



EXECUTIVE SUMMARY

I-64 Corridor Study, Story Avenue to I-264 Jefferson County, Kentucky

Item No. 5-553.00

December 2021



AECOM

Executive Summary

The I-64 Corridor Study was initiated by the Kentucky Transportation Cabinet (KYTC) in August of 2019 to evaluate potential improvement strategies to address safety and operational performance on I-64 between Story Avenue and I-264. Recent improvements to the Kennedy Interchange have improved operations and safety near the west end of the study area, but congestion persists along I-64 from Story Avenue to I-264 during both AM and PM peak hours.

This study is classified as a Planning and Environmental Linkage (PEL) Study. As defined by the Federal Highway Administration (FHWA), a PEL represents a collaborative and integrated approach to transportation decision making that considers environmental, community, and economic goals early in the transportation planning process and uses the information, analysis, and products developed during planning to inform the environmental review process. Along with the congestion and safety concerns within the study area, this corridor is surrounded by multiple environmental resources. These resources include Clifton Park, Beargrass Creek Greenway, Cherokee Park, Cochran Hill Tunnel, Cochran Hill Dog Run, Seneca Park, and Brown Park. The study area is illustrated in **Figure ES-1**.

The objective of the I-64 Corridor Study is to evaluate transportation needs related to safety and congestion of I-64 from Story Avenue to I-264.

The initial study goals are as follows:

- Reduce congestion
- Accommodate transportation demand
- Address roadway deficiencies
- Limit environmental effects

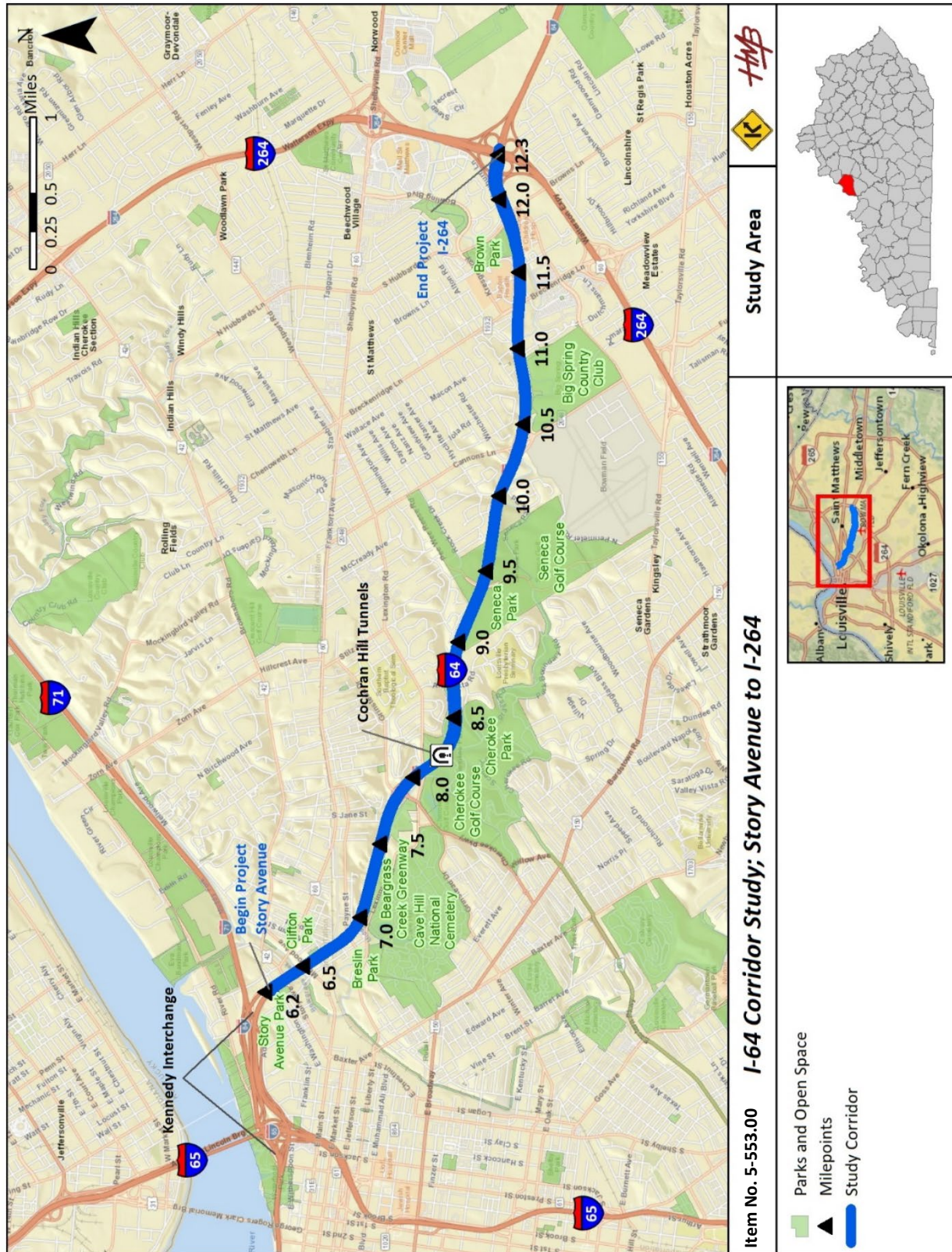
To accomplish the objective and goals, the Project Team (consisting of KYTC, Kentuckiana Regional Planning and Development Agency (KIPDA), and consultant staff) worked collaboratively with the public, local officials, and stakeholders to accomplish the following tasks:

