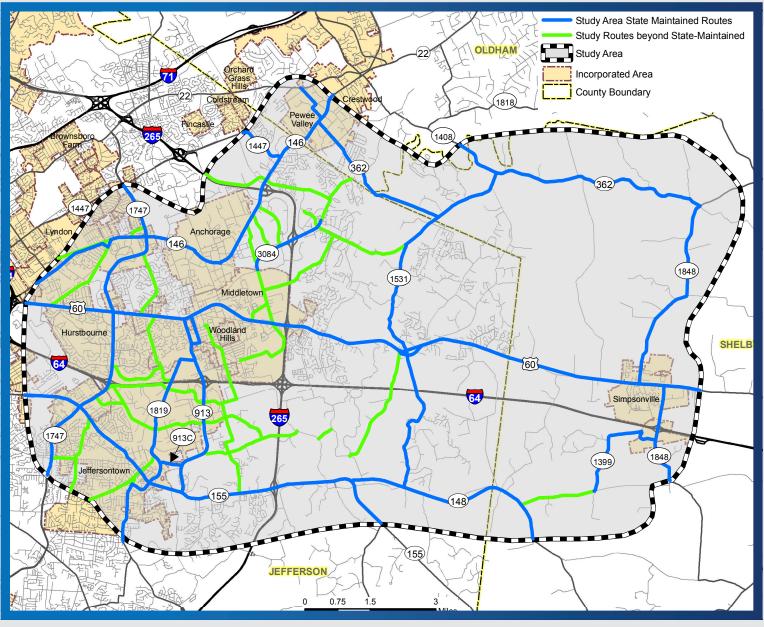
# MIDDLETOWN to SIMPSONVILLE **NEEDS ANALYSIS** STUDY







**JULY 2019** 



In Partnership With



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#### **EXECUTIVE SUMMARY**

The Kentucky Transportation Cabinet (KYTC) initiated a Needs Analysis Study for portions of Jefferson, Oldham, and Shelby counties. The study examined transportation needs related to safety and congestion on key routes in the study area to assist KYTC District 5 personnel and other elected public officials in the decision-making process as the 2020 Strategic Highway Investment Formula for Tomorrow (SHIFT) cycle began. SHIFT is the mechanism used to prioritize projects for Kentucky's biennial highway plan; key steps in the process are illustrated in **Figure ES-1**.

The study began in October 2018, with the goal of producing information to feed into the 2020 SHIFT sponsorship phase, scheduled to occur January 2 through March 15, 2019. Therefore, the project team inventoried existing conditions (**Chapter 2**) on study routes, including state-maintained routes and a selection of city- and county-owned local roadways, representing nearly 140 centerline miles of highway. The team reviewed previous plans, projects, and studies (**Chapter 3**). KYTC District 5 provided a list of 40 projects for evaluation. Ten additional possible improvement concepts were developed after a gap analysis was completed (**Chapter 4**). A comprehensive project matrix was compiled (**Chapter 5**), summarizing up-to-date project descriptions, cost estimates, safety statistics, and congestion information.

**Table ES-1** contains the matrix; project locations are shown geographically in **Figure ES-3 (p. ES-6)**. In total, 26 projects within the matrix were selected for sponsorship in 2020 SHIFT, shown with an asterisk by their name on the map.

Figure ES-2 contains a template for the matrix format, including a hypothetical project.

- The first portion of the matrix, noted with a red 1 and blue 2 in **Figure ES-2**, contain background information about the proposed project.
- The central portion, noted with a purple 3, describes year 2018 existing and year 2040 No-Build future traffic, highlighting any segments operating at Level of Service (LOS) E/F, having a volume to capacity (v/c) ratio ≥0.8, or demonstrating Medium High/High delay as red text to emphasize potential priorities.
- Noted with a green 4 and gray 5, the next portions describe crashes and high Critical Crash Rate Factor (CCRF) spots/segments, highlighting locations with more than one high CCRF spot/segment or high crash areas exceeding expected crashes (EEC) based on roadway type as red text.
- The results of the geometric data review are included in the next column, noted with a yellow 6.
- The final section, noted with an orange 7, describes the year 2040 Build condition traffic.

### **How SHIFT Works**



**The List**: KYTC starts with a list of projects previously identified by state and local transportation leaders (Area Development Districts, Metropolitan Planning Organizations and KYTC Districts). These leaders may add or subtract projects at this stage.



**Sponsorship:** To move forward, projects must either be sponsored by local transportation leaders or be committed projects—those listed in the previous State Highway Plan with funding beyond the design phase. Each ADD, MPO and District are allocated a number of sponsorships based on population, lane miles and number of counties served. After consulting with local elected officials, transportation leaders choose which projects to sponsor.



**Review and Scoring:** Each project is reviewed and scored on a scale of 0 to 100 with a formula that uses objective measures for five key attributes—safety, congestion, asset management, economic growth and benefit/cost. Projects of statewide significance—interstates, parkways and other major connecting routes—are scored first. The remaining projects, known as regional projects, are scored using a similar formula.



**Statewide Priorities:** KYTC identifies the top scoring statewide projects and about one-third are selected for priority funding. The remaining statewide projects are considered during the next phase.



**Local Boosting:** Local transportation leaders take the lead role in prioritizing regional priorities, which include highways and local roads as well as the remaining statewide projects. Using local insights, ADDs, MPOs and KYTC Districts may "boost" the scores for their top priority projects, adding 15 points to their base scores on the 0-to-100 point scale. Projects boosted by both the District and ADD/MPO receive an additional 30 points—a "turbo boost."



**Regional Priorities:** Kentucky is divided into four geographic regions—each containing three contiguous KYTC districts. Each region gets an equal allocation of funds. The top ranking projects in each region are the priorities considered in drafting the State Highway Plan.



**Recommended State Highway Plan:** KYTC combines the statewide and regional priorities to help develop the Governor's Recommended State Highway Plan, which is presented to the General Assembly.



**Enacted State Highway Plan:** During the legislative session, lawmakers fine-tune the plan based on additional information and funding availability. The result is the Enacted State Highway Plan, which includes two years of funded projects and spending priorities for the following four years.

Figure ES-1: Key Steps in the 2020 SHIFT Process

#### Guide to interpreting the Matrix:

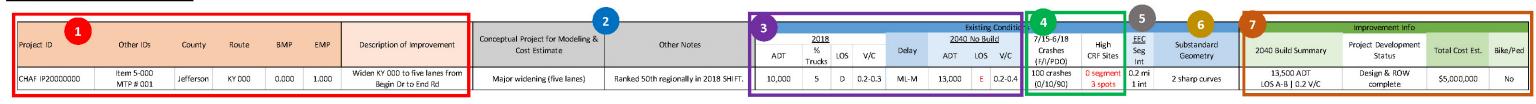


Figure ES-2: Guide to Data Headings in Stage 1 Matrix

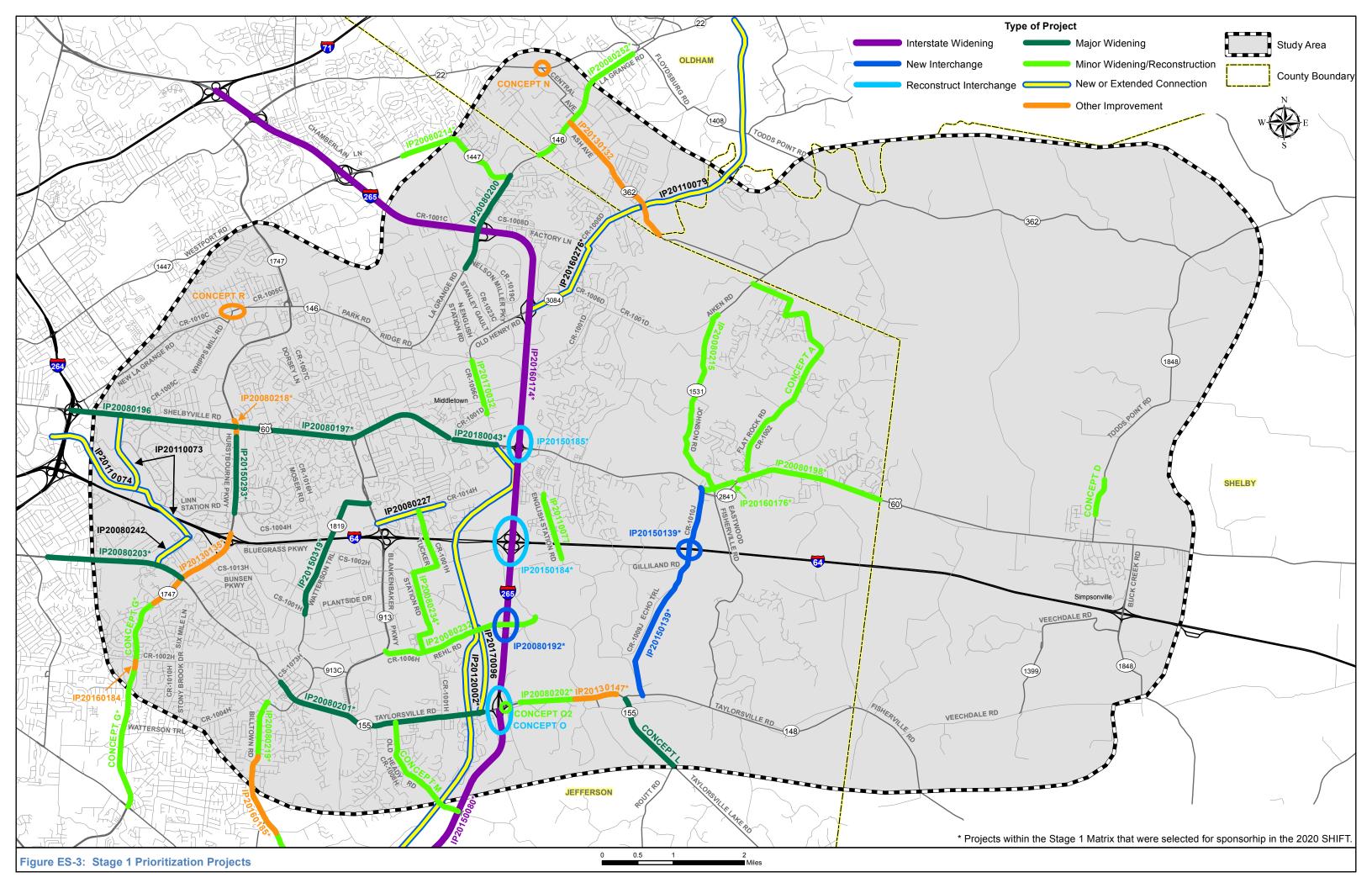
Table ES-1: Stag	e 1 Matrix											E	xisting Condition	one				Mic	Idletown to Simpson	ville Needs Anal	ysis Study	
Project ID	Other IDs	County	Route	BMP	EMP	Description of Improvement	Conceptual Project for	Other Notes		2018				No Build	7/15-6/18	High	<u>EEC</u>	Substandard			Total Remaining	
110ject ID	other 155	county	noute	Divii	21411	bescription of improvement	Modeling & Cost Estimate	other notes	ADT	% Trucks	LOS V/C	Delay	ADT	LOS V/C	Crashes (F/I/PDO)	CCRF Sites	Seg Int	Geometry	2040 Build Summary	Status	Cost Estimate	Bike/Ped
Statewide Signific	cance (Interstates &	k NHS Rou	tes)			SIX LANE PRIORITY SECTION OF I-265						L-H	T									
CHAF IP20160174	Item 5-537.00/01/02 MTP # 958	Jefferson	I-265	23.409	34.727	BETWEEN TAYLORSVILLE ROAD AND I-71.	Major Widening (six lanes)	Priority 1-2-4 in 2015 Programming Study. Ranked 1st statewide in 2018 SHIFT.	48,500- 86,500	10-11		MH 2.6 mi H 0.2 mi	56,000- 95,000				2.6 mi 0 int	N/A	64,000-115,000 ADT -7,027 VHT   +11,242 VMT	Design ongoing	\$147,310,000	N/A
CHAF IP20150080	Item 5-558.00 MTP # 959	Jefferson	I-265	17.300	23.100	IMPROVE SAFETY AND REDUCE CONGESTION ON I-265 FROM US- 31E (BARDSTOWN RD) TO KY-155 (TAYLORSVILLE RD).	Major Widening (six lanes)	Priority 5 of 5 in 2015 Programming Study.  Ranked 29th statewide in 2018 SHIFT.	66,000- 71,000	9-12		ML-M	77,000- 83,000				2.6 mi 0 int	N/A	87,000-93,000 ADT -2,716 VHT   +6,774 VMT	Pre-design	\$85,730,000	N/A
CHAF IP20150184	Item 5-549.00/.01 MTP # 179	Jefferson	I-265 I-64	24.600	26.400 19.200	RECONSTRUCTION OF THE I-265/I-64 INTERCHANGE. (2016BOP)	Reconstruct I-265/I-64 Interchange	Priority in 2015 Programming Study.  Ranked 33rd statewide (#5-549) and 22nd regionally (#5-21.2) in 2018 SHIFT.	48,500 60,000-	10.6 9.5		L-H MH 0.7 mi H 0.3 mi	56,000- 111,000				3.4 mi 0 int	N/A	57,000-111,000 -347 VHT   -3,001 VMT	Design ongoing	\$41,330,000	N/A
CHAF IP20080196	N/A	Jefferson	US 60	5.529		Improve safety and reduce congestion on US 60 from I-264 to KY 1747. Project design will evaluate one added travel lane in each drection and consider bicycle and pedestrian facilities.	Major Widening (six+ lanes)	CHAF notes dense development, regional attractions, growing UL Shelby campus. Not sponsored in 2018 SHIFT.	95,000 38,400- 56,590		C-E 0.6-0.8	ML-MH	43,000- 62,000	D-E 0.6-0.9	474 crashes (1/49/424)	2 segments 4 spots		10-foot lanes 1 fair condition bridge	52,000-68,000 ADT LOS D   0.6-0.8 V/C	Pre-design	\$26,890,000	Yes
Concept L	N/A	Jefferson	KY 155	3.000	4.200	Improve safety and congestion on KY 155 (Taylorsville Lake Road) from KY 148 (Taylorsville Road) to KY 1531 (Routt Road). Project will evaluate the addition of one travel lane in each direction and the addition of bicycle and pedestrian facilities.	Major Widening (four lanes)	Covington by the Park development (800+ homes, retail) to add turn lanes. New project.	17,460	7.5	E 0.6	L	28,000	F 1.0	25 crashes (0/3/22)	0 segments 0 spot	1.2 mi 2 int	1 fair condition bridge	29,000 ADT LOS B   0.4 V/C	Pre-design	\$16,926,000	Yes
CHAF IP20080202	Item 5-8908.00 MTP #956	Jefferson	KY 155	4.400	5.750	IMPROVE SAFETY AND REDUCE CONGESTION ON KY 155 (TAYLORSVILLE ROAD) FROM I-265 TO KY 148 (TAYLORSVILLE ROAD).	Minor Widening (add center turn lane)	\$19.8M in SPP funds in 2018-24 SYP.  Ranked 7th regionally in 2018 SHIFT  (MP 4.4-6.3).	20,310	7.5	A-E 0.2-0.5	L	25,000- 29,000	A-E 0.3-0.8	87 crashes (1/29/57)	0 segments 2 spots	0.7 mi 3 int	N/A	28,000-29,000 ADT LOS A-E   0.3-0.7 V/C	Pre-design	\$19,840,000	Yes
CHAF IP20080218	Item 5-8953 MTP # 2384	Jefferson	KY 1747	13.400	13.600	IMPROVE THE HURSTBOURNE PARKWAY (KY 1747) AT SHELBYVLLE ROAD (US 60) INTERSECTION TO INCREASE CAPACITY, REDUCE DELAYS, AND IMPROVE SAFETY. (SEE	Intersection Improvements	In 2016-22 SYP but not 2018-24. Ranked 126th regionally in 2018 SHIFT.	22,180- 33,930	2-10	0.3-0.4 E	М	26,000- 40,000	0.4-0.5 F	83 crashes (0/5/78)	2 segments 2 spots	0.4 mi 1 int	1 sharp curve	26,000-40,000 ADT LOS E-F for intersection	Design completed	\$4,390,000	No
			US 60	7.857	7.857	5-344.02)			38,400	8-10	0.5-0.6		43,000	0.5-0.7				N/A	43,000 ADT			
CHAF IP20080197	MTP #479	Jefferson	US 60	7.857	11.093	Improve safety and reduce congestion on US 60 from KY 1747 to Old Shelbyville Road (CS3596). Project will evaluate the addition of one travel lane in each direction and will consider accommodations for bicyclists, pedestrians, and transit users.	Major Widening (six lanes)	CHAF notes dense development, regional attractions, growing area. Ranked 184th regionally in 2018 SHIFT.	30,500- 45,600	2-10	C-D 0.4-0.7	МІ-МН	35,000- 60,000	C-E 0.5-1.0	753 crashes (1/97/655)	5 segments 14 spots		1 steep grade 1 sharp curve	38,000-56,000 ADT LOS B-D   0.4-0.6 V/C	Pre-design	\$54,883,000	Yes
CHAF IP20180043	Item 5-80001.00	Jefferson	US 60	11.093	11.684	WIDEN US-60 TO 6 LANES FROM OLD SHELBYVILLE RD. TO NORTH ENGLISH STATION RD. (18CCN)	Major Widening (six lanes)	\$4.0M in SPP funds in 2018-24 SYP. Not sponsored in 2018 SHIFT.	32,430- 35,620	9.6	C 0.6	МН	41,000- 45,000	D 0.7-0.8	208 crashes (0/20/188)	1 segment 3 spots	0.5 mi 3 int	N/A	42,000-46,000 ADT LOS C   0.5 V/C	Pre-design	\$4,025,000	Yes
CHAF IP20080201	MTP # 1372	Jefferson	KY 155	6.300	9.350	Improve safety and reduce congestion on KY 155 from Watterson Trail to I-265. Project design will evaluate 3-lane widening with two-way center turn lane and consider bicycle and pedestrian facilities.	Major Widening (five lanes)	CHAF notes developing area plus commuter link for Shelby & Spencer Co. Ranked 108th regionally in 2018 SHIFT.	11,620- 18,060	7-15	A-E 0.2-0.5	L-ML	17,000- 23,000	A-E 0.3-0.7	241 crashes (2/30/209)	2 segments 4 spots		N/A	24,000-32,000 ADT LOS A-B   0.3-0.4 V/C	Pre-design	\$24,300,000	Yes
CHAF IP20130147	Item 5-808.00 TIP #1507	Jefferson	KY 155	4.400	5.000	SAFETY PROJECT FOR RECONSTRUCTION OF TAYLORSVILLE ROAD AND SOUTH POPE LICK ROAD INTERSECTION AND BRIDGE OVER POPE LICK CREEK.(2016BOP)	Safety/Hazard Elimination (intersection/bridge)	\$2.1M in STP funds in 2018-24 SYP. Ranked 79th regionally in 2018 SHIFT.	20,310	7.5	<b>E</b> 0.5	ML	29,000	E 0.7	47 crashes (1/18/28)	0 segments 1 spot	0.3 mi 3 int	1 poor condition bridge	Minimal operational changes	Design ongoing	\$2,125,000	Yes
CHAF IP20080203	MTP # 469	Jefferson	KY 155	11.395	13.314	Improve safety and reduce congestion on KY 155 from Hikes Lane/Browns Lane to KY 1747 (Hursbourne Parkway). To include bicycle and pedestrian facilities.	Major Widening (six lanes)	CHAF notes developing area. Ranked 254th regionally in 2018 SHIFT.	30,850- 42,020	7-8	B-D 0.307	L-M	36,000- 46,000	C-D 0.4-0.8	202 crashes (0/41/161)	0 segments 4 spots	0.9 mi 8 int	N/A	38,000-58,000 ADT LOS C-D   0.4-0.7 V/C	Pre-design	\$15,450,000	Yes

