### 119<sup>th</sup> Street and I-35 Interchange Reconfiguration Project

Beth Wright

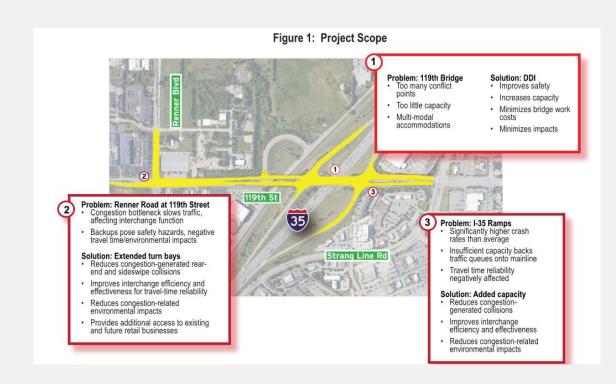
Deputy Director of Public Works

April 21, 2020



### Agenda

- 119<sup>th</sup> and I-35 Project Delivery Overview
  - Comparable DDI Projects and Takeaways
  - Impact Reduction Strategy
  - Construction Phasing Alternatives and Selected Alternative
  - Leveraging A+B Procurement



## Comparable DDI Projects and Takeaways

- Roe Avenue / I-435 (Overland Park) 2014
- 95<sup>th</sup> Street / I-35 (Lenexa) 2016
- Turner Diagonal / I-70 (UG/KCK) 2020

### **Takeaways**

- For interchange type conversions to DDI = Value in Closure
- Value in having proposers compete on schedule
- For 119<sup>th</sup> and I-35 scope is favorable to competition



## 119th and I-35 Impact Reduction Strategy

- Goal: Minimize the overall impact to the community and find the right balance between cost, closures, and speed of construction while maintaining safety
- Impact Reduction Strategy
  - Planning
  - Design
  - Construction
    - Schedule/Time
    - Traffic
  - Public Outreach



## 119th Street and I-35 Construction Phasing





### 119th Street and I-35 Construction Phasing

- Alternative A Closure with Rights On/Off I-35 Only
  - Time
    - Estimated 13 month construction schedule, up to 3 months for time critical work
  - Traffic
    - Reduce lanes on 119<sup>th</sup> Street and/or ramps to assist in prep work before closure
    - Time critical = Full closure of 119<sup>th</sup> Street bridges over I-35 with Rights On/Off I-35 Only
- Alternative B Maintain Traffic With Reduced Lanes
  - Time
    - Estimated 24 month construction schedule, minimum 8 months for time critical work
  - Traffic
    - Time critical = 119<sup>th</sup> Street reduced to one through lane in each direction
    - I-35 ramps lanes reduced to one left-turn and one right-turn lane



# 119<sup>th</sup> Street and I-35 Construction Phasing Alternative A – Closure with Rights On/Off I-35 Only



#### **PROS**

- Shorter construction time
- Closure will allow contractor better access to critical construction area
- Less traffic control pattern changes
- Less temporary construction