- Conduct a comprehensive review of the existing conditions
- Identify locations in need of improvement
- Develop / evaluate improvement strategies
- Recommend any feasible improvement strategies for future programming

During the study, multiple collaborative meetings were held. These included three Project Team meetings made up of KYTC, KIPDA, Federal Highway Administration (FHWA), and consultant staff, as well as two local officials / stakeholders (LO/S) meetings. Each LO/S meeting was followed by a virtual public outreach effort to gather input from the community surrounding the study area.

Initial coordination efforts included two Project Team meetings, a LO/S meeting and public outreach effort. The first Project Team meeting provided an opportunity to review the project background and purpose of the study, present and discuss the existing conditions information, and discuss preliminary improvement strategy types to be considered. The second Project Team Meeting reviewed additional existing conditions analyses, environmental resources, and the public engagement plan.

Figure ES-1. Study Area



Based on an analysis of existing conditions, the following three types of improvement strategies were identified:

Transportation Systems Management and Operations (TSMO) Improvement Strategies

As defined by FHWA, TSMO is a set of strategies that focus on operational improvements that can maintain and even restore the performance of the existing transportation system to levels that existed before extra capacity is needed. Some of these improvement strategies include enhanced traveler information, advance warning systems, variable message boards, High Occupancy Vehicle (HOV) lanes, and reversible lanes.

Spot and Safety Improvement Strategies

Spot and safety improvement strategies are less invasive ways to improve safety and congestion throughout the study area without making major modifications to I-64. A few examples of these types of improvements are extending acceleration / deceleration lanes at interchanges, adding auxiliary lanes to connect interchanges, or widening I-64 through targeted segments of the study area to address safety and congestion.

Major Widening Improvement Strategies

Major widening strategies include adding capacity to I-64 throughout the study area. These strategies were evaluated as a part of this study in an effort to evaluate all levels of strategies that could improve safety and congestion throughout the study area. Considering these strategies helped the Project Team compare the impacts of adding capacity throughout the corridor to the impacts of the TSMO and Spot and Safety improvements. Mitigating impacts to environmental resources surrounding the study area was critical to the development of any major widening strategy. These concepts can be considered long-term options if no other improvements are found to improve safety and congestion along this section of I-64.