													Existi	ng Conditio	ons				Improvement Info		
Project ID	Other IDs	County	Route	ВМР	EMP	Description of Improvement	Conceptual Project for Modeling & Cost Estimate	Other Notes		<u>2018</u>	1	Delevi	2040 No I	<u>Build</u>	7/15-6/18	High EEC	Substandard	2040 Puild Common and	Project Development	Total Remaining	Bike/Ped
							Modeling & Cost Estimate		ADT	7 LOS	V/C	Delay	ADT LO	s v/c	Crashes (F/I/PDO)	CCRF Sites Seg	Geometry	2040 Build Summary	Status	Cost Estimate	ыке/Рец
CHAF IP20130135	Item 5-555.00	Jefferson	KY 1747	10.500	11.995	REDUCE CONGESTION AND IMPROVE SAFETY ALONG KY-1747 (HURSTBOURNE PARKWAY) FROM STONY BROOK DRIVE TO I-64.	Congestion Management	\$250K NH planning funds in 2018-24 SYP. Ranked 11th regionally in 2018 SHIFT.	32,680- 56,410	3-4 B-C	0.3-0.5	ML-MH	34,000- 62,000 B-	C 0.4-0.5	709 crashes (0/75/634)	5 segments 0.9 m 9 spots 10 int	N/A	38,000-66,000 ADT LOS B-C   0.4-0.6	Pre-design	\$3,436,279	Yes
Concept G CHAF IP20080217	N/A	Jefferson	KY 1747	7.489	11.033	Improve safety and mobility on KY 1747 (South Hurstbourne Parkway) from US 31E (Bardstown Road) to KY 155 (Taylorsville Road). Project will evaluate operational improvements and signal optimization.	Safety Improvements	MTP #386 (1999) showed 6 lane widening with improved access to Christian Academy. New project.	24,300- 32,680	4.3 B-C	0.3-0.5	L-M	34,000 B-	C 0.4-0.5	304 crashes (0/36/268)	_	1 sharp curve	Minimal operational changes	Pre-design	\$2,106,000	Yes
CHAF IP20150185	Item 5-41.10	Jefferson	I-265	26.500	27.100	SNYDER FREEWAY; RECONSTRUCT I- 265/US-60 INTERCHANGE AS A SINGLE POINT URBAN INTERCHANGE AND CONSTRUCT NEEDED	Reconstruct I-265/US 60 Interchange as SPUI with	Ranked 185th regionally in 2018 SHIFT.	86,500	10.0		L-MH	83,000- 95,000			0.3 m	N/A	83,000-95,000	Pre-design	\$64,410,000	N/A
			US 60	11.800	12.300	IMPROVEMENTS TO CONNECT WITH THE I-265/I-64 INTERCHANGE (2006BOPC)	C/D to I-64 Interchange	,	34,500	2.0		MH 1.0 MI				8 int	N/A	-180 VHT   -1,289 VMT	Ü	, , ,	ŕ
CHAF IP20150293	Item 5-344.01 MTP # 359	Jefferson	KY 1747	12.289	13.362	WIDEN SOUTHBOUND HURSTBOURNE LANE TO 3 LANES FROM LINN STATION RD (CS-1004H) TO EDEN AVE (CS-1660H). (06CCR)(03KYD)(2006B0PP)(SEE 5- 344.02 FOR KYD C PHASE)(14CCR)	Reconstruction (add 3rd SB thru lane)	In 2016-22 SYP but not 2018-24. Ranked 36th statewide and 32nd regionally in 2018 SHIFT.	33,930	2 B-C	0.3-0.4	ML-M	26,000- 40,000	0.4	205 crashes (0/33/172)		N/A	39,000-43,000 ADT LOS C   0.4-0.7 V/C	Utilities cleared	\$5,810,000	No
Concept O	N/A	Jefferson	I-265	22.700		Improve safety and reduce congestion on the I-265/KY 155 (Taylorsville Road) interchange. Project will evaluate reconstruction	Reconstruct I-265/KY 155 Interchange	Identified in 2015 Programming Study (moderate/low priority). New project.	71,000	12.4		L-M	56,000- 83,000			0.5 m 3 int	N/A	56,000-83,000 -75 VHT   +160 VMT	Pre-design	\$32,366,000	N/A
			KY 155	6.058	6.058	of the interchange.			20,000	6.7							N/A				
Concept O2	N/A	Jefferson	KY 155	6.058	6.058	Improve safety and mobility at the I- 265/KY 155 (Taylorsville Road) interchange. Project will evaluate the addition of a second eastbound left turn lane on KY 155 to northbound I-265 with consideration of bicycle and pedestrian facilities.		Short term option versus Concept 0. Also identified in 2015 Programming Study.	20,000	6.7		L			12 crashes (0/2/10)	1 segment 0 mi 1 spot 1 int	N/A	Minimal operational changes	Pre-design	\$4,790,000	Yes
CHAF IP20080192	MTP #1514	Jefferson	I-265	24.000	24.600	Provide connectivity and improved mobility on I-265 at Rehl Road. The Rehl Road portion would include enhanced safety for bicyclists and pedestrians.	New Interchange at I- 265/Rehl Road	Identified in 2015 Programming Study (moderate/low priority).	48,500	10.6		М	56,000			0.6 m 0 int	N/A	57,000 ADT +508 VHT   -6,500 VMT	Pre-design	\$36,580,000	N/A
CHAF IP20150139	Item 5-80002.00 Item 5-80000.00 Item 5-8200.1 MTP # 390	Jefferson	I-64	21.000	22.000	NEW INTERCHANGE ON I-64E EAST OF THE GENE SNYDER FREEWAY. EASTWOOD FISHERVILLE CONNECTOR TO I-64. (18CCN)	New Eastwood/Fisherville Interchange with connection between US 60 and KY 148	Ranked 186th regionally in 2018 SHIFT.	60,000	9.5		L-ML	75,000			0 mi 0 int	N/A	78,000 ADT +59 VHT   -1,970 VMT	Pre-design	\$74,240,000	N/A
CHAF IP20160184	Item 5-8905.00 MTP # 2383	Jefferson	KY 1747	9.483	9.583	EXTEND THE LEFT TURN LANE ON HURSTBOURNE LANE AT	Safety/Hazard Elimination (extend left turn lane)	In 2016-22 SYP but not 2018-24. Ranked 156th regionally in 2018 SHIFT.	24,300	4.3 B	0.3	ML	34,000 B	0.4	29 crashes (0/3/26)	0 segment 1 spot 0.1 m 0 int	N/A	Minimal operational changes. Queue storage	Pre-design	\$200,000	No
Other Berlins La			Six Mile Ln	2.868	2.868	INTERSECTION WITH SIX MILE LANE.	(exterio iert turn iarie)	130th regionally III 2010 3FIFT.	7,130				10,160				1 sharp curve	ratio improves (<1).			
Other Regional &  CHAF IP20080200	MTP # 443	Jefferson	KY 146	6.964	8.251	Improve safety and reduce congestion on KY 146 from Nelson Miller Parkway (CR1019C) to Reamers Road (CR1004D). To include consideration for bicycle and pedestrian facilities. Project will consider improvements to the I-265/KY 146 Interchange and the addition of one travel lane in each direction.	Major Widening (five lanes)	CHAF notes regional attractions, anticipated growth, adjacent rail line. Ranked 118th regionally in 2018 SHIFT (MP 7.5-8.3).	11,070- 18,680	3-6 A-E	0.2-0.6	L-ML	14,000- 23,000 A-	E 0.2-0.8	224 crashes (0/23/201)	_	N/A	15,000-33,000 ADT LOS B-C   0.3-0.5 V/C	Pre-design	\$14,500,000	Yes
CHAF IP20150319	Item 5-373 MTP # 233	Jefferson	KY 1819	10.795	12.811	RECONSTRUCT AND WIDEN WATTERSON TRAIL FROM PLANTSIDE DRIVE TO BLANKENBAKER ROAD. (98CCR)	Major Widening	Ranked 100th regionally in 2018 SHIFT.	5,840- 10,880	8-9 <b>E</b>	0.2-0.3	L-ML	8,00- 13,000	0.2-0.4	79 crashes (0/11/68)	0 segment 0.9 m 3 spots 2 int	6 sharp curves	9,300-13,000 ADT LOS A-B   0.2 V/C	ROW complete	\$15,280,000	No
CHAF IP20170032	Item 5-353.00 MTP # 188	Jefferson	N English Str CR-1006C	0.457	1.232	WIDEN ENGLISH STATION ROAD FROM 2 TO 3 LANES (3RD LANE WILL BE A CENTER LANE) FROM AIKEN ROAD TO AVOCA ROAD. (FUNDING SUBJECT TO FISCAL CONSTRAINT PENDING MPO TIP).	Minor Widening (add center turn lane)	\$6.5M SLO const funds in 2018-24 SYP. Ranked 32nd regionally in 2018 SHIFT.	17,400	8.6 E	0.6	ML-M	16,000- 22,000	0.6-0.8	0 crashes	- 0.5 m 0 int	10-foot lanes	18,000-23,000 ADT LOS D-E   0.4-0.5 V/C	Design & ROW ongoin	\$ \$6,410,000	Yes

													E:	xisting Conditi	ons					Improvement Info		
Project ID	Other IDs	County	Route	ВМР	EMP	Description of Improvement	Conceptual Project for	Other Notes		2018				No Build	7/15-6/18	High	EEC	Substandard		Project Development	Total Remaining	
1 Toject ID	Other ibs	County	Noute	DIVII	LIVII	Description of improvement	Modeling & Cost Estimate	other Notes	ADT	_ %	LOS V/C	Delay	ADT	LOS V/C	Crashes	CCRF Sites	Seg	Geometry	2040 Build Summary	Status	Cost Estimate	Bike/Ped
CHAF IP20080214	Overlaps MTP # 484	Jefferson	KY 1447	7.500	9.240	widening with two-way center turn lane and consider bicycle and	Minor Widening (add center turn lane)	CHAF notes ongoing growth, Ford plant freight and employee flows. Not sponsored in 2018 SHIFT.	7,540	Trucks	E 0.2	L	11,000	E 0.4	(F/I/PDO)  54 crashes (0/8/46)	0 segment 1 spot	0.6 mi 5 int	5 sharp curves 10-foot lanes	11,000 ADT LOS E   0.4 V/C	Pre-design	\$5,470,000	Yes
Concept R	N/A	Jefferson	KY 146 Whipps Mill	2.740	2.740	pedestrian facilities.  Improve safety at the KY 146 (LaGrange Road)/Whipps Mill (CR- 1005C) intersection. Project will evaluate adding a two-way center turn lane and other capacity improvements including consideration of bicycle and	Intersection Improvements	New project	9,710	5.5	0.3 D-E	L-ML	13,000	D-F	2 crashes (0/0/2)	0 segment 1 spot	0 mi 1 int	sharp curve	13,000 ADT LOS D-E for intersection	Pre-design	\$2,880,000	Yes
CHAF IP20160185	Item 5-8203.00 MTP # 1819	Jefferson	KY 1819	6.900	8.100	pedestrian facilities.  RECONSTRUCT BILLTOWN ROAD FROM NORTH OF COLONNADES PLACE TO SOUTH OF EASUM	Reconstruction of three intersections	\$2.7M SPP const funds in 2018-24 STP. Ranked 17th regionally in 2018 SHIFT.	13,770- 13,900	4-7	E 0.5	L	18,000	E 0.6-0.7	39 crashes (0/4/35)	0 segment 0 spot	0.3 mi 7 int	3 sharp curves 10-foot lanes	18,000 ADT LOS E   0.6-0.7 V/C	ROW complete	\$2,700,000	No
CHAF IP20080219	MTP # 257	Jefferson	KY 1819	5.300	8.900	ROAD.(04CCN)(06CCN)(08CCR)(10CC R)(12CCR)  Improve safety, mobility for all modes, and address geometric deficiencies along KY 1819 (Billtown Road) from I-265 (Gene Snyder Freeway) to Ruckriegel Parkway/Billtown Road (in and near Jeffersontown). Project will evaluate 3-lane widening and consider accommodations for bicyclists and pedestrians	Minor Widening	Ultimate solution beyond IP20160185. CHAF notes ongoing growth. Not sponsored in 2018 SHIFT.	13,770- 13,900	4-7	E 0.5	L	18,000	E 0.5-0.7	94 crashes (0/12/82)	0 segment 0 spot	1.3 mi 12 int	3 sharp curves 10-foot lanes	16,000-18,000 ADT LOS E   0.5-0.7 V/C	Pre-design	\$27,120,000	Yes
Concept C CHAF IP20080198	Overlaps MTP # 953	Jefferson	US 60	15.114	17.375	Improve safety and reduce congestion on US 60 from Rockcrest Way (CS-3157) to Notting Hill Blvd (CS-1224J) at the Jefferson/Shelby County line. Project design will evaluate 3-lane widening with a continuous two-way center turn lane and other low impact alternatives.  Design will also consider accommodations for bicyclists, pedestrians, and future transit users.	Minor Widening (add center turn lane)	New project.	13,570- 19,330	6.6	B-E 0.3-0.5	L	19,000- 26,000	B-E 0.4-0.7	33 crashes (0/5/28)	0 segment 0 spot	0 mi 3 int	1 poor condition bridge	20,000-26,000 ADT LOS B-E   0.4-0.7 V/C	Pre-design	\$9,953,750	Yes
CHAF IP20080252	MTP # 412	Oldham	KY 146	0.000	2.021	Reduce congestion, improve access, and provide better mobility for all modes along KY 146 from the Oldham/Jefferson County line to Pryor Avenue in Crestwood. Project design will consider reconstructing KY 146 as a 2 lane road (no additional lanes) from Jefferson/Oldham County line to Pryor Avenue in Oldham County with consideration for turn lanes at Ash Avenue, Houston Avenue, Maple Avenue, and Central Avenue.	Reconstruction	CHAF notes regional attractions, anticipated growth, adjacent rail line. Not sponsored in 2018 SHIFT.	9,920- 19,130	5.8	A-E 0.2-0.4	L	12,000- 24,000	E 0.5	59 crashes (1/10/48)	0 segment 1 spot	0.7 mi 5 int	10-foot lanes	16,000 ADT LOS E   0.5-0.6 V/C	Pre-design	\$14,750,000	Yes
CHAF IP20080234	MTP # 472	Jefferson	Tucker Stn CR-1001H	1.079	3.538	Reconstruct Tucker Station Road from Rehl Road to Ellingsworth Lane. Project design will evaluate 2 lane road (no added lanes) and consider intersection improvements (S. Pope Lick, Rehl Road, & Ellingsworth Lane) and bicycle and pedestrian facilities.	Reconstruction (no additional lanes)	CHAF notes ongoing growth, few I-64 crossings. Not sponsored in 2018 SHIFT.	4,220	6.9	C-D 0.3	L	6,300- 7,800	D-E 0.4-0.5			0.2 mi 0 int	5 sharp curves 10-foot lanes	6,300-7,800 ADT LOS D-E   0.4-0.5 V/C	Pre-design	\$11,880,000	Yes
CHAF IP20160176	Item 5-8952.00 Overlaps MTP # 953	Jefferson	US 60	14.718	15.114	WIDEN US-60 TO THREE LANES FROM EASTWOOD CUTOFF (MP 14.7) TO ROCKCREST WAY (MP 15.1). (16CCN)	Minor Widening and Intersection Improvements	\$1.9M in SPP funds in 2018-24 SYP. Ranked 80th regionally in 2018 SHIFT.	19,330	6.6	В 0.3	L	26,000	B 0.4	32 crashes (1/3/28)	0 segment 1 spot	0.1 mi 2 int	4 sharp curves	25,000 ADT LOS B   0.4 V/C	Pre-design	\$2,075,000	No

														sting Cond						Improvement Info		
Project ID	Other IDs	County	Route	ВМР	EMP	Description of Improvement	Conceptual Project for Modeling & Cost Estimate	Other Notes		<u>2018</u>		Delay		o Build	7/15-6/18 Crashes	High	EEC Seg	Substandard	2040 Build Summary	Project Development	_	Bike/Ped
							modeling a cost Estimate		ADT	Trucks LC	s v/c	Delay	ADT	LOS V/C	(F/I/PDO)	CCRF Sites	Int	Geometry	2010 24114 541111141	Status	Cost Estimate	Jiney: eu
CHAF IP20130132	N/A	Oldham	KY 362	0.975	3.039	Improve safety, access, and address geometric deficiencies along KY 362 from the Oldham/Shelby County Line to KY 146 (in and south of Pewee Valley). Includes consideration of a 3 lane widening with a two-way left turn lane and bike/ped accommodations.		CHAF notes future connection to Old Henry Rd (IP20110079). Not sponsored in 2018 SHIFT.	1,590-4,290	5 B-	D 0.1-0.2	L	3,100- 6,900	C-D 0.1-0	.3 16 crashe. (0/2/14)		s 0 mi 4 int	2 sharp curves 1 poor condition bridge 1 fair condition bridge 9-foot lanes	2,200-7,700 ADT LOS C-D   0.1-0.3 V/C	Pre-design	\$10,385,000	Yes
Concept N	N/A	Oldham	KY 362	0.000	0.000	Improve safety at the KY 22/KY 362 intersection. Project will evaluate adding a northbound right turn lane on KY 362 (Central Avenue) to KY 22 (Ballardsville Road) and add a westbound left turn lane and an		Moderate short-term in KY 22 Scoping study (2005). New project.	1,940	5 A	0.1	- L	4,400	B 0.1	2 crashes (0/0/2)	0 segment 0 spot	0.1 mi 0 int	skewed intersection 9-foot lanes on KY 362	Minimal operational changes	Pre-design	\$3,780,000	No
			KY 22	1.825	1.825	eastbound right turn lane on KY 22 at KY 362.			9,100													
CHAF IP20080215	MTP # 411	Jefferson	KY 1531	9.100	11.900	Relocate & reconstruct KY 1531 (Johnson Road) as a 2 lane road (no additional lanes) with improved geometry from US 60 (Shelbyville Road) to Aiken Road. Project will consider bicycle and pedestrian facilities.	Reconstruction (no additional lanes)	CHAF notes ongoing growth, outlet for US 60 congestion. Not sponsored in 2018 SHIFT.	940-2,420	7-11 B	0.1	L	2,600- 4,300	C 0.1-0	9 crashes (0/1/8)	0 segment 0 spot	0 mi 2 int	16 sharp curves 1 fair condition bridge 9-foot lanes	3,500-4,300 ADT LOS C   0.1-0.2 V/C	Pre-design	\$11,830,000	Yes
Concept D	Comp Plan #29	Shelby	KY 1848	6.418	7.005	Improve connectivity to KY 1848 (Todds Point Road) from Grand Central Drive to approximately 3,100 feet north of Grand Central Drive. Project will consider roadway widening with no additional thru lanes and bicycle and pedestrian facilities.	Minor Widening	New project.	2,690	8.2	0.1	L	5,200	C 0.2	3 crashes (0/0/3)	0 segment 0 spot	0.1 mi 0 int	2 sharp curves 9-foot lanes	5,200 ADT LOS C   0.2 V/C	Pre-design	\$3,340,750	Yes
Concept A	MTP #1323	Jefferson	Flat Rock CR-1002D	0.000	3.848	Improve safety on Flat Rock Road (CR-1002D) from Shelbyville Road (US 60) to Aiken Road (KY 1531).  Project will evaluate widening with no additional thru lanes and conside bicycle and pedestrian facilities.  Bicycle and pedestrian facilities would be proposed due to parks etc in area.		KIPDA MTP project. US 60 intersection already improved. New project.	4,800			L						sharp curves 10-foot lanes	6,700 ADT LOS D   0.3 V/C	Pre-design	\$75,237,000	No
CHAF IP20110077	MTP # 277	Jefferson	S English St CR-1002J	n 2.950	3.900	Reconstruct South English Station Road (CR1002J) from Poplar Lane to Christian Academy. Project design will evaluate 2 lane road (no added lanes) and consider bicycle and pedestrian facilities.	Reconstruction (no additional lanes)	Not sponsored in 2018 SHIFT.	1,700			L					0.4 mi 0 int	N/A	1,700 ADT LOS C   0.2 V/C	Pre-design	\$2,060,000	Yes
CHAF IP20080232	MTP # 462	Jefferson	Rehl CR-1006H	0.000	2.255	Reconstruct Rehl Road from KY 913 (Blankenbaker Parkway) to S. Pope Lick Road. Project design will evaluate 2 lane road (no added lanes) and consider bicycle and pedestrian facilities.		CHAF notes proposed growth from new interchange (IP20080192). Not sponsored in 2018 SHIFT.		2 E	0.1	L	3,000	C 0.3	±7 crashe	5	0.1 mi 1 int	3 sharp curves 9- to 10-foot lanes	3,000 ADT LOS C   0.3 V/C	Pre-design	\$12,060,000	Yes
Concept M	MTP #1325	Jefferson	Old Heady CR-1008H	0.000	1.376	Improve safety and mobility on Old Heady Road (CR-1008H) from KY 155 (Taylorsville Road) to Chenoweth Run Road (CR-1003H). Project will evaluate adding a two-way center turn lane and bicycle and pedestrian facilities.	Widening with Center Turn Lane	MTP (2004) shows adding TWLTL. New project.	4,350			L					0 mi 1 int	10-foot lanes sharp curves	5,400 ADT LOS C   0.2 V/C	Pre-design	\$52,087,000	Yes
CHAF IP20080227	MTP#277	Jefferson	Ellingswort CS-1030H		0.607	Extend & widen Ellingsworth Lane from KY 913 (Blankenbaker Parkway to Urton Lane. Project design will evaluate 3 lane road with two-way center turn lane and consider bicycle and pedestrian facilities.	Ellingsworth Lane (add	CHAF notes dense development, proposed link to Urton (IP20120002). Not sponsored in 2018 SHIFT.	7,000			N/A	3,700				0.1 mi 0 int	N/A	-18 VHT   +105 VMT	Pre-design	\$4,420,000	Yes

