

1.0 GENERAL PROJECT INFORMATION

1.1 Introduction

The Florida Department of Transportation (FDOT) District Five has prepared this Interchange Operational Analysis Report (IOAR) for the proposed improvements at the I-95 and Fiske Boulevard (SR 519) interchange located in Brevard County, Florida. The project location is illustrated in **Figure 1**. The project is currently under design. The construction letting date is currently set for January 2021 with an anticipated opening year in 2023.

1.2 Purpose and Need

The purpose of this project is to provide operational benefits at the interchange of I-95 and Fiske Boulevard. The following existing operations have been observed at the interchange intersections:

- Fiske Boulevard at the I-95 Northbound Ramps
 - In the existing PM peak hour, queues have been observed on the I-95 northbound off-ramp.
 - In the existing AM peak hour, queues have been observed on the I-95 northbound off-ramp. In addition, significant delays have been observed for the eastbound left turn movement at the I-95 northbound off-ramp causing this movement to experience failing conditions.
 - While the existing queues do not back onto the I-95 mainline, the delays and queues are anticipated to worsen in the future conditions, which could have an impact on the I-95 mainline operations.
- Fiske Boulevard at the I-95 Southbound Ramps
 - In the existing PM peak hour, the westbound left turn movement (from the southbound off-ramp) experiences significant delays.

The proposed improvements are expected to improve operating conditions at both ramp terminals and prevent adverse impacts to the I-95 mainline. The proposed improvements will improve capacity at the ramp terminals and are expected to provide safety benefits.

To address the existing and future needs, the proposed improvements include the following:

- Fiske Boulevard at the I-95 Northbound Ramps
 - Additional northbound left turn lane and the corresponding widening of the I-95 northbound on-ramp to accommodate the dual left turn lanes. The two lane on-ramp merges to one lane before the freeway ramp gore, therefore maintaining existing lanes at the gore point.
 - Extension of storage for the northbound left turn lanes on Fiske Boulevard.
 - Modification of the southbound channelized right turn lane on Fiske Boulevard to remove free flow lane and bring the movement under signal control.
 - Additional eastbound left turn lane on the I-95 northbound off-ramp approach.

- Fiske Boulevard at the I-95 Southbound Ramps
 - Additional southbound left turn lane and the corresponding widening of the I-95 southbound on-ramp to accommodate the dual left turn lanes. The two lane on-ramp merges to one lane at the freeway ramp gore, therefore maintaining existing lanes at the gore point.
 - Removal of the existing northbound U-turn/left turn lane on Fiske Boulevard.
 - Modification of the northbound channelized right turn lane on Fiske Boulevard to remove free flow lane and bring the movement under signal control.
 - Additional westbound left turn lane on the I-95 southbound off-ramp approach.