Following the identification of improvement strategy types, a specific list of improvement strategies and locations was developed. Additional information and analysis were required to identify improvement strategies and their locations. This included the following:

- Build Forecast and Traffic Analysis
- Crash Analysis
- Geometric Constraints
- Environmental Constraints

The third and final Project Team meeting was held in October 2020. The materials presented and discussed during the meeting included: Public outreach effort – Survey No. 1 results; additional traffic analysis, environmental findings update, geotechnical findings, and an initial list of improvement strategies. Following the meeting, the consultant team refined the list of improvement strategies which were presented to the LO/S and the public. These are presented in **Table 14** of the main report.

The second LO/S meeting was held in December 2020. At this meeting the Project Team presented additional study findings and analysis and collected input on the revised list of improvement strategies. The second public outreach effort was also held from December 2020 until January 2021. Similar to the first, materials were provided in the form of an ArcGIS StoryMap, including the information compiled and presented at the final Project Team and LO/S meetings. The presentation concluded with an online survey from which 757 responses were received. Key statistics from the survey results are as follows:

- 54 percent of responses do not support any improvements to this section of I-64, while another 12 percent were not sure.

- However, when participants were asked about specific improvement strategies, 61 percent supported at least one TSMO improvement strategy.
- The public strongly opposed all Major Widening Strategies with 72 percent selecting the “none of the above” option. However, 20 percent responded that of all of the widening strategies presented they preferred the strategy *Widen to the Inside to Provide Three Lanes in each Direction and to Widen the Existing Tunnels on Center*.

The Project Team concluded that based on the current conditions, traffic projections, engineering analysis, and public feedback, only **Improvement Strategies A, B, and C are recommended as high priority, short term strategies**. **Improvement Strategy D** is recommended for further consideration. It should be considered a **low priority, long term solution** for the corridor that will require additional traffic analysis to confirm the potential congestion benefits.

The Improvement Strategies are described in **Table ES-1** and are detailed in **Figures ES-2, ES-3, ES-4, and ES-5**.

Table ES-1. Recommended Improvement Strategies

Improvement Strategy	Description
A	Provide Advance Warning System for Westbound I-64 at Grinstead Drive
B	Extend Acceleration and Deceleration Lanes at Mellwood Avenue, Grinstead Drive WB On Ramp, Cannons Lane, and I-64 Westbound On Ramp
C	Widen I-64 Off Ramp to Grinstead to Provide Dual Lefts onto Grinstead Drive
D	Widen I-64 to the Inside to Provide Auxiliary Lanes Between Mellwood Avenue and Grinstead Drive and also Between Cannons Lane and I-264 (no impacts to Cochran Hill Tunnel)

While one major widening improvement strategy was considered in more detail, it was found to **not be feasible** at this time given the extensive project cost, potential environmental impacts, and public opposition.

At this time, no additional funding is programmed to further study this corridor or for specific improvement strategies recommended in this study. **Improvement Strategy A** is proposed as a short-term, low cost TSMO improvement strategy and could be initiated either through the KYTC District 5 routine maintenance and traffic program or become part of a systematic program such as Pavement Rehabilitation or Highway Safety Improvement Program (HSIP). This strategy will also need to be coordinated with TRIMARC. For **Improvement Strategies B and C**, the next phase in the project development process is Phase I Preliminary Engineering and Environmental Analysis. If federal funds are used or permits will be required, additional environmental analyses will be required to satisfy the National Environmental Policy Act (NEPA). These strategies would also need to be integrated into Kentucky’s Prioritization Program, Strategic Highway Investment Formula for Tomorrow (SHIFT). Through this mechanism, they can be funded in the highway plan. Improvement Strategies will also need to be incorporated into KIPDA’s Metropolitan Transportation Plan and TIP and KYTC’s Statewide Transportation Improvement Plan (STIP).