												E:	cisting Condition	ons					Improvement Info		
Project ID	Other IDs	County	Route	BMF	P EMP	Description of Improvement	Conceptual Project for Other Notes  Modeling & Cost Estimate		)18		Delay	2040	No Build	7/15-6/18 Crashes	High	EEC Soc	Substandard	2040 Build Summary	Project Development	Total Remaining	Bike/Ped
							Modeling & Cost Estimate	ADT 7	cks LOS	V/C	Delay	ADT	LOS V/C	(F/I/PDO)	CCRF Sites	Seg Int	Geometry	2040 Build Suffiffiary	Status	Cost Estimate	віке/Рец
CHAF IP20080242	MTP # 258	Jefferson	Blowing Tree CS-1163H	0.000	0 0.459	Extend & reconstruct Blowing Tree Boulevard from KY 155 (Taylorsville Road) to Bunsen Parkway. Project design will evaluate 3 lane road with two-way center turn lane and consider bicycle and pedestrian facilities.	Extend/widen Blowing Tree Blvd (three lanes)  CHAF notes dense development, outlet for KY 155 and KY 1747 congestion. Ranked 329th regionally in 2018 SHIFT.	1,900			N/A						Narrow lanes	-435 VHT   -4,971 VMT*	Pre-design	\$4,530,000	Yes
CHAF IP20110073	MTP # 265	Jefferson	New		N/A	Improve Safety & Connectivity and Reduce Congeston along Shelbyville Road (US60), Hurstbourne Lane (KY 1747), Interstate I-64 and Taylorsville Road (KY 155) in the vicinity of Oxmoor Farms. Project will consider a Bunsen Boulevard/Christian Way connector as a 5 lane (5th lane will be a center turn lane) divided highway with consideration of bicycle and pedestrian facilities.					N/A						N/A	-623 VHT   -8,965 VMT*	Pre-design	\$23,440,000	Yes
CHAF IP20110074	MTP#260	Jefferson	New		N/A	Improve Safety and Connectivity and Reduce Congestion along Shelbyville Road (US60), Hurstbourne Lane (KY 1747), Interstate I 64 and Taylorsville Road (KY 155) in the vicinity of Oxmoor Farms. Project will consider a Bowling Boulevard/Chrisitian Way connector as a 5 lane (5th lane will be a center turn lane) divided highway with consideration of bicycle and pedestrian facilities.	Bowling Blvd/Christian Way Connector (five  CHAF notes proposed growth (Bullitt Farm), poor connectivity, US 60 & KY 1747 Congestion, Ranked 157th regionally in				N/A				-		N/A	-1,173 VHT   -367 VMT*	Pre-design	\$23,750,000	Yes
CHAF IP20110079	Item 5-376.00 MTP # 198	Oldham	New		N/A	New Route Between KY 362 (Ash Avenue) in Pewee Valley and KY 22 (Ballardsville Road)/KY 329B (KY 329 Bypass) In Crestwood. Project is Section 2 of the 5-367.00 Crestwood Bypass Parent Project. Section 1, KY 3084 (Old Henry Road) From I-265 (Gene Snyder Freeway) To KY 362 (Ash Avenue), being constructed under 5-367.20. Project design will evaluate 3-lane roadway section with Two-Way Center Turn Lane and will consider accommodations for bicyclists and pedestrians.	Connector (four lanes), Old Henry Rd Interchange to KY 22  CHAF notes proposed connection replacing KY 146. Not sponsored in 2018 SHIFT.		_		N/A	-					N/A	-4,482 VHT   -6,321 VMT	Pre-design	\$47,330,000	Yes
CHAF IP20120002	MTP # 474	Jefferson	New		N/A	Extend Urton Lane from north of I- 64 to Seatonville Road. Includes consideration of facilities for all modes (pedestrian, bicycle, SOV, and transit).	Extend Urton Lane (three lanes), north of I-64 to Seatonville Rd CHAF notes planned growth, development potential, outlet for I-265. Not sponsored in 2018 SHIFT.	2,400-6,500			N/A						N/A	-1,594 VHT   -2,721 VMT	Pre-design	\$61,500,000	Yes
CHAF IP20160276	Item 5-367.20/.21	Oldham	New		N/A	EXTENSION OF OLD HENRY ROAD EAST TO ASH AVENUE (KY362). (12CCR)(18CCN)	Extend Old Henry Rd to KY 362 Ash Ave CHAF notes traffic uses residential Village Green Blvd to access Old Henry Rd today. Ranked 129th regionally in 2018 SHIFT.				N/A						N/A	-1,393 VHT   -1,364 VMT	Utilities ongoing	\$18,180,000	Yes
CHAF IP20170096	Item 5-80003.00 MTP # 458	Jefferson	New		N/A	EXTEND PLANTSIDE DRIVE FROM REHL ROAD TO TAYLORSVILLE ROAD (18CCN)	Extend Plantside Drive \$750k SPP design funds in 2018-24 SVP				N/A						N/A	-495 VHT   -1621 VMT	Pre-design	\$23,663,000	No



KYTC's bridge data shows 42 bridges along study routes, with conditions rated as Good, Fair, or Poor. There are four Poor condition bridges on study routes: KY 155 at Pope Lick Creek, US 60 at Long Run Creek, KY 362 at Floyds Fork, and KY 1408 at Floyds Fork.

As a second stage of the study, existing traffic information at four select interchanges were assembled to highlight existing congestion and safety needs (**Chapter 6**), enabling District 5 to prioritize improvements at specific locations.

- I-64 at KY 913 (Blankenbaker Parkway) is the highest priority of the four interchanges; widening the westbound off-ramp to two lanes with dual lefts would provide relatively low-cost benefits.
- I-265 at KY 146 (LaGrange Road) is next; the District receives regular complaints about the interchange. Operations are likely to worsen as the Ford plant expands, increasing traffic volumes in the area.
- I-265 at US 60 (Shelbyville Road) is third: the primary capacity issue is the southbound on-ramp. Heavy movements to the south are an issue as motorists are trying to reach I-64.
- I-265 at KY 155 (Taylorsville Road) is the lowest priority as delay/safety trends at the interchange are controlled by the capacity limitations along the two-lane portion of the corridor to the east. Improving the interchange will have minimal effect until KY 155 is widened.



Representative project area views

#### 1.0 INTRODUCTION

The Kentucky Transportation Cabinet (KYTC) initiated a Needs Analysis Study that included portions of Jefferson, Oldham, and Shelby counties in Kentucky (Figure 1-2). The study examined transportation needs related to safety and congestion on a selection of routes in the study area, focusing on evaluating potential highway projects for future programming. Study analyses were intended to assist KYTC District 5 personnel and other elected public officials in the decision making process as the 2020 Strategic Highway Investment Formula for Tomorrow (SHIFT) cycle approached its sponsorship phase. SHIFT is the mechanism used to prioritize projects for Kentucky's biennial highway plan; key steps in the process are illustrated in Figure 1-1.

Due to the rapidly developing study area, KYTC District 5 personnel recognized the need for a comprehensive planning overview for projects located in the area. Potential transportation projects are listed in several routinely updated statewide and regional planning/programming documents. Searching myriad corridor-specific studies for pertinent projects can be cumbersome, especially given the scale, rich planning history, and multiple jurisdictions overseeing the study area. Study activities included compiling an inventory of existing and future conditions, reviewing existing documents and studies, identifying and analyzing improvement options, developing cost estimates, and tabulating key metrics at proposed improvement locations to assist in prioritization. The study began in October 2018, with the goal of producing information to feed into the 2020 SHIFT sponsorship phase, scheduled to occur January 2 through March 15, 2019.

The project team—consisting of KYTC Central Office and District 5 staff, the Kentuckiana Regional Planning & Development Agency (KIPDA) Metropolitan Planning Organization (MPO) representatives, and the consultant team—held three meetings over the course of the study to produce a comprehensive project matrix containing up-to-date project descriptions, cost estimates, safety statistics, and congestion information. A standalone inventory of four interchanges was also prepared to assist in prioritization efforts.

#### 1.1 Study Area

The Middletown to Simpsonville Needs Analysis Study Area encompasses an approximate area (west to east) from near I-264 in Jefferson County to Simpsonville in Shelby County, and (south to north) from Jeffersontown in Jefferson County to Pewee Valley in Oldham County (Figure 1-2). The 128-square mile study area represents approximately 6.5% of the total land area in KYTC District 5 jurisdiction. Land uses vary from dense urban residential and industrial zones in the west to open parklands and agricultural fields heading east.

Listed in **Table 1-1**, study area roadways include state-maintained routes and a selection of city- and county-owned local roadways (**Figure 1-3**, **p. 3**). Interstate facilities are excluded from the existing conditions analysis as KYTC considers interstate needs through separate mechanisms. Combined between from city, county, and state maintenance, study routes represent nearly 140 centerline miles of highway.



Congested urban (US 60) and low-volume rural highways (KY 1848) in study area

## **How SHIFT Works**



**The List**: KYTC starts with a list of projects previously identified by state and local transportation leaders (Area Development Districts, Metropolitan Planning Organizations and KYTC Districts). These leaders may add or subtract projects at this stage.



**Sponsorship:** To move forward, projects must either be sponsored by local transportation leaders or be committed projects—those listed in the previous State Highway Plan with funding beyond the design phase. Each ADD, MPO and District are allocated a number of sponsorships based on population, lane miles and number of counties served. After consulting with local elected officials, transportation leaders choose which projects to sponsor.



**Review and Scoring:** Each project is reviewed and scored on a scale of 0 to 100 with a formula that uses objective measures for five key attributes—safety, congestion, asset management, economic growth and benefit/cost. Projects of statewide significance—interstates, parkways and other major connecting routes—are scored first. The remaining projects, known as regional projects, are scored using a similar formula.



**Statewide Priorities:** KYTC identifies the top scoring statewide projects and about one-third are selected for priority funding. The remaining statewide projects are considered during the next phase.



**Local Boosting:** Local transportation leaders take the lead role in prioritizing regional priorities, which include highways and local roads as well as the remaining statewide projects. Using local insights, ADDs, MPOs and KYTC Districts may "boost" the scores for their top priority projects, adding 15 points to their base scores on the 0-to-100 point scale. Projects boosted by both the District and ADD/MPO receive an additional 30 points—a "turbo boost."



**Regional Priorities:** Kentucky is divided into four geographic regions—each containing three contiguous KYTC districts. Each region gets an equal allocation of funds. The top ranking projects in each region are the priorities considered in drafting the State Highway Plan.

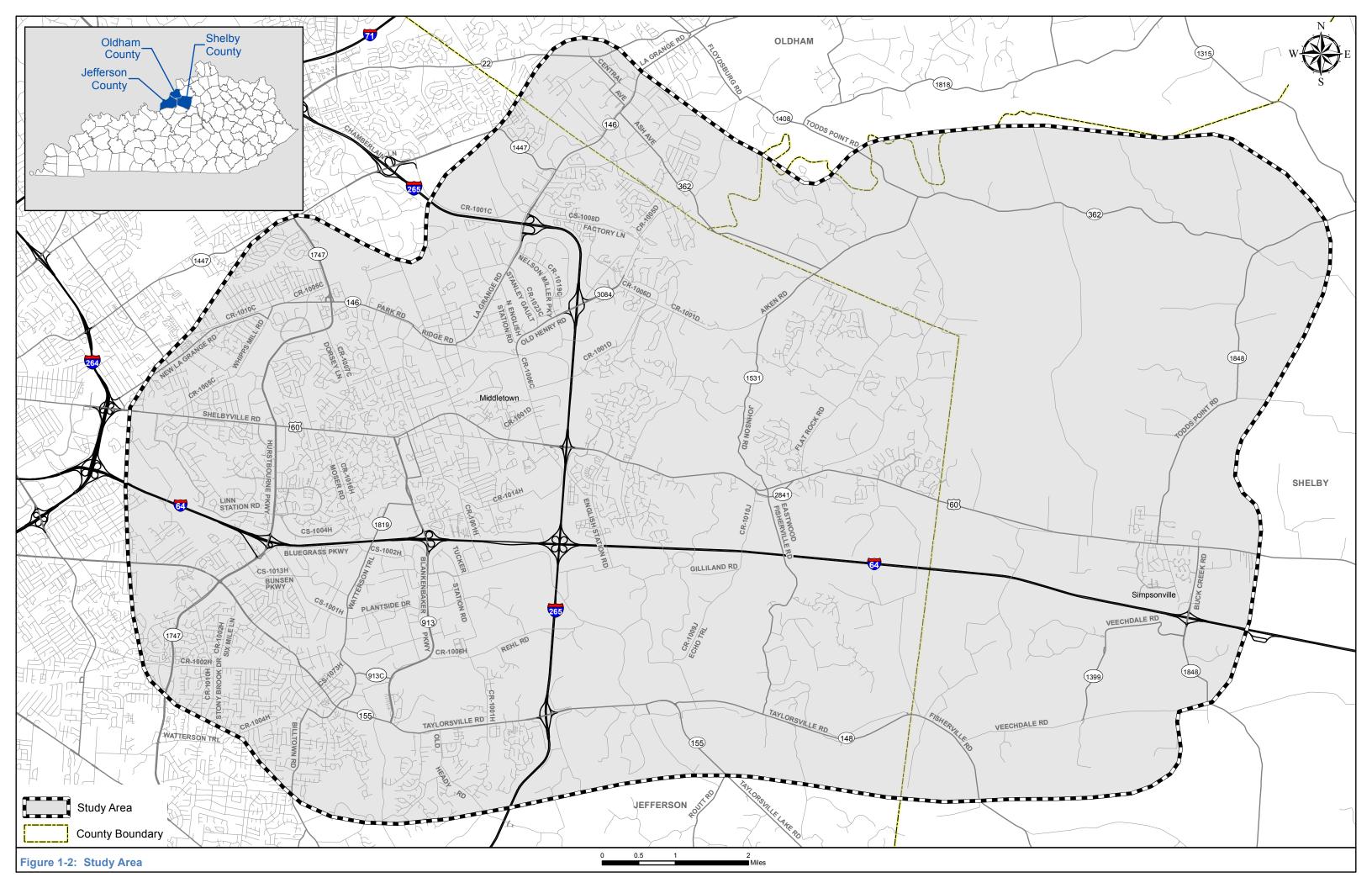


**Recommended State Highway Plan:** KYTC combines the statewide and regional priorities to help develop the Governor's Recommended State Highway Plan, which is presented to the General Assembly.



**Enacted State Highway Plan:** During the legislative session, lawmakers fine-tune the plan based on additional information and funding availability. The result is the Enacted State Highway Plan, which includes two years of funded projects and spending priorities for the following four years.

