrian Plan process.²

DATA COLLECTION PROCESS

To create its pedestrian facilities inventory, the MPO first defined the data collection process and necessary roadway characteristics. These features included the presence of sidewalks and buffers and widths, walkable width, presence of bike lanes and shoulders, and condition of the sidewalk. The MPO structured the data collection after successfully examples in Duluth, Minnesota, and Seattle, Washington.

During the site visits, the field observers collected information on intersection characteristics such as signal types and the presence of crosswalks and curb ramps. The sidewalk information was coded, georeferenced, and stored in the MPO's geographic information system (GIS) database, and the intersection data was stored in an Access database.

APPLICATION OF THE PEDESTRIAN FACILITIES INVENTORY FOR CROSSING LOCATIONS

An updated pedestrian facilities and intersection inventory can reveal gaps in an area's network. Lexington MPO's inventory was used during the 2007 and 2017 Bicycle and Pedestrian Master Planning processes to locate pedestrian facility gaps and prioritize roadway improvements and retrofits to provide access to transit, schools, parks, and other destinations.³

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EDC-4 STEP: https://www.fhwa.dot.gov/innovation/everydaycounts/edc_4/step.cfm

The Lexington Area MPO primarily uses the inventory for the prioritization of roadway projects during long-range transportation planning. In the prioritization process, proposed projects that include new sidewalk facilities may be awarded bonus points. The pedestrian facilities inventory initially allowed the MPO's planners and local governments to easily determine the condition of existing pedestrian facilities, if any exist.⁴

LESSONS LEARNED AND FUTURE IMPROVEMENTS

Looking ahead, there are several ways a local government could improve its pedestrian inventory data collection process and management. The Lexington Area MPO experience suggests the following considerations:

- Thoughtfully structure the inventory's methodology and data fields to capture a realistic set of factors that may be needed to recommend facility and crossing improvements.
- Ensure that other agencies or divisions that affect pedestrian facility and crossing decisions, like Traffic and Public Works, adopt and use the inventory.
- Develop and institutionalize a process for updating and maintaining the inventory's information.
- Use the inventory to prioritize pedestrian crossing improvements based on existing sidewalk facilities.

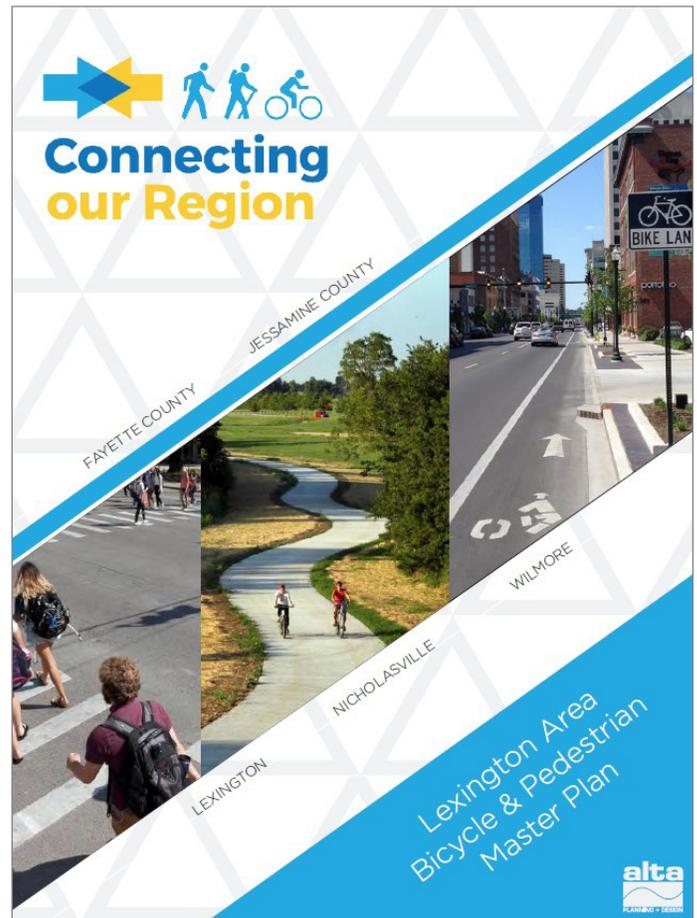


Figure 2. Cover of 2018 Lexington Area Bicycle and Pedestrian Master Plan.⁵

“Having an accurate pedestrian inventory was critical for prioritizing and advancing projects to improve pedestrian safety and to make sure that pedestrian improvements were incorporated into other ongoing maintenance activities.”

—Kenzie Gleason, Administrative Officer, Planning Department, City of Lexington, KY

References

1. Federal Highway Administration, “Pedestrian and Bicycle Data Collection in United States Communities,” (2005) http://www.pedbikeinfo.org/pdf/casestudies/PBIC_Data_Collection_Case_Studies.pdf
2. Lexington Area MPO, “Bicycle and Pedestrian Master Plan,” (2007). http://lexareampo.org/wp-content/uploads/2014/12/Bike-Ped_masterplanwithappendpart1.pdf
3. Lexington Area MPO, “2017 Bike and Pedestrian Plan: Connecting our Region,” <https://lexareampo.org/studiesplans/connectlex/>
4. Gleason, Kenzie. Administrative Officer, Planning Department, City of Lexington, KY. 26 Sept. 2017.
5. Lexington Area MPO and Alta Planning and Design. Lexington Area Bicycle and Pedestrian Master Plan, (2018). <http://lexareampo.org/wp-content/uploads/2018/04/BPMP-Master-Plan-Reduced.pdf>