Figure ES-2. Improvement Strategy A – Advance Warning System

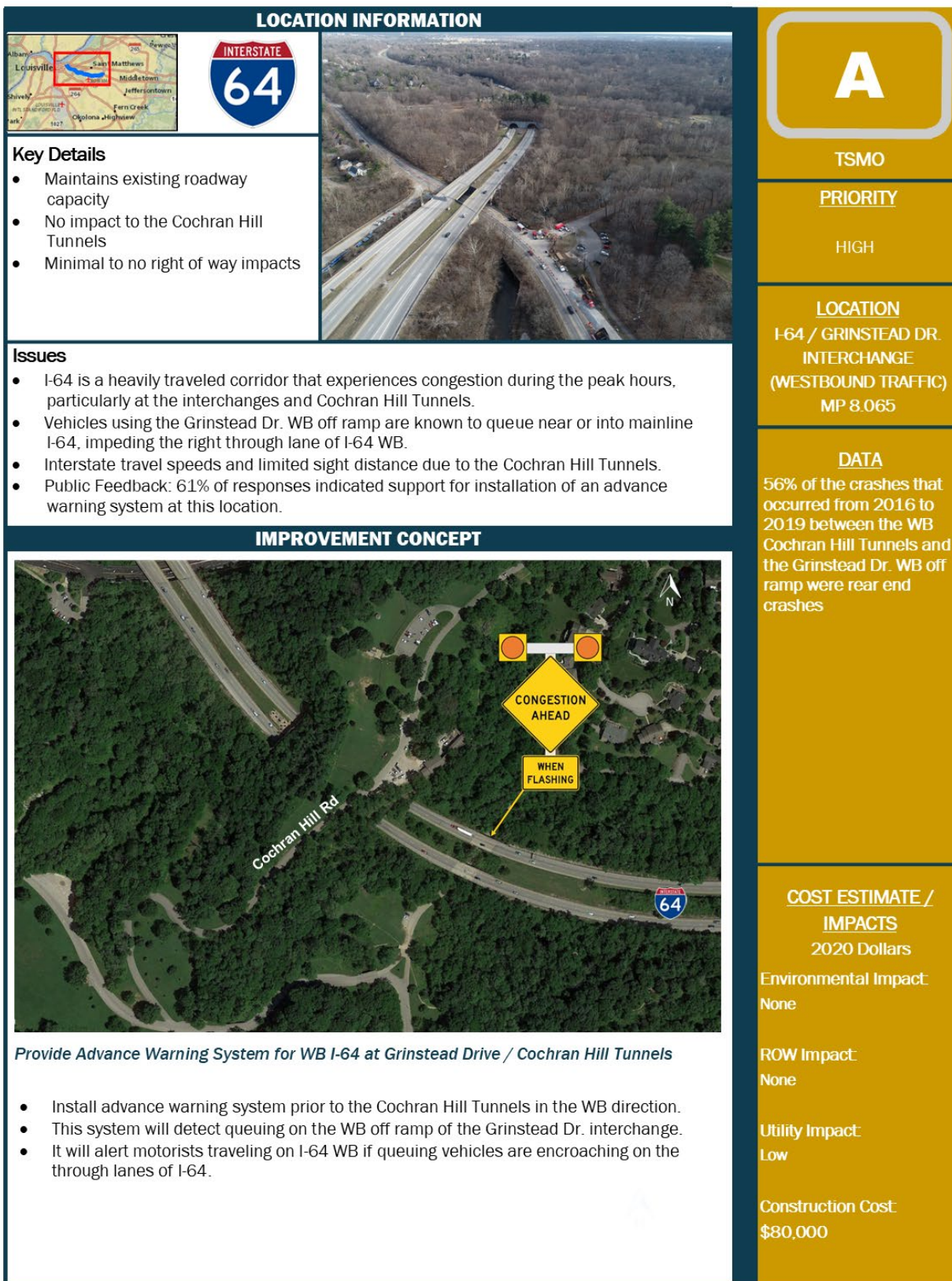


Figure ES-3. Improvement Strategy B - Extend Acceleration and Deceleration Lanes at Mellwood Avenue, Grinstead Drive WB On Ramp, Cannons Lane, and I-264 WB On Ramp Interchanges