Figure 1-1: Key Steps in the 2020 SHIFT Process



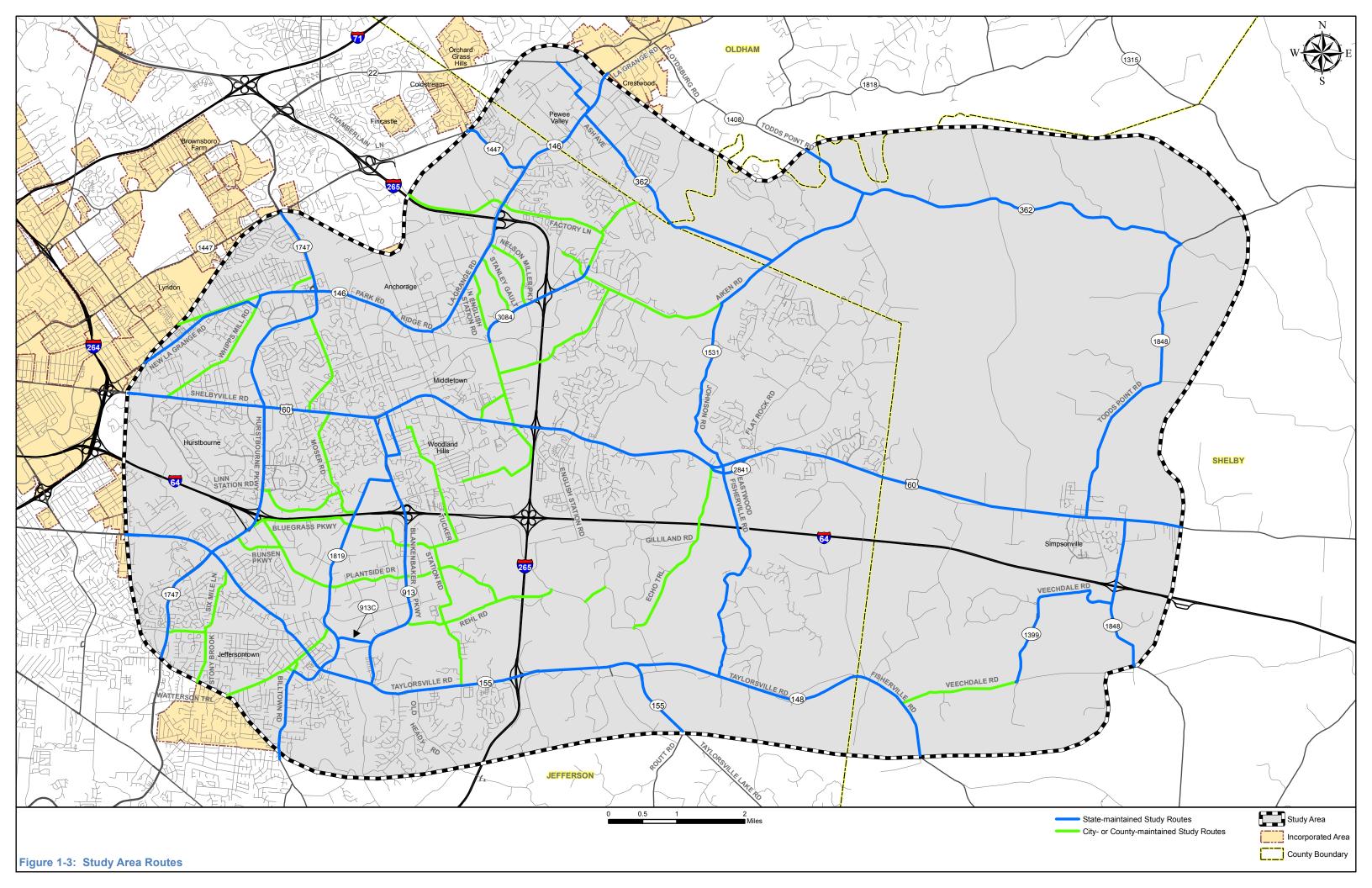


Table 1-1: Study Routes with Milepoint (MP) Limits

Route	Local Name(s) State-Maintained Routes	MP Limits
		Jefferson 5.850-17.375
US 60	Shelbyville Rd	Shelby 0.000-4.450
107.440	New LaGrange Rd   Whipps Mill Rd   LaGrange Rd   Park Rd	Jefferson 0.636-8.825
KY 146	Bellewood Rd   Ridge Rd   LaGrange Rd	Oldham 0.000-1.343
10/ 440		Jefferson 0.000-3.394
KY 148	Taylorsville Rd   Hwy 148   Fisherville Rd	Shelby 0.000-1.675
KY 155	Taylorsville Lake Rd   Taylorsville Rd	Jefferson 3.012-12.700
KY 362	Central Ave   Ash Ave   Aiken Rd	Oldham 0.000-3.039 Shelby 0.000-8.399
KY 913	Blankenbaker Pkwy	Jefferson 0.000-4.337
KY 913C	Blankenbaker Access Rd	Jefferson 0.000-0.500
KY 1399	Veechdale Rd	Shelby 0.000-2.572
		Oldham 0.000-0.25
KY 1408	Todds Point Rd   Floydsburg Rd	Shelby 0.000-0.871
KY 1447	Westport Rd	Jefferson 8.161-9.242
I/V 1501	Routt Rd   Eastwood Fisherville Rd   Johnson Rd   Aiken Rd	Jefferson 5.620-12.656
KY 1531	Routt Rd   Eastwood Fisherville Rd   Johnson Rd   Alken Rd	Shelby 0.000-0.084
KY 1747	Hurstbourne Pkwy	Jefferson 9.200-17.138
KY 1819	Billtown Rd   Ruckreigel Pkwy   Watterson Trl	Jefferson 7.546-13.624
KY 1848	Buck Creek Rd   Todds Point Rd	Shelby 3.717-10.591
KY 2841	Eastwood Cut Off Rd	Jefferson 0.000-0.643
KY 3084	Old Henry Rd	Jefferson 0.000-1.978
	City- or County-Maintained Routes	
CR-1231	Veechdale Rd	Shelby 0.000-1.725
CS-1001H	Plantside Dr	Jefferson 0.000-4.200
CS-1002H	Bluegrass Pkwy	Jefferson 0.000-2.927
CS-1004H	Linn Station Rd	Jefferson 1.108-2.500
CS-1008D	Factory Ln	Jefferson 0.000-1.520
CS-1013H	Bunsen Pkwy	Jefferson 0.000-0.740
CS-1073H	Watterson Trl	Jefferson 0.000-0.694
CS-1720H	Billtown Rd	Jefferson 0.000-0.165
CS-2056H	Ruckriegel Pkwy	Jefferson 0.000-0.103
CR-1001C	Chamberlain Ln	Jefferson 0.000-1.500
CR-1001D	Aiken Rd	Jefferson 0.000-4.535
CR-1001H	Tucker Stn Rd	Jefferson 0.000-4.534
CR-1002H	Six Mile Ln	Jefferson 2.868-4.385
CR-1004H	Watterson Trl	Jefferson 2.200-3.330
CR-1005C	Whipps Mill Rd	Jefferson 0.000-2.316
CR-1005D	Old Henry Rd	Jefferson 0.000-1.258
CR-1006C	N English Stn Rd	Jefferson 0.000-2.131
CR-1006D	Bush Farm Rd	Jefferson 0.000-0.897
CR-1006H CR-1007C	Rehl Rd Dorsey Ln	Jefferson 0.000-2.625 Jefferson 0.000-1.563
CR-1007C	Echo Tr	Jefferson 0.000-1.655
CR-10093	La Grange Rd	Jefferson 0.400-1.672
CR-1010C	Stony Brook Dr	Jefferson 1.334-2.150
CR-1010H	Gilliland Rd	Jefferson 0.000-1.107
CR-10103	Urton Ln	Jefferson 0.000-1.779
CR-1014H	Moser Rd	Jefferson 0.000-1.773
CR-1010H	Nelson Miller Pkwy	Jefferson 0.000-1.733
CR-1019C	Stanley Gault Pkwy	Jefferson 0.000-0.944

#### 2.0 EXISTING CONDITIONS INVENTORY

Existing conditions along study routes were inventoried to provide a baseline scenario. Identification of study area information included assembly of secondary source information obtained from the KYTC's Highway Information System (HIS), supplemented with desktop reviews, project team input, and site visits as appropriate.

#### 2.1 Roadway Systems and Characteristics

KYTC's HIS database was queried during October/November 2018 to obtain roadway systems information and geometric characteristics of study routes listed in **Table 1-1**. Data assembled from HIS for analyses included:

- Number of lanes with lane widths;
- Horizontal and vertical deficiencies;
- Truck routes; and
- Functional classifications.

For study routes, **Figure 2-1 (p.5)** graphically depicts existing number of lanes and widths. These vary from narrow two-lane highways in rural portions of the study area up to a seven-lane cross-section along KY 1747 (Hurstbourne Parkway) near the interchange with I-64.

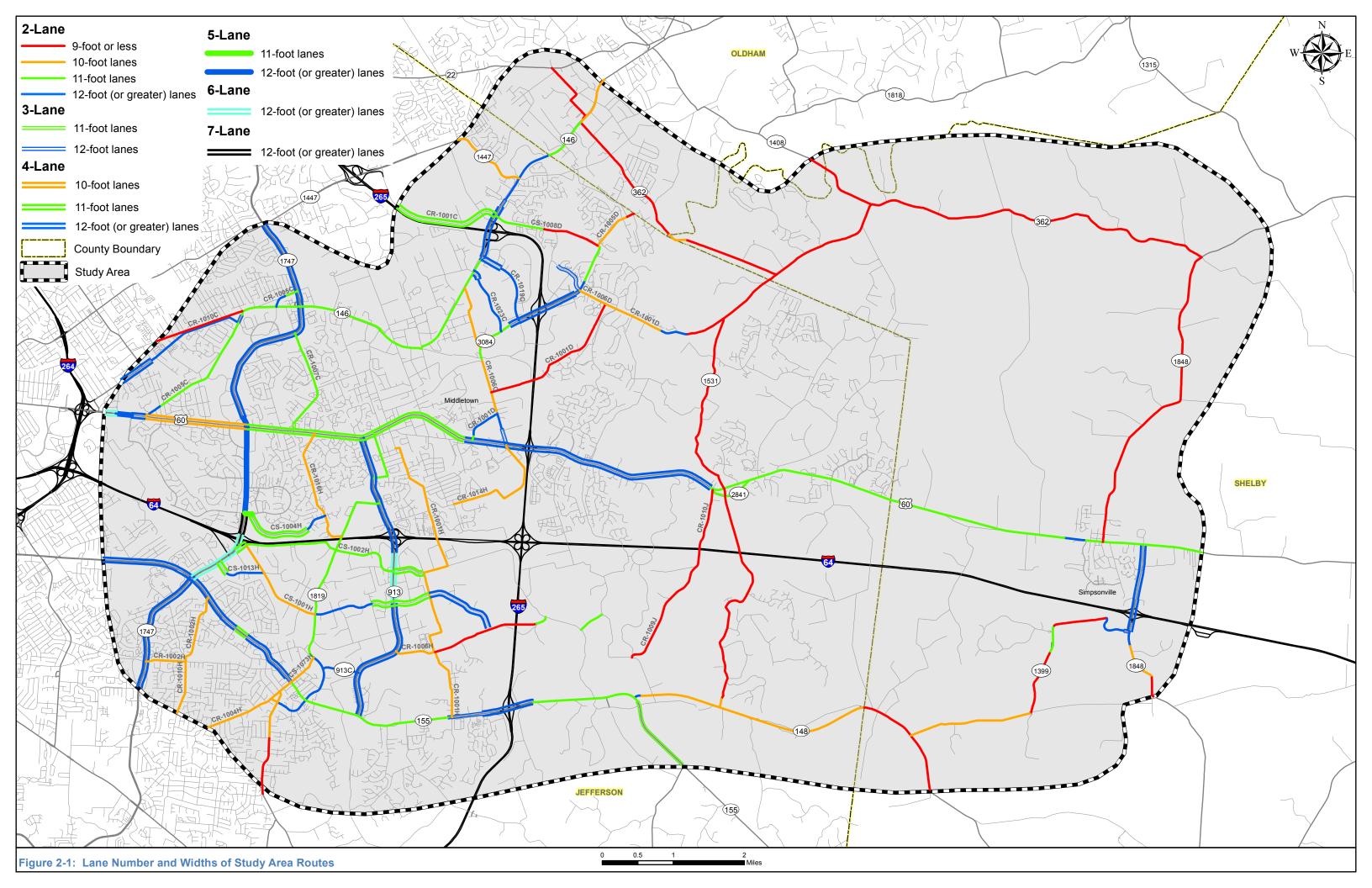
**Figure 2-2 (p.6)** shows the existing geometry of study routes including sharp horizontal curves, steep vertical grades, and narrow lane widths. Guidelines for horizontal and vertical alignments vary based on design speed and other factors.

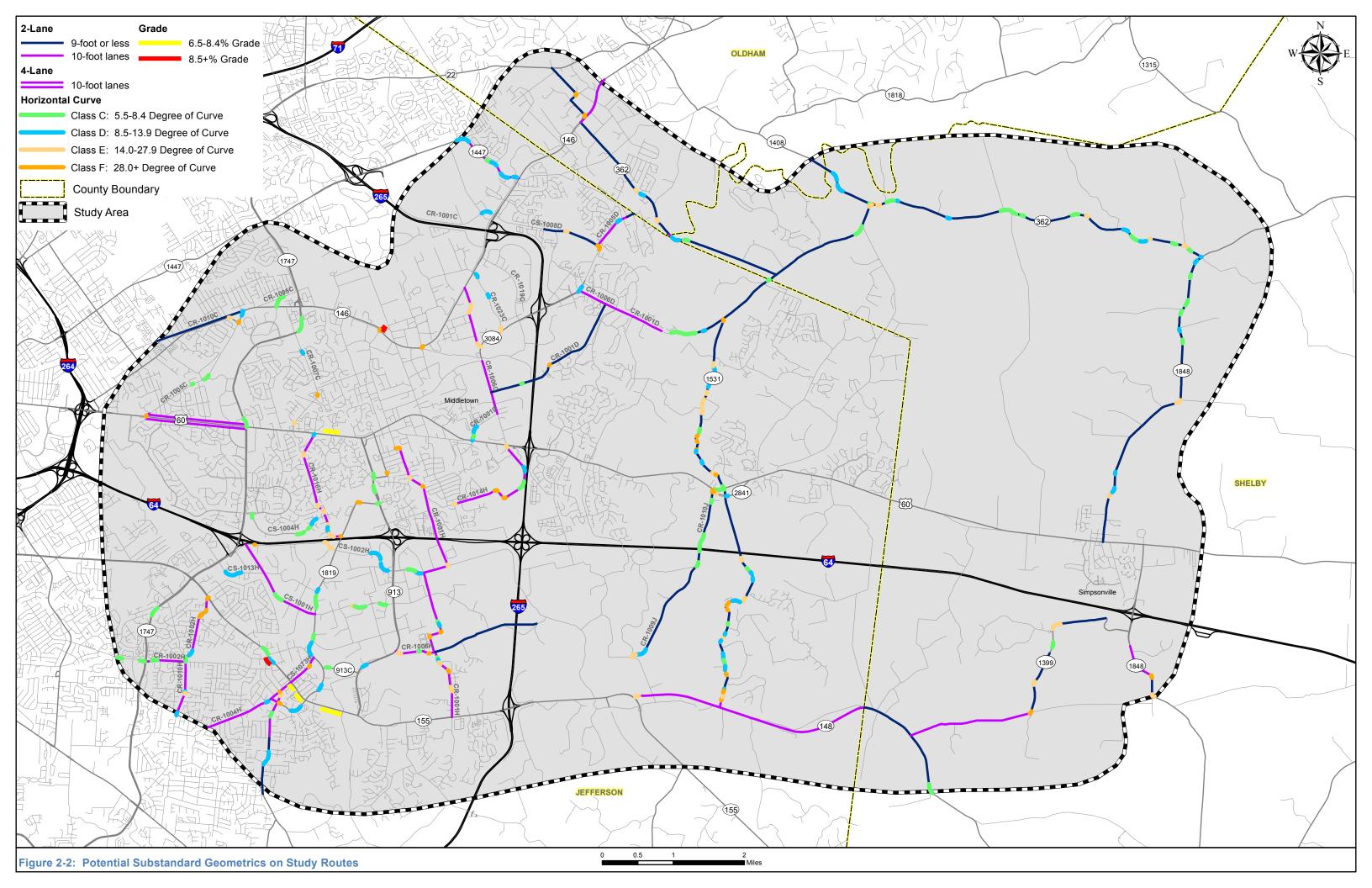
- Current KYTC design guidelines suggest a minimum of 11-foot-wide lanes on arterial and collector roadways and 12-foot-wide lanes for roads with 2,000 or greater daily traffic volumes.
- At a planning-level, KYTC classifies grades into six classes, graded A through F. The worst two classes are shown on the map, corresponding to 6.5% and steeper sections, roughly equating to KYTC's guideline for rural collector routes with 50 to 55 mph design speeds.
- Similarly, KYTC classifies horizontal curves into six classes, graded A through F. Any curve rated C through F is shown on the map, corresponding to a 5.5-degree curve and sharper, roughly equating to KYTC's guideline for rural collector routes with 55 mph design speeds.

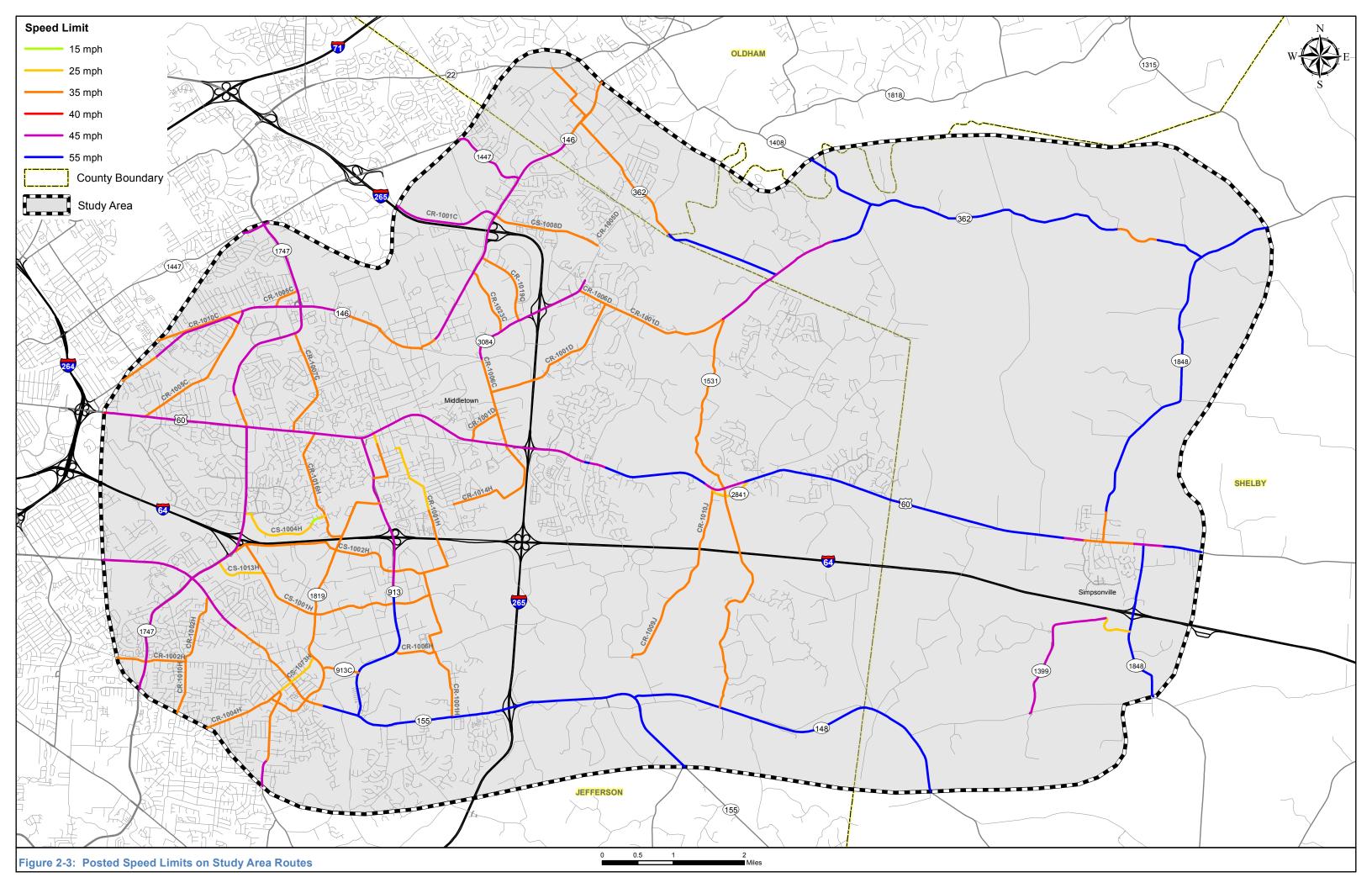
**Figure 2-3 (p.7)** highlights study routes by their posted speed limits. Identifying posted speed limits can help suggest the character and intended function of highway segments.

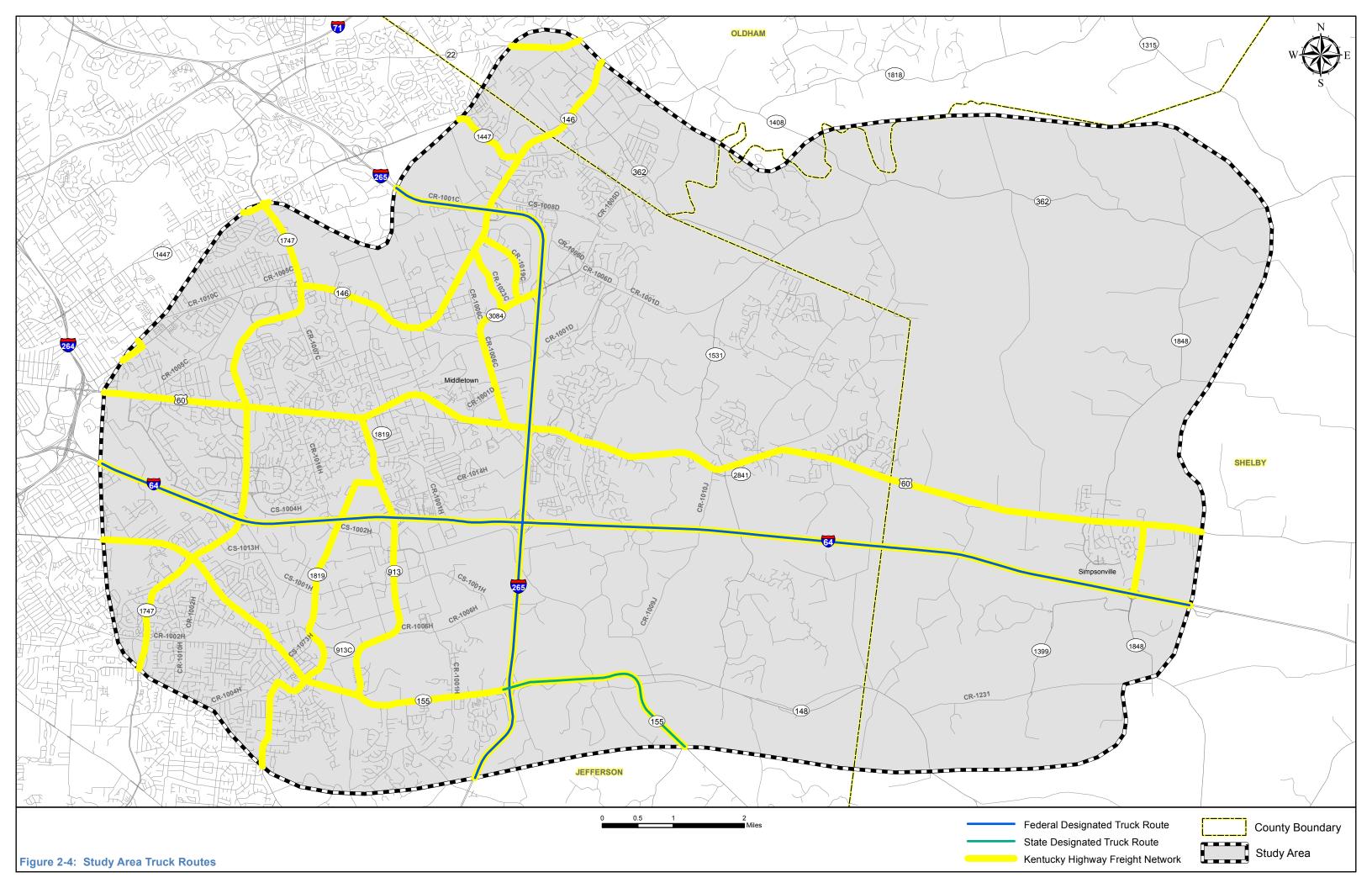
**Figure 2-4 (p.8)** identifies designated truck routes within the study area. Beyond interstates, major highways are listed as state-designated truck routes and/or included in Kentucky's Highway Freight Network: US 60, KY 146, KY 155, KY 913, KY 1747, and portions of KY 1819, KY 1447, KY 1848, KY 3084, CR-1006C (North English Station Road), CR-1023C (Stanley Gault Parkway), and CR-1019C (Nelson Miller Parkway).