#### **CONS**

 No through traffic on 119<sup>th</sup> Street during closure



# 119<sup>th</sup> Street and I-35 Construction Phasing Alternative B - Maintain Traffic With Reduced Lanes



#### **PROS**

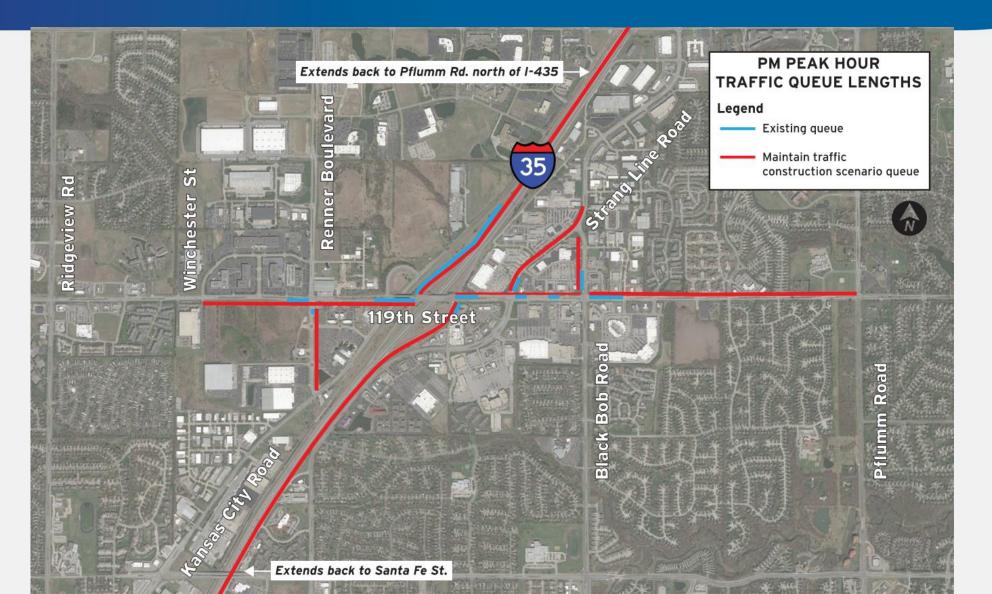
- 119th Street open to through traffic
- The interchange ramps are open

#### **CONS**

- Longer construction time 2x as long
- More temporary construction
- Numerous traffic pattern changes
- Excessive backups



# 119<sup>th</sup> Street and I-35 Construction Phasing Alternative B - Maintain Traffic With Reduced Lanes





# 119<sup>th</sup> Street and I-35 Construction Phasing Selected Alternative – Closure with Rights On/Off I-35 Only

- Stakeholder Input
  - Public Survey collected over 1,000 responses
  - 88% prefer Alternative A with a shorter construction schedule
  - Businesses/Organizations in the corridor prefer Alternative A Including: Olathe School District, Olathe Dodge, Target, Main Event, Bass Pro, Home Depot
- Alternative A is the shortest construction duration
- Minimizes the overall impact balance between cost, lane reductions, closures, and speed of construction
- Fewer traffic pattern changes



## Leveraging Price + Time (A + B) Procurement

- How does using a Price + Time (A + B) procurement model help the City achieve their objectives?
  - Traditional Procurement

A + B Procurement

- The A + B procurement method rewards bidders for pledging to accelerate completion of the project, or portion thereof
- The best-value bid is determined based on a combination of Price and Schedule



## A+B Procurement Scoring Example

Bidder	Price (A)				
	Contract Bid Price	# Closure Days	Road User Costs	Time (B) Subtotal	A + B Proposal Score
#1	\$34,800,000	150	\$15,000	2,250,000	37,050,000
#2	\$36,000,000	90	\$15,000	1,350,000	37,350,000
#3	\$35,400,000	105	\$15,000	1,575,000	36,975,000



## **EXAMPLE:** A+B Procurement Scoring

Bidder	Price (A)	Time (B)			
	Contract Bid Price	# Bridge Closure Days	Road User Costs	Time (B) Subtotal	A + B Proposal Score
#1	\$34,800,000	150	\$15,000	2,250,000	37,050,000
#2	\$36,000,000	90	\$15,000	1,350,000	37,350,000
#3	\$35,400,000	( 95 )	\$15,000	<b>=</b> 1,425,000	36,825,000

• A +

B + = SCORE

### Summary

 119<sup>th</sup> Street and I-35 Phasing Alternative A leveraged closure is overall least impactful way to deliver the project

- Schedule
  - Land Acquisition Spring 2020
  - Utility Relocation Agreements Spring 2020
  - City/State Agreement with KDOT Summer 2020
  - BUILD Grant Agreement Summer 2020
  - Bid Award Fall/Winter 2020
  - Ground Breaking Fall/Winter 2020