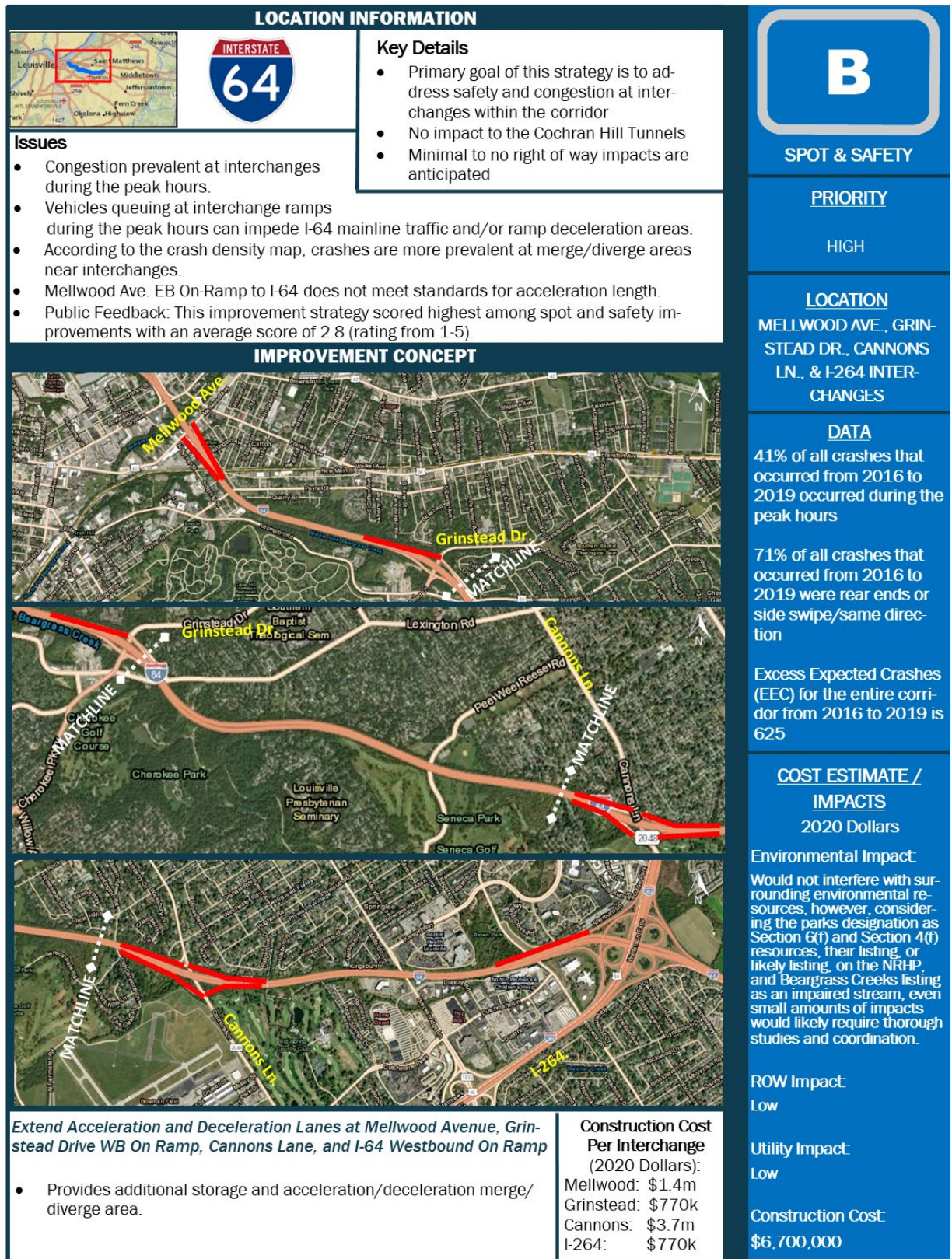


Figure ES-4. Improvement Strategy C – Widen I-64 WB Off Ramp to Grinstead Drive to Provide Dual Lefts Onto Grinstead Drive