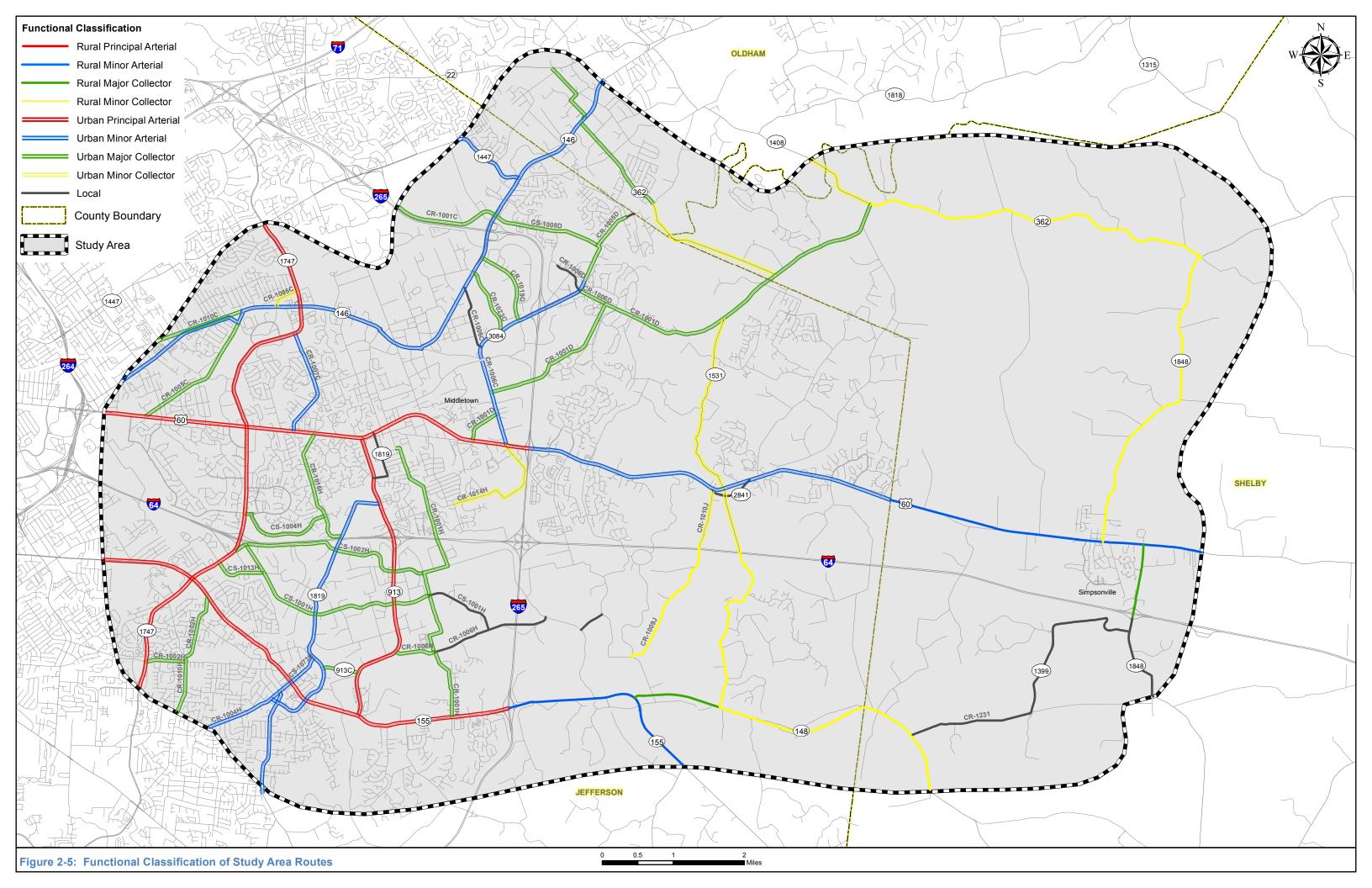
**Figure 2-5 (p.9)** illustrates functional classification of study routes. Functional classification is the process of grouping streets and highways according to the character of travel service and land use access they provide. This creates a hierarchical system of facilities that progress from lower classifications handling short, locally oriented trips to higher classifications serving longer distance travel at a higher level of mobility. Other than interstates, the highest mobility corridors are principal arterials and include US 60, KY 155, KY 913, and KY 1747.











## 2.2 Bridges

KYTC's Division of Maintenance 2017 National Bridge Inventory (NBI) bridge data shows 42 bridges along study routes, as shown in **Figure 2-6 (p. 11)**. In accordance with federal standards, bridges are inspected by KYTC every two years to evaluate their conditions and other elements. Bridge conditions are rated as Good, Fair, or Poor based on their deck, superstructure, and substructure condition. There are four poor condition structures on study routes:

- 056B00017N, KY 155 at Pope Lick Creek
- 056B00008N, US 60 at Long Run Creek
- 093B00012N, KY 362 at Floyds Fork
- 106B00049N, KY 1408 at Floyds Fork

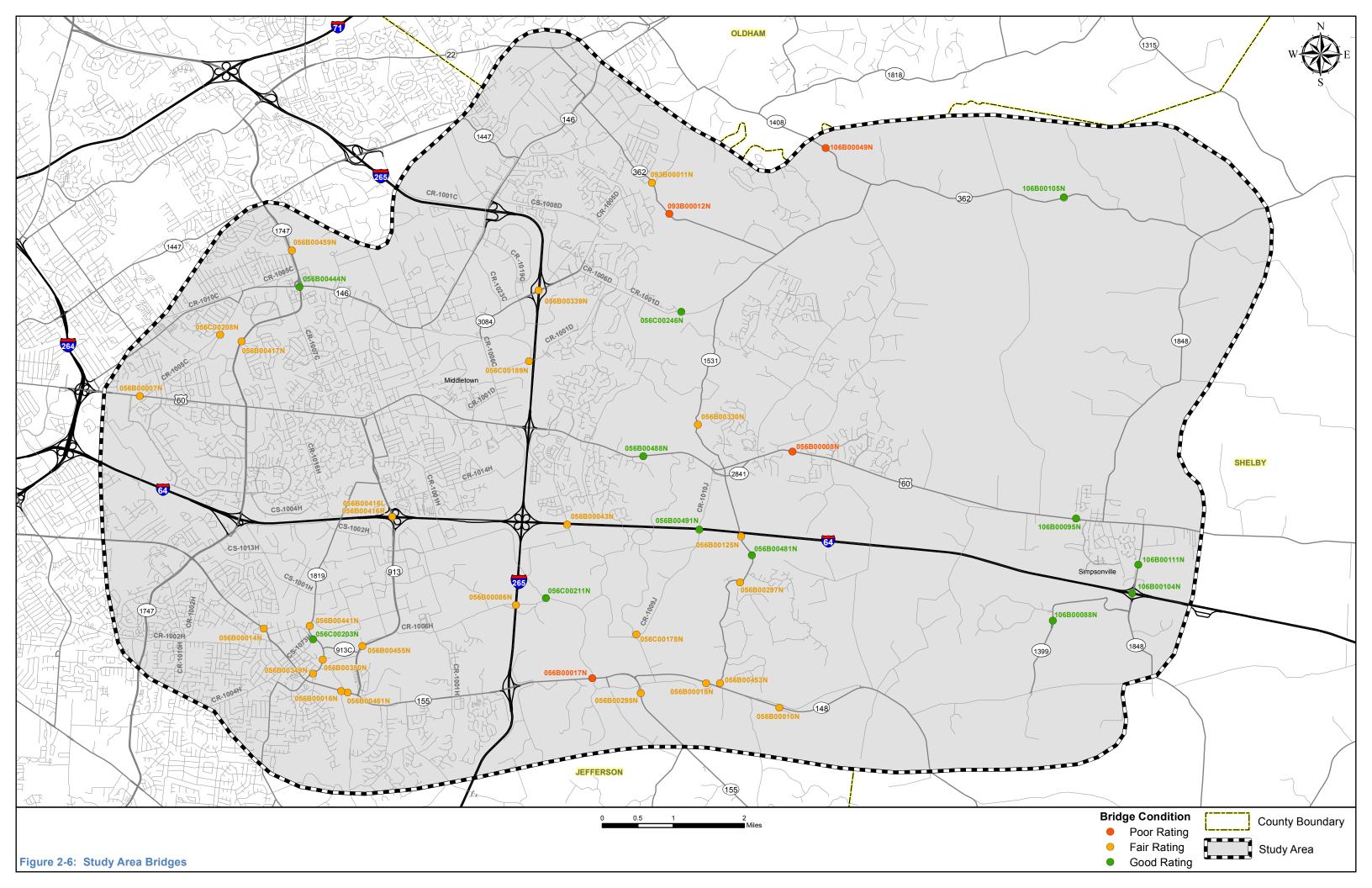
**Table 2-1** provides an overview of rating information for bridges within the study area, based on 2017 inspections.

Table 2-1: Bridge Condition Summary from 2017 NBI Database

Bridge ID	Location	Deck Rating	Super- structure Rating	Substructure Rating	Bridge Condition	Sufficiency Rating
		Jefferson	Co.			
056B00007N	US 60 MP 6.353 /Mid Fk Beargrass Creek	N/A	N/A	N/A	Fair	50
056B00008N	US 60 MP 15.906/Long Run Creek	4	5	5	Poor	52
056B00010N	KY 148 MP 2.126/Brush Run	N/A	N/A	N/A	Fair	81
056B00014N	KY 155 MP 9.971/Br Chenoweth Run	N/A	N/A	N/A	Fair	65
056B00016N	KY 155 MP 8.399/Br Chenoweth Run	N/A	N/A	N/A	Fair	78
056B00017N	KY 155 MP 4.899/Pope Lick Creek	6	6	4	Poor	39
056B00018N	KY 148 MP 1.041/Floyds Fork	6	6	5	Fair	71
056B00043N	S English Stn MP 3.166/I-64	5	7	6	Fair	79
056B00086N	Rehl Rd MP 1.793/I-265	6	6	5	Fair	67
056B00125N	KY 1531 MP 8.124/Long Run Creek	6	5	5	Fair	66
056B00295N	KY 155 MP 4.050/Floyds Fork	6	7	6	Fair	93
056B00297N	KY 1531 MP 7.374/Shakes Run	7	5	6	Fair	68
056B00330N	KY 1531 MP 9.894/Brush Run	6	5	5	Fair	67
056B00339N	KY 3084 MP 1.144/I-265	6	6	7	Fair	93
056B00349N	Ruckriegel Pkwy MP 9.532 /Chenoweth Trib	N/A	N/A	N/A	Fair	100
056B00350N	Ruckriegel Pkwy MP 9.774 /Chenoweth Run	6	7	6	Fair	98
056B00416L	KY 913 MP 2.833/I-64	7	7	7	Good	90
056B00416R	KY 913 MP 2.829/I-64	7	7	6	Fair	90
056B00417N	Hurstbourne MP 14.484 /Mid Fk Beargrass Creek	6	7	7	Fair	91
056B00441N	Watterson Tr MP 0.077/NS Railroad	6	7	7	Fair	94
056B00444N	Hurstbourne MP 15.750 /KY 146/CSX Railroad	7	7	7	Good	99
056B00453N	KY 1531 MP 5.676 Brush Run	7	8	6	Fair	97
056B00455N	KY 913 MP 0.718/NS Railroad	6	7	7	Fair	97

Bridge ID	Location	Deck Rating	Super- structure Rating	Substructure Rating	Bridge Condition	Sufficiency Rating
056B00459N	Hurstbourne MP 16.266 /Goose Creek	N/A	N/A	N/A	Fair	51
056B00461N	KY 1155 MP 8.481/Chenoweth Run	7	8	6	Fair	99
056B00481N	KY 1531 MP 7.812 /Trib to Long Run Creek	N/A	N/A	N/A	Good	100
056B00488N	US 60 MP 13.701/Floyds Fork	7	7	7	Good	94
056B00491N	Gilliland Rd MP 0.854 /I-64	7	7	7	Good	100
056C00178N	Echo Tr MP 1.562/Floyds Fork	5	5	5	Fair	57
056C00189N	Aiken Rd MP 1.106 /Unnamed Stream	7	7	6	Fair	98
056C00203N	Watterson Tr MP 0.669 /Chenoweth Run	7	7	7	Good	100
056C00208N	Whipps Mill Rd MP 1.394 /Mid Fk Beargrass Creek	N/A	N/A	N/A	Fair	76
056C00211N	Rehl Rd MP 2.235/Pope Lick Creek	7	7	7	Good	99
056C00246N	Aiken Rd MP 3.882/Floyds Fork	7	8	7	Good	78
		Oldham C	o.			
093B00011N	KY 362 MP 2.512/Flat Rock Creek	6	6	5	Fair	66
093B00012N	KY 362 MP 3.028/Floyds Fork	4	7	7	Poor	85
		Shelby C	0.			
106B00049N	KY 1408 MP 0.864/Floyds Fork	4	6	6	Poor	76
106B00088N	KY 1399 MP 1.087/NS Railroad	7	7	7	Good	90
106B00095N	US 60 MP 2.661/CSX Railroad	7	8	7	Good	97
106B00104N	KY 1848 MP 5.065/I-64	7	7	7	Good	98
106B00105N	KY 362 MP 6.232/Junkins Rd	N/A	N/A	N/A	Good	89
106B00111N	KY 1848 MP 5.468/NS Railroad	7	7	7	Good	92

N/A denotes culvert



#### 2.3 Existing and Future No-Build Traffic

KYTC and KIPDA databases provided existing average daily traffic (ADT) volumes for study area roadways, including truck percentages, K-factors, and peak hour directional distributions as available. The majority of counts were collected within the last three years. To supplement this data, tube counts were conducted in late 2018 on KY 1819 (Billtown Road), CS-1004H (Linn Station), CR-1010J (Gilliland Road), CS-1001H (Plantside Drive), CR-1006H (Rehl Road), KY 1399 (Veechdale Road), and CR-1231 (Veechdale Road). A peak hour turning movement count was conducted at the KY 1747 / CR-1002H (Six Mile Lane) intersection. Existing segment volumes are based on historical trends, with pre-2018 volumes adjusted to create a consistent existing year dataset.

The *Middletown to Simpsonville 2019 Abbreviated Traffic Forecast* completed for this study **(Appendix A)** showed annual growth rates that ranged from negative growth (assumed to remain constant) to over 5% growth. Most roadway segments showed moderate growth, averaging 0.5% annually.

#### 2.3.1 Traffic Analysis Tools

LOS is a qualitative measure that describes traffic conditions based on measures such as speed and travel time, freedom to maneuver, traffic interruptions, comfort, and convenience. LOS typically represents a driver's perspective of traffic conditions based on perceived congestion, rated "A" through "F." LOS A is associated with free flow conditions, high freedom to maneuver, and little or no delay. Conditions at or near capacity are typically associated with LOS E. At LOS F, traffic conditions are oversaturated and beyond capacity, with low travel speeds, little to no freedom to maneuver, and high delays. Although LOS C or better is desirable, LOS D is generally acceptable in urban areas.

Due to the scale of the study area, only segment-level LOS calculations were performed. Please note: a more detailed examination of individual corridors could find specific intersections or other bottlenecks dominating operations, not reflected in the broader segment analysis.

Another measure, volume-to-capacity (v/c) ratio, compares the traffic volume using a facility to its theoretical capacity over a specific duration, one hour in this instance. A v/c ratio greater than 1.0 indicates a route has exceeded its theoretical capacity; additional lanes may be justified. Note: as v/c is measured over an hour period by segment, a roadway or intersection could be congested during peak commuter periods but show a relatively low v/c averaged over a longer duration. KYTC policy recommends a targeted v/c ratio for freeways and multi-lane highway segments of 1.0 in urban areas and 0.9 in rural areas.

Existing year (2018) level of service (LOS) analyses and volume-to-capacity (v/c) ratios are based on worst traffic hour by segment for study routes.

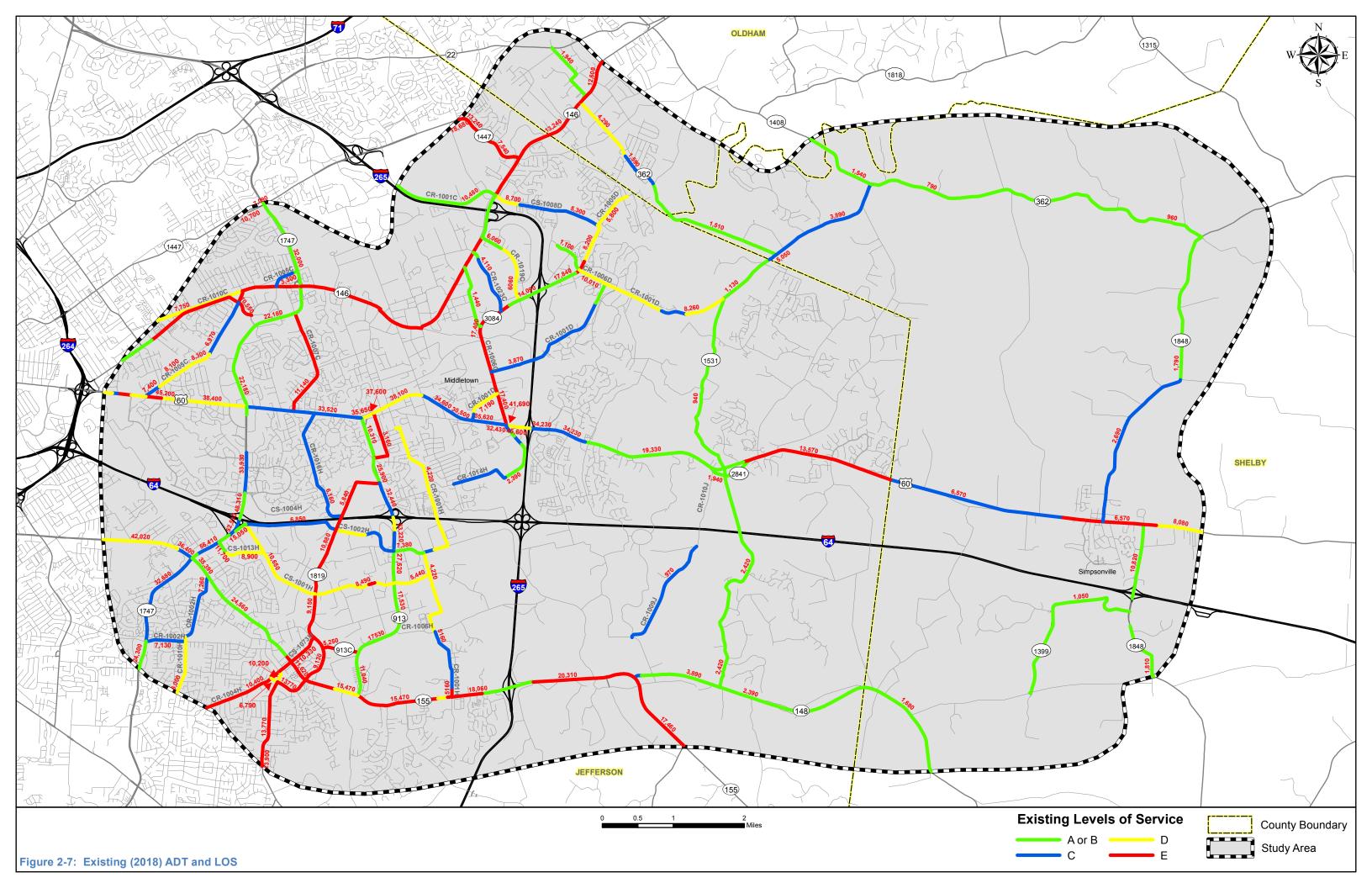
## 2.3.2 Existing (2018) Traffic Analysis

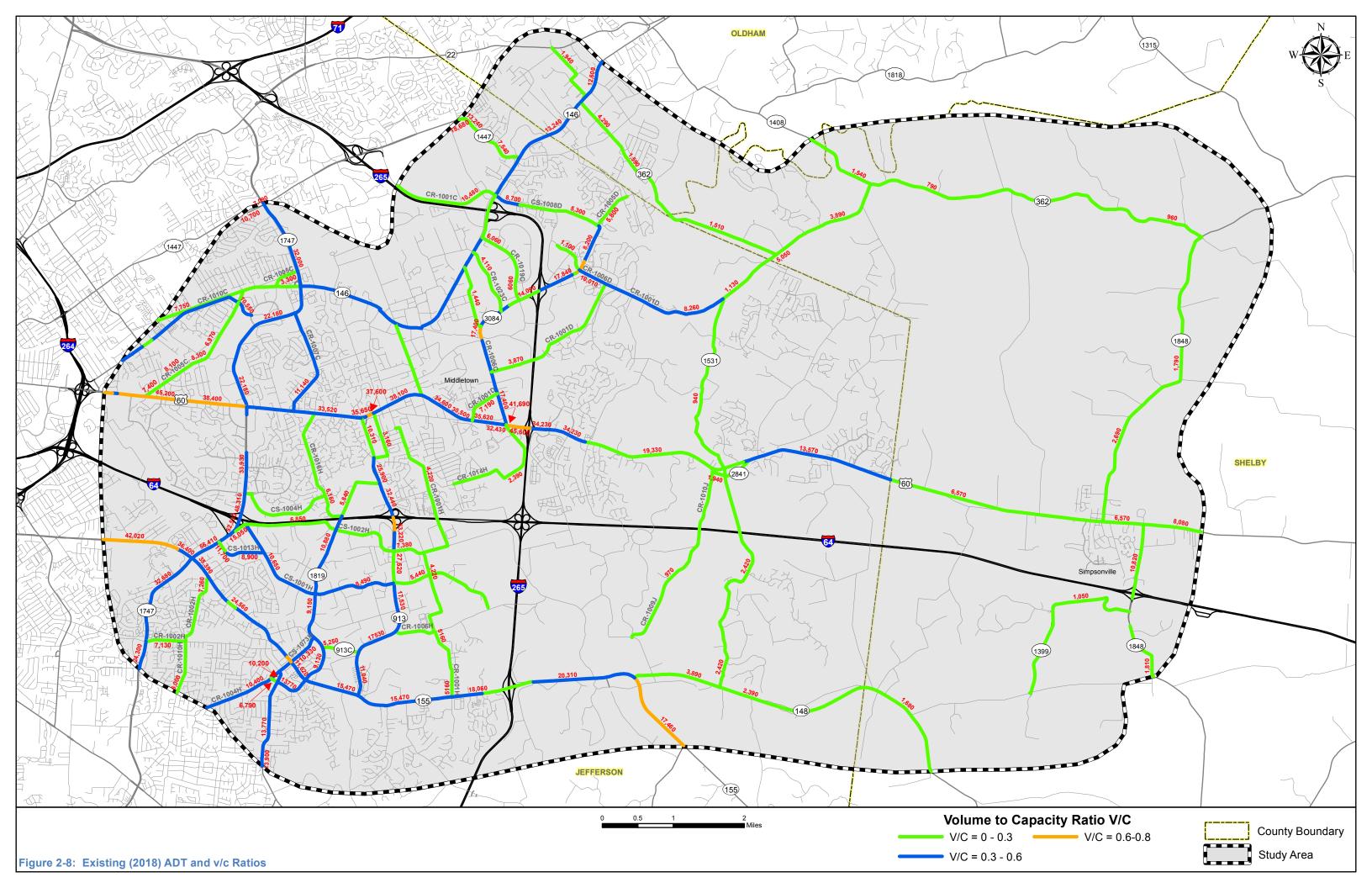
Using *Highway Capacity Software version* 7 (HCS), existing LOS and v/c ratios were calculated for all study routes. Routes with portions of roadway currently operating at LOS E (substandard) are listed in **Table 2-2**. All other roadway segments operate at acceptable LOS D or better. Estimated 2018 traffic volumes and LOS for all study routes are shown on **Figure 2-7** (p.13).

Segment v/c ratios are shown on **Figure 2-8 (p.14)**. All segments within the study area have v/c ratios within an acceptable range; however, as noted previously, this analysis does not account for intersections or other bottlenecks. The highest v/c ratio is on US 60 (MP 6.029-6.227) near the western boundary of the study area (v/c = 0.80).

Table 2-2: Routes with LOS E or Worse based on 2018 Traffic

Route	County	ВМР	EMP	2018 ADT	2018 LOS	2018 v/c
US 60 Shelbyville Rd	Jefferson	6.029	6.227	48,030	Е	0.80
US 60 Shelbyville Rd	Jefferson	6.435	6.660	45,200	Е	0.75
US 60 Shelbyville Rd	Jefferson	15.194	17.375	13,570	Е	0.50-0.51
US 60 Shelbyville Rd	Shelby	2.485	3.800	6,570-8,080	Е	0.28-0.30
KY 146 New LaGrange Rd	Jefferson	1.149	6.964	7,090-11,070	Е	0.26-0.44
KY 146 Park Rd	Jefferson	7.555	7.718	13,240-18,680	Е	0.50-0.60
KY 146 LaGrange Rd	Oldham	0.000	0.630	12,600-13,240	Е	0.41-0.50
KY 155 Taylorsville Rd	Jefferson	0.000	5.711	14,410-20,310	Е	0.52-0.71
KY 155 Taylorsville Rd	Jefferson	6.450	6.951	15,470-18,060	Е	0.40-0.53
KY 155 Taylorsville Rd	Jefferson	7.089	8.247	15,470	Е	0.40-0.41
KY 155 Taylorsville Rd	Jefferson	8.590	9.439	11,620-24,560	Е	0.39-0.68
KY 913C Blankenbaker Access	Jefferson	0.000	0.500	5,250	Е	0.26
KY 1447 Westport Rd	Jefferson	8.028	9.242	7,540	Е	0.24
KY 1819 Billtown Rd/ Ruckriegel Pkwy/ Watterson Tr	Jefferson	7.139	13.624	3,160-13,900	E	0.15-0.51
KY 3084 Old Henry Rd	Jefferson	0.000	0.692	14,090-17,400	Е	0.55-0.61
KY 3084 Old Henry Rd	Jefferson	1.721	1.799	17,840	Е	0.74-0.76
CS-1001H Plantside Dr	Jefferson	2.242	2.326	8,490	Е	0.31
CS-1073H Watterson Tr	Jefferson	0.000	0.694	10,330	Е	0.44
CR-1001C Chamberlain Ln	Jefferson	2.043	2.104	10,480	Е	0.44
CR-1001H Tucker Stn Rd	Jefferson	4.435	4.534	5,160	Е	0.27
CR-1004H Watterson Tr	Jefferson	1.083	3.330	10,400	Е	0.39
CR-1006C N English Stn	Jefferson	0.000	1.232	17,400	Е	0.6
CR-1007C Dorsey Ln	Jefferson	0.000	1.563	11,140	Е	0.44
CR-1035C Mill Brook Rd	Jefferson	0.000	0.271	10,550	Е	0.41





## 2.3.3 Future (2040) No-Build Capacity Analysis

Analysts used the Kentucky Statewide Travel Demand Model (KYSTM) version 5905 to forecast future traffic volumes (year 2040) on study roadways. Future year traffic analyses included two "committed" projects likely to influence regional traffic flows in the 2040 No-Build network:

- Widening I-71 to six lanes in Oldham County (approximate MP 0-22)
- Widening I-64 to six lanes in Shelby County (approximate MP 32-39)

Other large-scale improvements likely to influence regional traffic flows were included in the individual build scenarios discussed in **Section 5.1.5**.

As the model relies heavily on background socioeconomic growth assumptions to forecast future growth, analysts invested substantial effort to verify anticipated development trends.

- Statewide model zones were compared geographically to zones in the recently updated KIPDA model to align areas of expected household and employment growth.
- Select zones in the statewide model were subdivided, providing a finer level of detail, particularly for Oldham County.
- Planners reached out to local government representatives in Spencer, Shelby, Oldham, and Jefferson counties plus regional planners with KIPDA to identify anticipated large-scale developments. Comprehensive plans were reviewed to explore long-term expected growth.
- Louisville Metro provided a list of development applications filed since 2013, representing 19,500 new households, four large warehouses, 87 industrial developments, 12 hotels, and over 400 commercial developments.

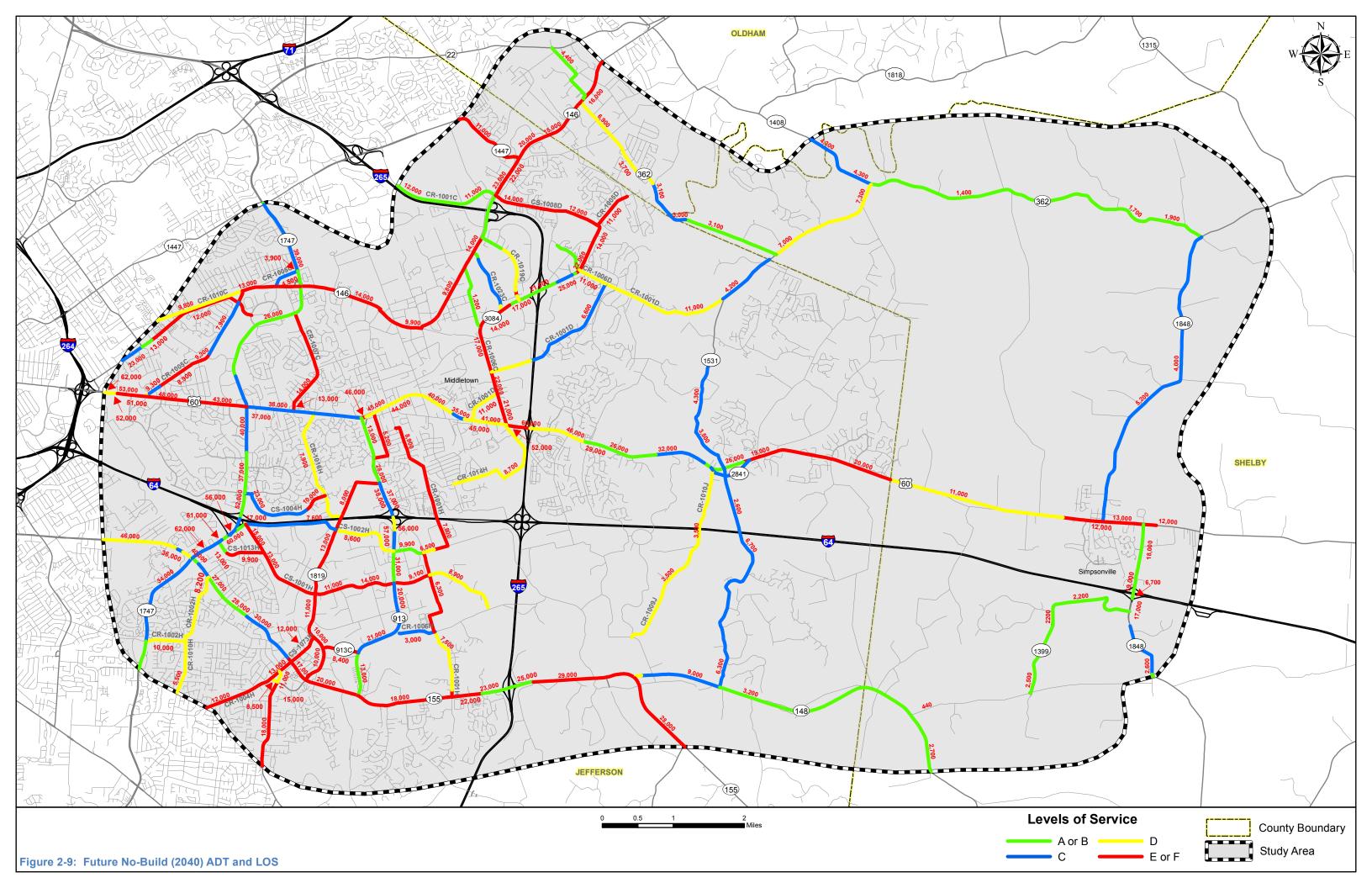
Projected 2040 No-Build traffic operations for study routes were compared to existing conditions. **Table 2-3** lists routes exhibiting LOS E or F conditions in the future No-Build scenario. **Figure 2-9 (p. 16)** shows 2040 No-Build ADT and LOS for study routes. Year 2040 No-Build v/c ratios are depicted on **Figure 2-10 (p. 17)**. Congestion issues in 2040 mimic those seen in 2018, expanding to include additional segments. Two segments degrade to LOS F and exhibit v/c ratios greater than 1.0: segments along KY 155 and KY 3084.

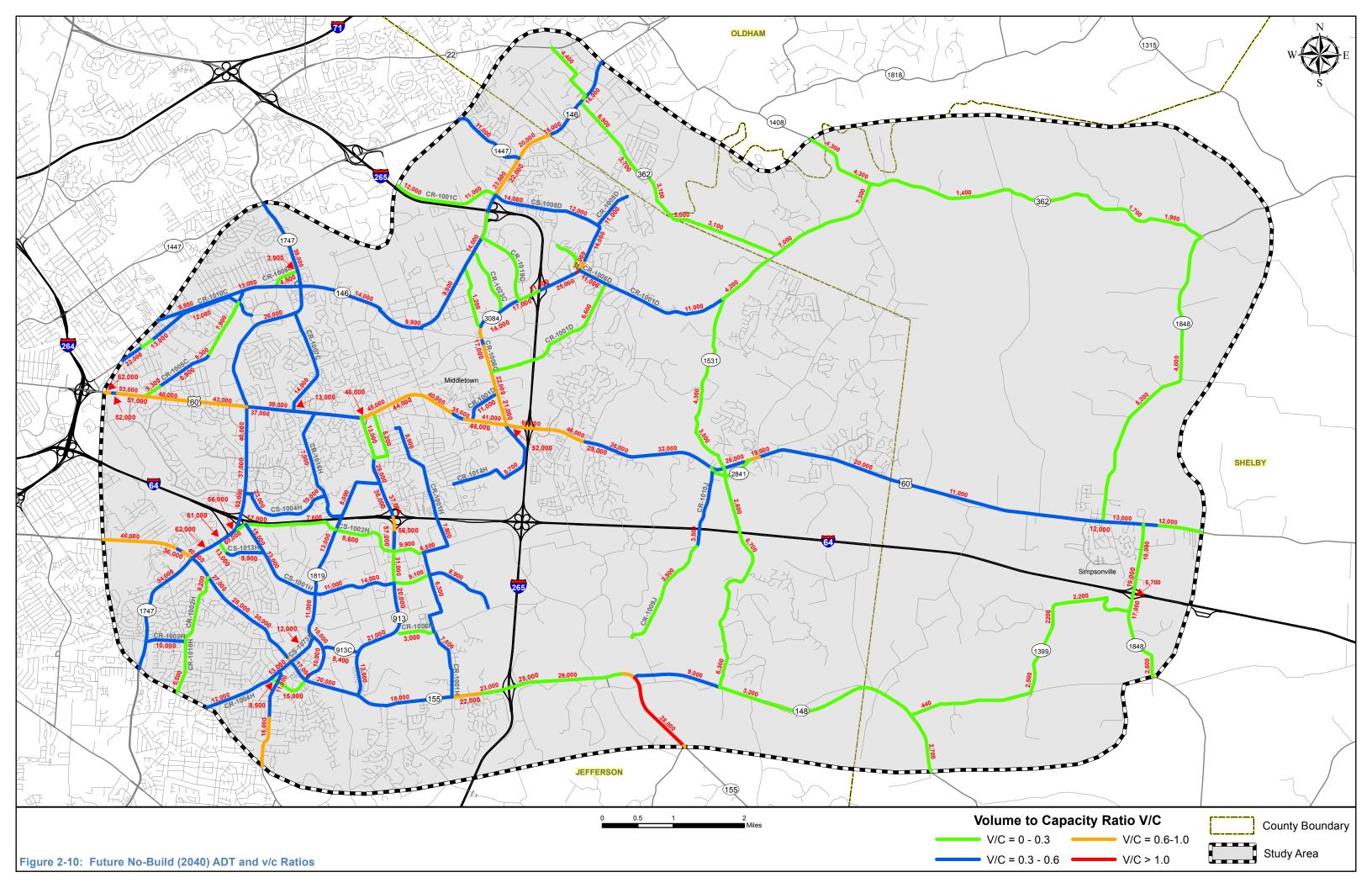


Queuing at US 60 (Shelbyville Rd) / KY 1747 (Hurstbourne Pkwy) intersection

Table 2-3: Future (2040) No-Build Traffic Operations with LOS E or Worse

Route	County	ВМР	EMP	2040 ADT	2040 LOS	2040 v/c
US 60 Shelbyville Rd	Jefferson	6.029	7.857	43,000-53,000	Е	0.71-0.88
US 60 Shelbyville Rd	Jefferson	9.473	9.537	46,000	Е	0.77
US 60 Shelbyville Rd	Jefferson	11.684	12.020	52,000-60,000	Е	0.88-0.99
US 60 Shelbyville Rd	Jefferson	15.194	17.375	19,000-20,000	Е	0.50-0.72
US 60 Shelbyville Rd	Shelby	2.485	3.800	11,000-13,000	Е	0.43-0.55
KY 146 New LaGrange Rd	Jefferson	1.149	6.964	9,800-14,000	Е	0.32-0.57
KY 146 Park Rd	Jefferson	7.555	8.825	20,000-23,000	Е	0.72-0.77
KY 146 LaGrange Rd	Oldham	0.000	2.021	15,000-16,000	Е	0.51-0.59
KY 155 Taylorsville Rd	Jefferson	0.000	5.711	22,000-29,000	E-F	0.74-1.02
KY 155 Taylorsville Rd	Jefferson	6.450	9.439	17,000-30,000	Е	0.45-0.84
KY 913C Blankenbaker Acccess	Jefferson	0.000	0.500	8,400	E	0.41
KY 1447 Westport Rd	Jefferson	8.028	9.242	11,000	Е	0.36
KY 1819 Billtown Rd	Jefferson	7.139	7.770	15,000-18,000	Е	0.53-0.65
KY 1819 Ruckriegel Pkwy/ Watterson Tr	Jefferson	9.386	13.624	5,200-13,000	E	0.19-0.43
KY 3084 Old Henry Rd	Jefferson	0.000	0.692	14,000-17,000	Е	0.55-0.61
KY 3084 Old Henry Rd	Jefferson	1.721	1.978	22,000-25,000	E-F	0.91-1.03
CS-1001H Plantside Dr	Jefferson	0.000	3.135	9,100-15,000	Е	0.28-0.55
CS-1004H Linn Stn Rd	Jefferson	2.183	2.270	10,000	Е	0.41
CS-1008D Factory Ln	Jefferson	0.000	1.520	12,000-14,000	Е	0.46-0.56
CS-1013H Bunsen Pkwy	Jefferson	0.000	0.534	9,900	Е	0.39
CS-1073H Watterson Tr	Jefferson	0.000	0.694	12,000-13,000	Е	0.51-0.55
CR-1001C Chamberlain Ln	Jefferson	2.043	2.104	12,000	Е	0.49
CR-1001H Tucker Stn Rd	Jefferson	0.000	2.104	7,800-8,900	Е	0.52-0.59
CR-1001H Tucker Stn Rd	Jefferson	2.257	3.538	6,300	Е	0.42
CR-1001H Tucker Stn Rd	Jefferson	4.435	4.534	7,500	Е	0.39
CR-1004H Watterson Tr	Jefferson	1.083	3.330	12,000	Е	0.45
CR-1005C Whipps Mill	Jefferson	0.240	1.085	8,900-9,300	Е	0.33-0.34
CR-1005D Old Henry Rd	Jefferson	0.000	1.147	11,000-14,000	Е	0.44-0.56
CR-1006C N English Stn	Jefferson	0.000	0.101	17,000-21,000	Е	0.60-0.74
CR-1007C Dorsey Ln	Jefferson	0.000	1.563	13,000-14,000	Е	0.51-0.55





#### 2.4 Crash Analysis for State-Maintained Routes

KYTC provided crash data for study routes obtained from the Transportation Enterprise Data (TED) database for the three-year period from July 2015 through June 2018. Crash data on state-maintained study routes were analyzed by individual route. A total of 7,672 crashes were reported during the three-year analysis period. In total, 13 vehicular crashes with bicyclists and 30 crashes involving pedestrians were included in the dataset. Complete crash records are included in **Appendix B.** 

**Table 2-4** shows the number of crashes occurring on each state-maintained study route and the corresponding percentage of total crashes within the study area. Three routes—noted in bold blue text in the table—account for 71% of total crashes: US 60 (Shelbyville Road, 31%), KY 1747 (Hurstbourne Parkway, 26%), and KY 155 (Taylorsville Road, 15%).