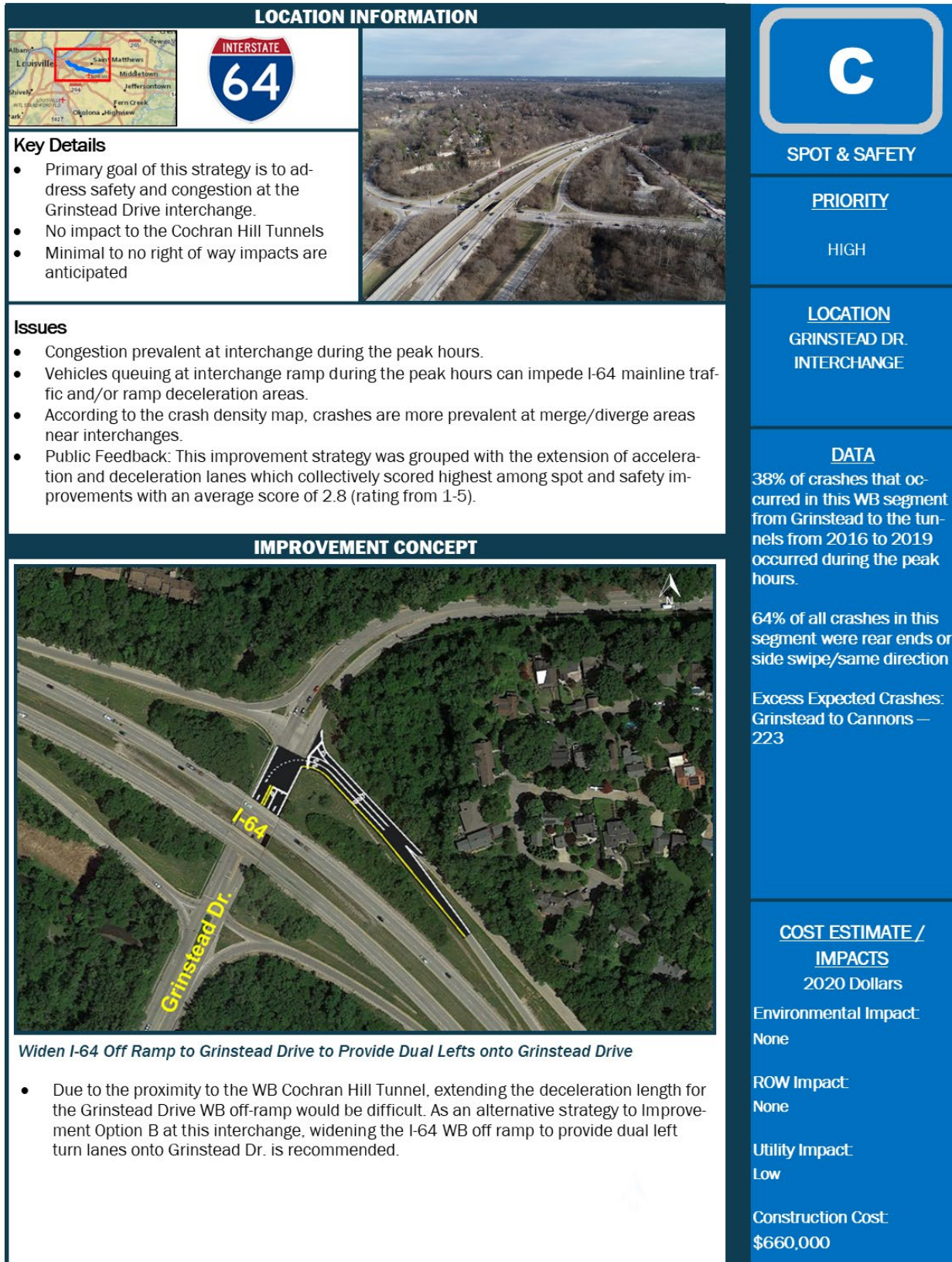


Figure ES-5. Improvement Strategy D - Auxiliary Lanes between Mellwood Avenue and Grinstead Drive and Cannons Lane and I-264