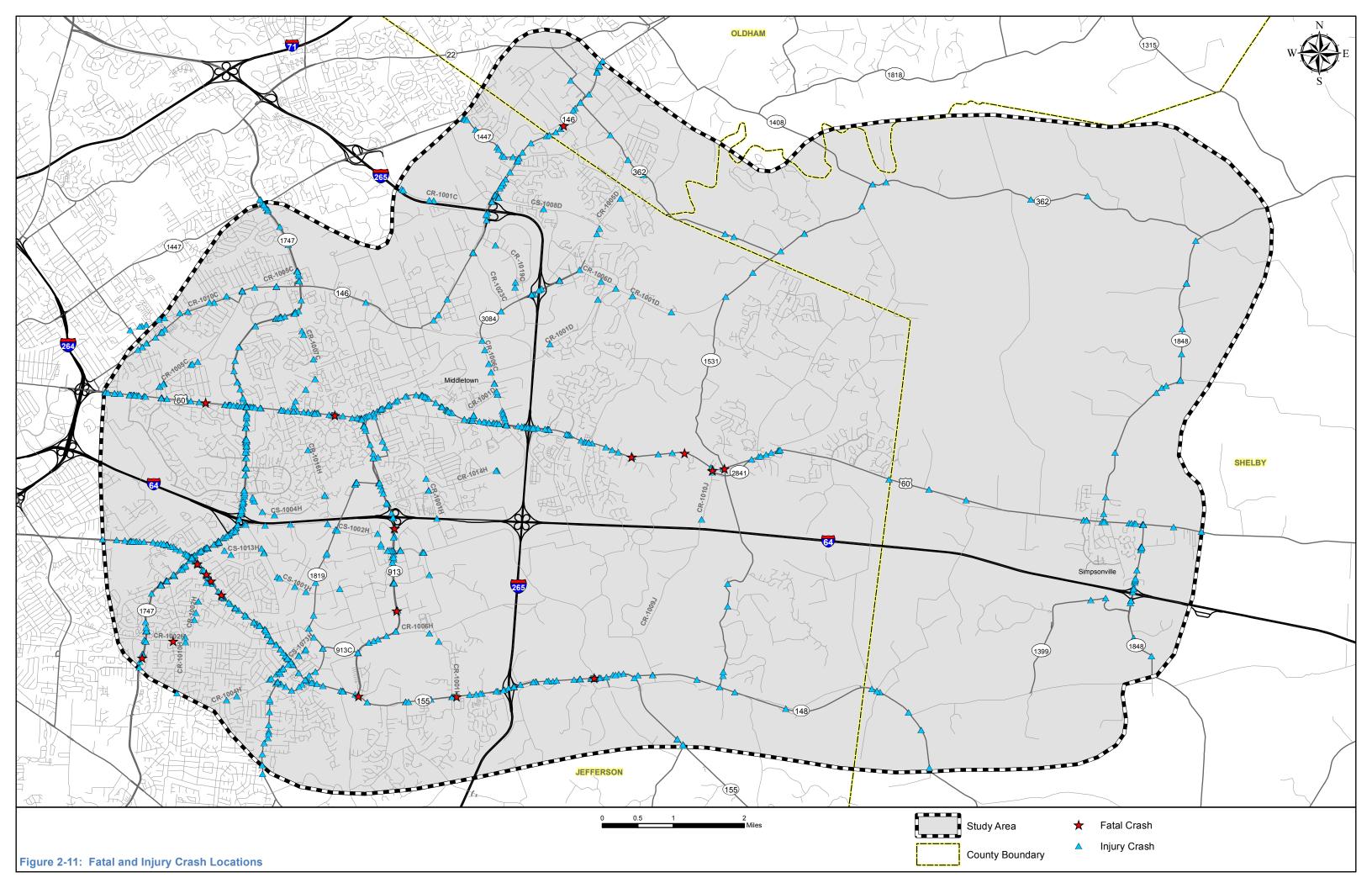
**Table 2-4: Total Crashes on State-Maintained Study Routes** 

				Total Crashes – State Routes	
Route	County	BMP	EMP	Number	%
US 60	Jefferson	5.850	17.375	2,303	30%
03 60	Shelby	0.000	4.450	103	1%
KY 146	Jefferson	0.636	8.825	539	7%
K1 140	Oldham	0.000	1.343	73	1%
KY 148	Jefferson	0.000	3.394	20	<1%
K1 140	Shelby	0.000	1.675	19	<1%
KY 155	Jefferson	3.051	12.700	1,182	15%
KY 362	Oldham	0.000	3.039	29	1%
N1 302	Shelby	0.000	8.399	42	1%
KY 913	Jefferson	0.000	4.337	526	7%
KY 913C	Jefferson	0.000	0.500	7	<1%
KY 1399	Shelby	0.000	2.572	10	1%
KY 1408	Oldham	0.000	0.250	2	<1%
KY 1408	Shelby	0.000	0.871	5	<1%
KY 1447	Jefferson	8.161	9.242	70	1%
KY 1531	Jefferson	5.620	12.656	34	<1%
KY 1531	Shelby	0.000	0.084	0	<1%
KY 1747	Jefferson	9.200	17.040	2,008	26%
KY 1819	Jefferson	7.546	13.624	362	5%
KY 1848	Shelby	3.717	10.591	201	3%
KY 2841	Jefferson	0.000	0.643	8	<1%
KY 3084	Jefferson	0.000	1.978	129	2%
Total Crashes o	n State-Maintained St	7,672	100%		

A summary of crashes categorized by severity on state-maintained, non-interstate routes is shown in **Table 2-5**. Property damage only (PDO) crashes comprised the vast majority of total crashes (86%), followed by injury collisions (14%). Sixteen fatalities (representing less than 1% of all reported crashes) occurred in the study area: seven on KY 155, five on US 60, two on KY 913, and one each on KY 1747 and KY 146. **Figure 2-11** shows the geographic distribution of fatality and injury crashes on study routes.

Table 2-5: State-Maintained Study Routes - Crashes by Severity

Route	County	ВМР	EMP	Total Crashes	Fatalities	Injuries	PDO
US 60	Jefferson	5.850	17.375	2,303	5	255	2,043
03 00	Shelby	0.000	4.450	103	0	22	81
KY 146	Jefferson	0.636	8.825	539	0	60	479
K1 140	Oldham	0.000	1.343	73	1	14	58
KY 148	Jefferson	0.000	3.394	20	0	5	15
K1 140	Shelby	0.000	1.675	19	0	6	13
KY 155	Jefferson	3.051	12.700	1,182	7	217	958
KY 362	Oldham	0.000	3.039	29	0	4	25
KT 302	Shelby	0.000	8.399	42	0	10	32
KY 913	Jefferson	0.000	4.337	526	2	72	452
KY 913C	Jefferson	0.000	0.500	7	0	0	7
KY 1399	Shelby	0.000	2.572	10	0	3	7
KY 1408	Oldham	0.000	0.250	2	0	0	2
	Shelby	0.000	0.871	5	0	0	5
KY 1447	Jefferson	8.161	9.242	70	0	13	57
KY 1531	Jefferson	5.620	12.656	34	0	7	27
Shel	Shelby	0.000	0.084	0	0	0	0
KY 1747	Jefferson	9.200	17.040	2,008	1	250	1,757
KY 1819	Jefferson	7.546	13.624	362	0	45	317
KY 1848	Shelby	3.717	10.591	201	0	42	159
KY 2841	Jefferson	0.000	0.643	8	0	0	8
KY 3084	Jefferson	0.000	1.978	129	0	20	109
Total Crashes on State-Maintained Study Routes				7,672 (100%)	16 (<1%)	1,045 (14%)	6,611 (86%)



**Table 2-6** summarizes crashes by manner of collision on state-maintained routes in the study area. Rear end collisions were the most common crash type with 3,720 (48%) occurrences followed by angle crashes, 2,101 (27%).

Table 2-6: Crashes by Manner of Collision on State-Maintained Study Routes

				All Crashes	Angle/Turn	Backing	Head-On	Rear End	Sideswipe	Single Veh
Route	County	ВМР	EMP	1				4 6 4 6		
US 60	Jefferson	5.850	17.375	2,303	603	20	39	1,218	321	102
	Shelby	0.000	4.450	103	24	1	0	39	5	34
KY 146	Jefferson	0.636	8.825	539	192	8	3	220	62	54
	Oldham	0.000	1.343	73	11	0	0	36	5	21
KY 148	Jefferson	0.000	3.394	20	7	0	0	6	1	6
	Shelby	0.000	1.675	19	1	0	0	2	1	15
KY 155	Jefferson	3.051	12.700	1,182	309	10	28	628	134	73
KY 362	Oldham	0.000	3.039	29	15	1	0	4	1	8
K1 302	Shelby	0.000	8.399	42	6	1	1	0	8	26
KY 913	Jefferson	0.000	4.337	526	187	3	1	226	73	36
KY 913C	Jefferson	0.000	0.500	7	3	2	1	0	1	0
KY 1399	Shelby	0.000	2.572	10	3	1	1	2	1	2
KY 1408	Oldham	0.000	0.250	2	0	0	0	1	0	1
KY 1408	Shelby	0.000	0.871	5	1	0	0	0	2	2
KY 1447	Jefferson	8.161	9.242	70	20	2	3	31	6	8
KY 1531	Jefferson	5.620	12.656	34	6	2	1	0	8	17
K1 1331	Shelby	0.000	0.084	0	0	0	0	0	0	0
KY 1747	Jefferson	9.200	17.040	2,008	519	24	4	1,024	370	67
KY 1819	Jefferson	7.546	13.624	362	97	7	14	169	34	41
KY 1848	Shelby	3.717	10.591	201	42	6	11	58	22	62
KY 2841	Jefferson	0.000	0.643	8	3	0	0	4	0	1
KY 3084	Jefferson	0.000	1.978	129	52	1	0	53	14	9
Total Crashes on State-Maintained Study Routes				7,672	2,101	89	107	3,720	1,069	585

#### 2.4.1 Critical Crash Rate Factors

KYTC uses a systematic procedure to identify locations having high crash rates. The actual number of crashes, as obtained from KYTC's TED database, occurring within a roadway segment is used to calculate the Actual Crash Rate using roadway length, annualized ADT, and the number of years for which crash data are being examined. Using an analysis procedure from the Kentucky Transportation Center (KTC) and referenced in *The Analysis of Traffic Crash Data in Kentucky (2013-2017)*, Actual Crash Rates are compared to the Critical Crash Rate for similar types of Kentucky roadways. The Critical Crash Rate is the rate which is statistically greater than the average crash rate for similar roadways, and represents a rate above which crashes may be occurring in a non-random fashion. This ratio of Actual Crash Rate to the Critical Crash Rate is the Critical Crash Rate Factor (CCRF). A CCRF greater than 1.0 indicates crashes may be occurring more often than can be attributed to random occurrence. This procedure is a screening technique indicating locations where further analysis may be needed. It is neither a definitive statement nor a measurement of a crash problem.

As defined in the KTC methodology report, two analysis types were examined: "segments" and "spots." Segments vary in length and are divided along roadways as geometry or traffic volumes change. Spots are defined by analyzing 0.1-mile-long sections where crashes are concentrated.

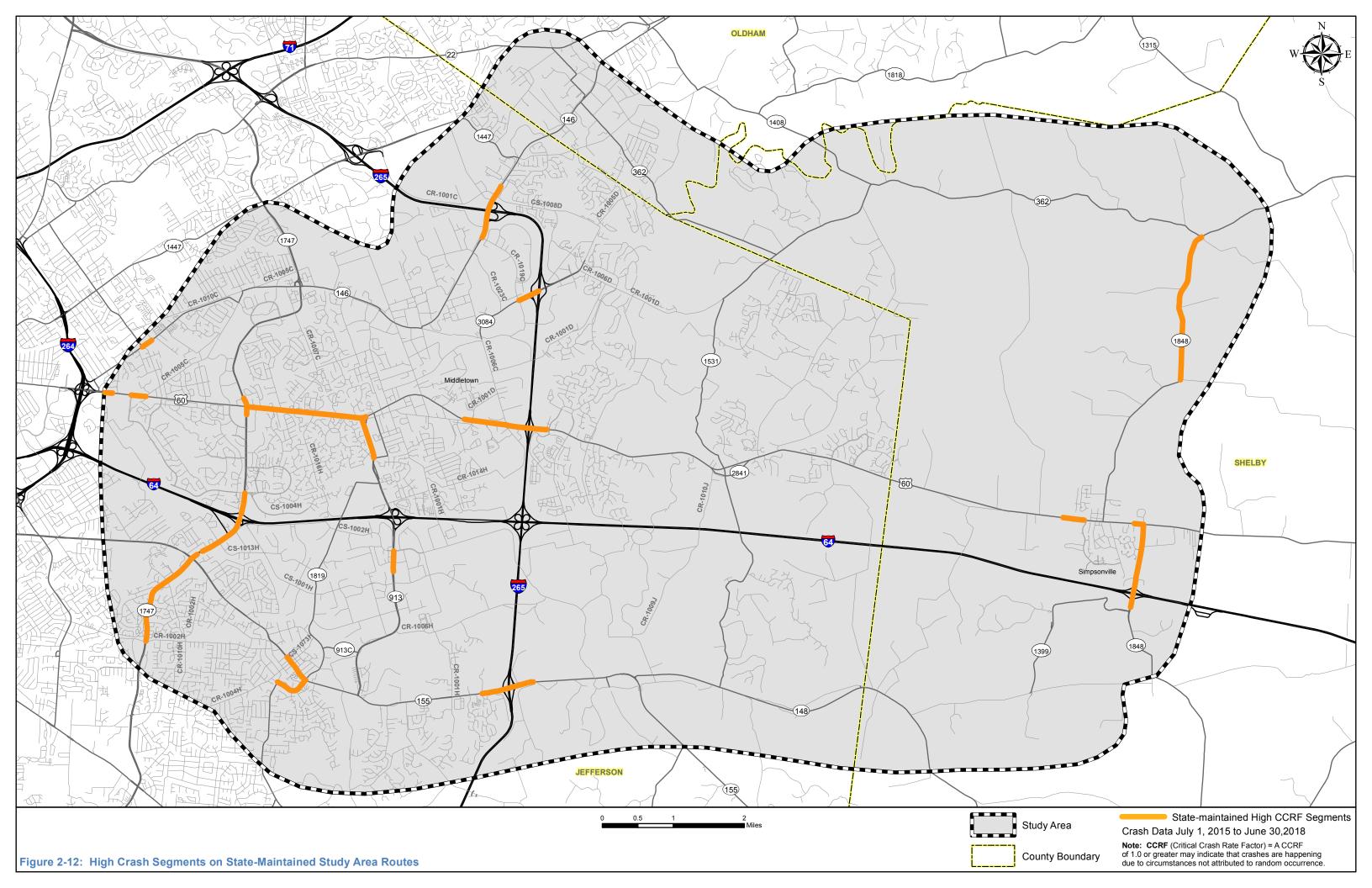
**Table 2-7** lists state-maintained study routes with segments having CCRFs equaling 1.0 or higher and gives the total number of segments on those routes that fall into this category. Locations of high CCRF segments are shown in **Figure 2-12**. The highest concentrations of high CCRF segments are found on US 60 and KY 1747 with 34 and 25 identified segments, respectively.

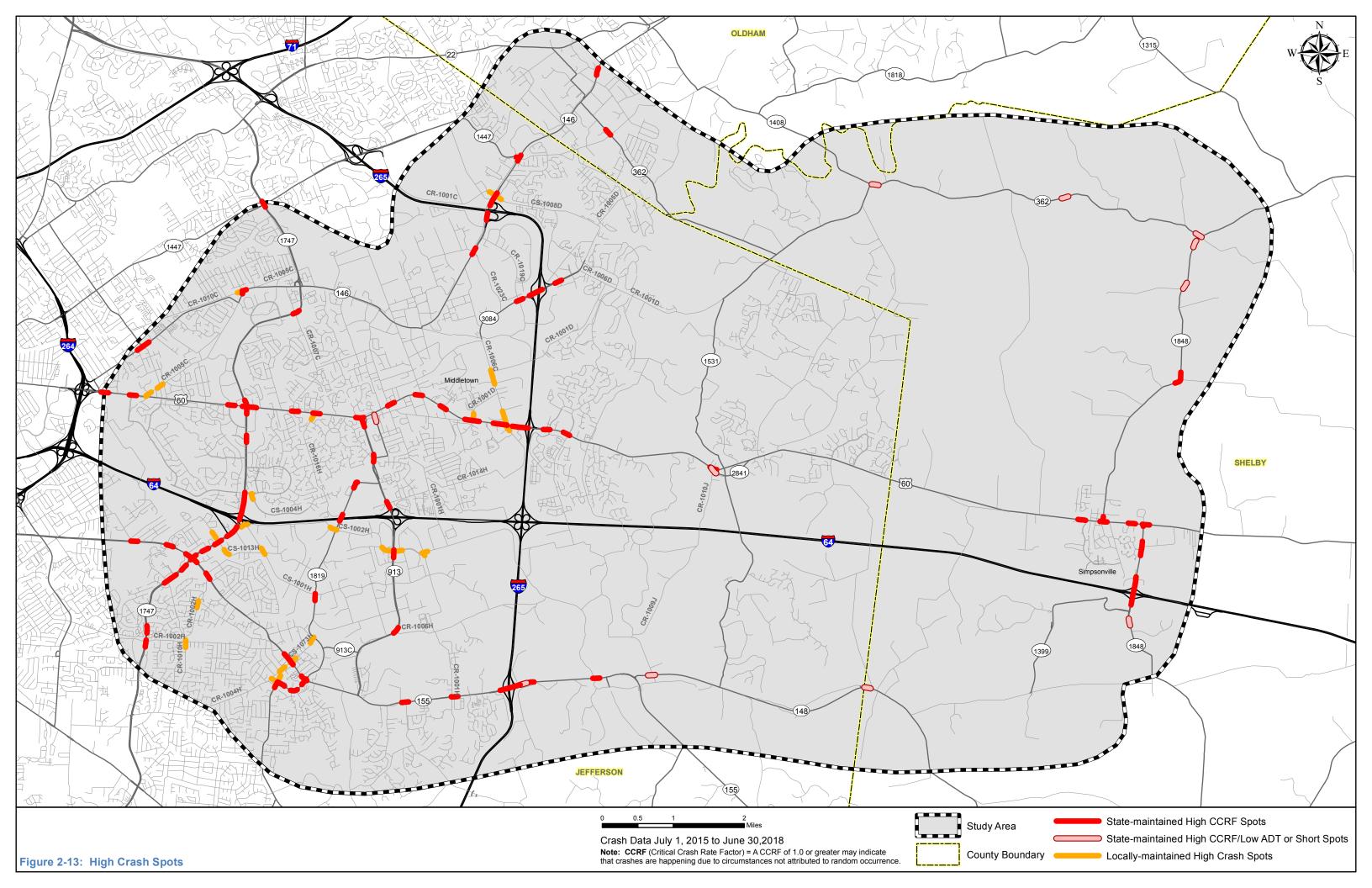
Table 2-7: Number of High CCRF Segments on State Maintained Study Routes

Route	County	BEG MP	END MP	Length (mi)	Total Crashes	High CCRF Segments
US 60	Jefferson	5.850	17.375	11.525	2,303	28
03 00	Shelby	0.000	4.450	4.450	103	6
KY 146	Jefferson	0.636	8.825	8.189	539	11
K1 140	Oldham	0.000	1.343	1.343	73	1
KY 148	Jefferson	0.000	3.394	3.394	20	1
N1 140	Shelby	0.000	1.675	1.675	19	1
KY 155	Jefferson	3.051	12.700	9.688	1,182	19
KV 262	Oldham	0.000	3.039	3.039	29	1
KY 362	Shelby	0.000	8.399	8.399	42	2
KY 913	Jefferson	0.000	4.337	4.337	526	7
KY 1447	Jefferson	8.161	9.242	1.081	70	1
KY 1747	Jefferson	9.200	17.040	7.840	2,008	25
KY 1819	Jefferson	7.546	13.624	6.078	362	10
KY 1848	Shelby	3.717	10.591	6.874	201	18
KY 2841	Jefferson	0.000	0.643	0.643	8	2
KY 3084	Jefferson	0.000	1.978	1.978	129	5

Spot level crash analysis was calculated using the same procedure as used to calculated segment CCRFs, adjusting length calculations to reflect 0.1-mile lengths. State-maintained roadway high crash spots are shown on **Figure 2-13 (p.22)**.

Clusters of reported crashes along city- and county-owned study routes were identified visually from TED and Kentucky State Police data although a formal CCRF analysis was not completed. Potentially high crash clusters on city/county study routes are shown on **Figure 2-13** as well.





#### 3.0 PREVIOUS PROJECTS AND STUDIES

To understand the rich context of transportation planning within the study area, a series of documents and datasets were reviewed. The intent was to develop a comprehensive set of transportation projects previously identified within the study area footprint.

#### 3.1 Regional Planning/Programming Documents

The following regional/statewide documents were reviewed.

- **1.** <u>Kentucky's FY 2018–FY 2024 Highway Plan</u>, the legislatively authorized biennial budget for transportation projects, supplemented by <u>2018 SHIFT North Region Scores</u> that fed the statewide prioritization process. The current highway plan identifies 11 safety/capacity projects along study routes:
  - Item #5-353: Widen North English Station Road from two to three lanes (3rd lane will be a center turn lane) from Aiken Road to Avoca Road.
  - Item #5-367.2: Extension of Old Henry Road (KY 3084) east to Ash Avenue (KY 362).
  - Item #5-518: Widen Watterson Trail from two to three lanes from Ruckriegel Parkway to Maple Road, and widen Watterson Trail from two to three lanes from Old Taylorsville Road to Ruckriegel Parkway.
     Project to include streetscape enhancements to improve the corridor.
  - Item #5-555: Planning study to reduce congestion and improve safety along KY 1747 (Hurstbourne Parkway) from Stony Brook Drive to I-64.
  - Item #5-808: Safety Project for reconstruction of Taylorsville Road and South Pope Lick Road Intersection and bridge over Pope Lick Creek.
  - Item #5-8203: Reconstruct Billtown Road from north of Colonnades Place to south of Easum Road.
  - Item #5-8908: Widen Taylorsville Road to three lanes from I-265 to KY 148.
  - Item #5-8952: Widen US 60 to three lanes from Eastwood Cutoff (MP 14.7) to Rockcrest Way (MP 15.1).
  - Item #5-80000: New Interchange with Eastwood Fisherville Connector to I-64.
  - Item #5-80001: Widen US 60 to six lanes from Old Shelbyville Rd. to North English Station Rd.
  - Item #5-80003: Extend Plantside Drive from Rehl Road to Taylorsville Road.
- 2. <u>Kentucky's FY 2016–FY 2022 Highway Plan</u>, which was superseded by the subsequent highway plan but contains a history of project concepts in various stages of development. A few additional concepts were identified that do not appear in the latest Highway Plan:
  - Item #5-344.01: Widen Southbound Hurstbourne Lane to three lanes from Linn Station Rd (CS-1004H) to Eden Ave.
  - Item #5-8905: Extend the left turn lane on Hurstbourne Lane at intersection with Six Mile Lane.
  - Item #5-8953: Improve Hurstbourne Parkway (KY 1747) at Shelbyville Road (US 60) intersection to increase capacity, reduce delays, and improve safety.
- **3.** Continuous Highway Analysis Framework (CHAF) Project Identification Forms (PIF), representing identified needs and improvement concepts monitored by KYTC. District 5 provided 39 CHAF PIFs within the study area. See **Chapter 4.0** for additional details; forms are included as **Appendix C**.

- **4. KIPDA's Metropolitan Transportation Plan (MTP)**, <u>Horizon 2035</u>, the fiscally constrained planning document that reflects all KIPDA's anticipated surface transportation investments through 2035 in the five-county Louisville metropolitan planning area. KIPDA files show 72 projects wholly or partially within the study area, several of which are transit or bicycle/pedestrian projects beyond the scope of this study.
- **5. Shelby County's 2015–2040 Comprehensive Plan**, intended to guide future community growth and development. Five proposed capacity/safety improvements within the Simpsonville area are included in the county's comprehensive plan:
  - Project 24, a new connector between KY 1848 and KY 55, parallel to and north of I-64.
  - Project 26, a new connector between KY 1848 and Webb Road, providing an alternate link to US 60 northwest of town.
  - Project 29, improve and widen KY 1848 approximately 3,100 feet north from Grand Central Drive (north of town).
  - Project 30, improve and widen KY 1848 from KY 1399 to Hunters Point Place (south of town).
  - Project 31, a new connector between KY 1848 and KY 1399, south of town.
- **6.** <u>Cornerstone 2020</u>, in which the Louisville/Jefferson County Planning Commission defined their community vision for community forms, mobility, livability, and more in their year 2000 comprehensive plan.

#### 3.2 Corridor and Small Area Plans

Additionally, project-specific planning studies were also reviewed:

- 1. <u>I-265 Programming Study</u> (2015). KYTC identified improvements along I-265, its interchanges, and cross-streets, prioritizing improvements by section based on traffic and safety data, public input, and likely impacts. Improvements covered mainline I-265 widening and technology deployments, plus 25 other projects for further study (e.g., interchange improvements, added capacity at cross-streets, improved traffic control, etc.). Within the study area, recommended improvements were identified at the KY 155, I-64, KY 3084, and KY 146 interchanges plus a new interchange at CR-1006H (Rehl Road).
- **2.** Rehl Road/I-265 Interchange Feasibility Study (2009). KYTC evaluated the feasibility of a new interchange linking I-265 and Rehl Road. Accommodating anticipated industrial growth here is a challenge; the city identified the interchange as a top priority with substantial economic benefits for the area.
- 3. <u>I-64 Interchange and New Connector Alternatives Study</u> (2008). KYTC investigated a new I-64 interchange in the vicinity of CR-1010J (Gilliland Road) and a new north-south connector between KY 155 (Taylorsville Road) and US 60 (Shelbyville Road). The area has experienced significant growth in recent decades, rapidly transitioning from rural residential to suburban neighborhoods. The study recommends preliminary engineering to develop alternatives within the western corridor studied, with rural and urban sections, plus bicycle/pedestrian facilities.
- **4.** Taylorsville Road Scoping Study (2007). KYTC examined traffic, access, and safety issues along KY 155 from Jeffersontown to the KY 148 intersection to develop low-cost, short-term improvements and larger, long-term capacity solutions. Following an inventory of existing conditions and outreach with local stakeholders, the study recommended five relatively small-scale operational improvements plus reconstructing the highway with four lanes, curb/gutter, sidewalk, and a multi-use path.

- **5.** <u>Billtown Road Scoping Study</u> (2007). KYTC considered low-cost, short-term solutions and broader alternatives to improve corridor-wide capacity and operations along Billtown Road from Jeffersontown to I-265. The corridor operated at LOS E at the time of the analysis and is expected to degrade to LOS E-F as traffic growth continues. In addition to ten short-term improvements, widening the entire corridor to three lanes with sidewalks was recommended.
- **6.** <u>Top 40 High Crash Intersections</u> (2015). KIPDA published their top 40 high-crash intersections in Jefferson and Bullitt counties. Two segments were within the study area limits:
  - KY 1747 (Hurstbourne Parkway) from KY 155 (Taylorsville Road) to the I-64 off-ramp / Bluegrass Parkway, with the intersection at either end flagged as top 40 intersections.
  - US 60 (Shelbyville Road) from KY 1747 (Hurstbourne Parkway) to Dorsey Lane / Blue Ridge Manor.
- **7. South Floyd's Fork Vision** (2019 Draft). Concurrent with this Middletown to Simpsonville Needs Analysis Study, Floyd's Fork advocates are developing a master plan for the area roughly bounded by US 60, I-265, US 150, and the county line. The draft plan acknowledges the need for improved roadways, emphasizing multi-modal connections, low speeds, and natural landscaping.
- **8.** <u>Eastern Thoroughfare Plan</u> (2008). Louisville Metro undertook this study to identify and plan for short-, medium-, and long-term needs in the Floyd's Fork area of eastern Jefferson County. Network improvements are recommended: a three-lane collector east of I-265, a three to five lane arterial with an I-64 interchange, and supporting scenic connections between.
- **9.** <u>Taylorsville Road Area/Urton Lane Study</u> (2007). Louisville Metro examined land use forms and the proposed extension of Urton Lane, including coordination with local officials and the public. Improved access control along KY 155—eliminating left turns from cross-streets—is recommended.
- **10.** <u>Jeffersontown Transportation Study</u> (2007). To support downtown revitalization efforts, the city assessed its roadway system to identify mobility enhancements. The study identified high priority, medium priority, and long-term improvements to parking, streetscaping, signals, pedestrian facilities, and local streets.

#### 4.0 STAGE 1 GAP ANALYSIS

As part of the initial scoping process, KYTC District 5 personnel provided a list of study area projects previously identified (Table 4-1), forming the foundation for the Build scenario improvements. To supplement these 40 projects, analysts overlaid existing conditions information (Chapter 2.0) with the list of other previously identified project concepts (Chapter 3.0) to identify gaps in the system where improvements should be considered based on congested traffic operations, high crash frequencies, and related data. Nineteen safety/capacity improvement projects were compiled with potential for Stage 1 evaluation, shown on Figure 4-1 (p.26).

Table 4-1: KYTC District 5 Scoped Projects for Stage 1 Evaluation

Project ID	Location	Type of Work
CHAF IP20080234	Tucker Station Road CR-1001H MP 1.079-3.538	Reconstruction (no additional lanes)
CHAF IP20110077	S English Station Road CR-1002J MP 2.950-3.900	Reconstruction (no additional lanes)
Item #5-353.00 CHAF IP20170032	N English Station Road CR-1006C MP 0.457-1.232	Minor Widening (add center turn lane)
CHAF IP20080232	Rehl Road CR-1006H MP 0.000-2.255	Reconstruction (no additional lanes)
CHAF IP20080227	Ellingsworth Lane CS-1030H MP 0.000-0.607	Extend/widen Ellingsworth Lane (add center turn lane), KY 913 to Urton Ln
CHAF IP20080239 <sup>B</sup>	New Route	Extend Plantside Drive (three lanes), Tucker Station Rd to Rehl Rd
CHAF IP20080242	Blowing Tree Boulevard CS-1163H MP 0.000-0.459	Extend/widen Blowing Tree Blvd (three lanes), KY 155 to Bunsen Pkwy
CHAF IP20080192	Gene Snyder I-265 MP 24.000-24.600	New Interchange at Rehl Road
Item #5-558.00 CHAF IP20150080	Gene Snyder I-265 MP 17.300-23.100	Major Widening
Item #5-549.00/.01 CHAF IP20150184	Gene Snyder I-265 MP 24.600-26.400	Reconstruct I-64/I-265 Interchange
Item #5-537.00/.01/.02 CHAF IP20160174	Gene Snyder I-265 MP 23.409-34.727	Major Widening
Item #5-80000.00 CHAF IP20150139	I-64 MP 21.000-22.000	New Interchange at Eastwood/Fisherville
CHAF IP20080200	LaGrange Road KY 146 MP 6.964-8.251	Major Widening (five lanes)
CHAF IP20080215	Johnson Road KY 1531 MP 9.100-11.900	Reconstruction (no additional lanes)
CHAF IP20080201	Taylorsville Road KY 155 MP 6.300-9.350	Major Widening (five lanes)
Item #5-8908.00 CHAF IP20080202	Taylorsville Road KY 155 MP 4.400-5.750	Minor Widening (add center turn lane)
CHAF IP20080203	Taylorsville Road KY 155 MP 11.395-13.314	Major Widening (six lanes)
Item #5-808.00	Taylorsville Road KY 155	Safety/Hazard Elimination
CHAF IP20130147	MP 4.400-5.000	(intersection/bridge)
Item #5-8953 CHAF IP20080218	Hurstbourne Pkwy KY 1747 MP 13.400-13.600	Intersection Improvements

Project ID	Location	Type of Work
Item #5-555.00	Hurstbourne Pkwy KY 1747	Congestion Management
CHAF IP20130135	MP 10.500-11.995	
Item #5-344.01	Hurstbourne Pkwy KY 1747	Reconstruction (add center turn lane)
CHAF IP20150293	MP 12.289-13.362	
Item #5-8905.00	Hurstbourne Pkwy KY 1747	Safety/Hazard Elimination (extend turn lane)
CHAF IP20160184	MP 9.483-9.583	
CHAF IP20110073	New Route	Bunsen Blvd/Christian Way Connector (five lanes)
CHAF IP20080219	Billtown Road KY 1819 MP 5.300-8.900	Minor Widening
Item #5-373	Watterson Trail KY 1819	Major Widening
CHAF IP20150319	MP 10.795-12.811	
Item #5-8203.00	Billtown Road KY 1819	Reconstruction of three intersections
CHAF IP20160185	MP 6.900-8.100	
Item #5-80003.00	New Route	Extend Plantside Drive, Rehl Rd to KY 155
CHAF IP20170096		
CHAF IP20120002	New Route	Extend Urton Lane (three lanes), north of I-64
		to Seatonville Rd
CHAF IP20080196	Shelbyville Road US 60	Major Widening
	MP 5.529-7.857	
CHAF IP20080197	Shelbyville Road US 60	Major Widening
	MP 7.857-11.093	
CHAF IP20110074	New Route	Bowling Blvd/Christian Way Connector (five
		lanes)
Item #5-8952.00	Shelbyville Road US 60	Minor Widening and Intersection
CHAF IP20160176	MP 14.718-15.114	Improvements
Item #5-80001.00	Shelbyville Road US 60	Major Widening (six lanes)
CHAF IP20180043	MP 11.093-11.684	
Item #5-80002.00 <sup>c</sup>	I-64 MP 21.000-22.000	New Interchange east of I-265
CHAF IP20080252	LaGrange Road KY 146	Reconstruction
U UE 276 00	MP 0.000-2.021°	
Item #5-376.00	New Route <sup>o</sup>	Connector from Old Henry Rd Interchange to
CHAF IP20110079	No. Doube	KY 22
Item #5-367.20/.21	New Route <sup>0</sup>	Extend Old Henry Rd to Ash Ave
CHAF IP20160276	Ash Ava KV 262 MAD 0 075 2 0200	Cafab./Harand Flinsinghian
CHAF IP20130132	Ash Ave KY 362 MP 0.975-3.039 <sup>o</sup>	Safety/Hazard Elimination
Item #5-41.10	Gene Snyder I-265	Reconstruct I-265/US 60 Interchange
CHAF IP20150185	MP 26.500-27.100	Mineral Milder diversion of adults and the second of the s
CHAF IP20080214	Westport Road KY 1447	Minor Widening (add center turn lane)
	MP 7.500-9.240	

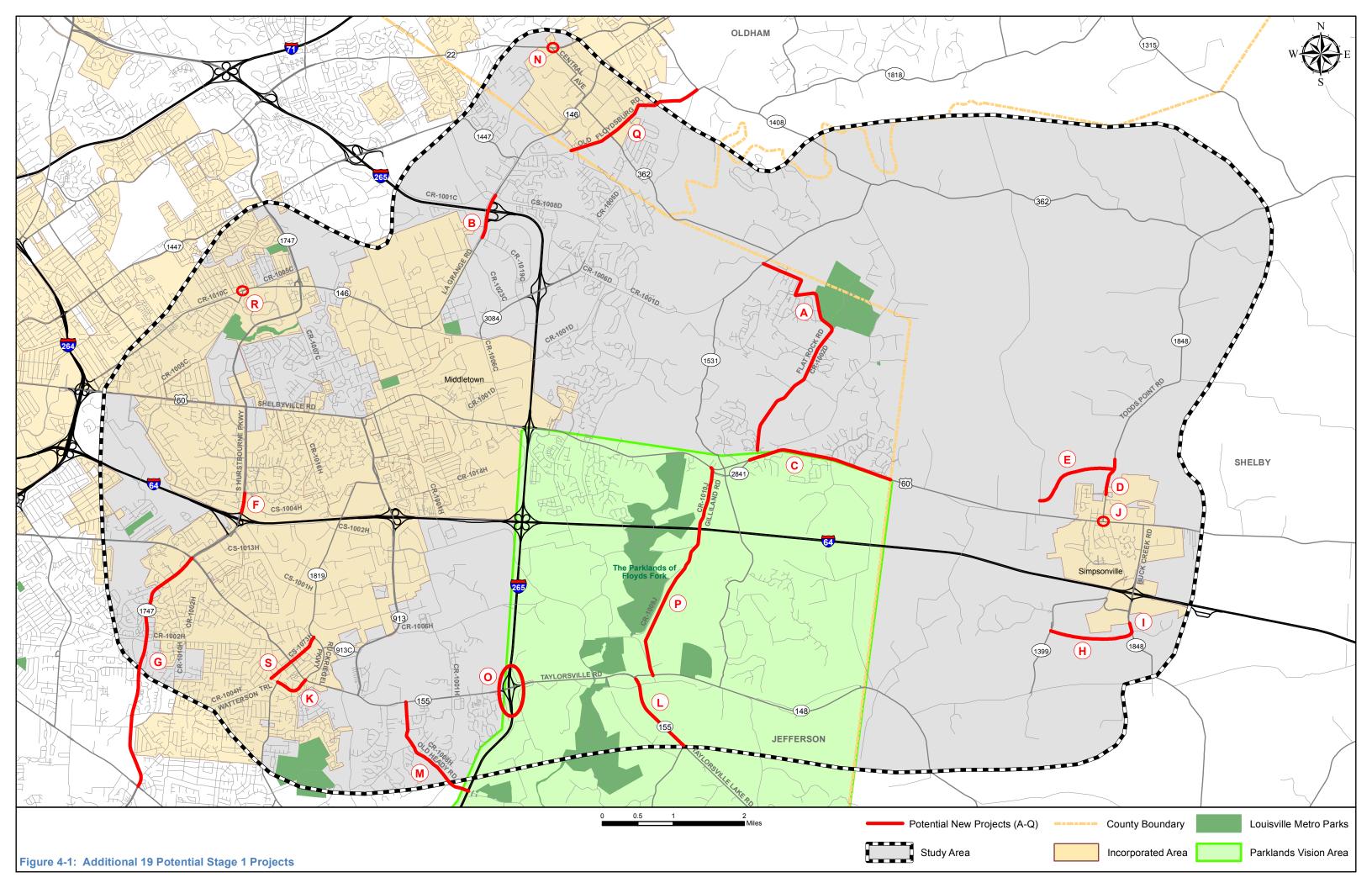
O Denotes Oldham County MP limits; otherwise projects are within Jefferson County



US 60 at Eastwood Cutoff Road

<sup>&</sup>lt;sup>B</sup> Subsequently combined with CHAF IP20170096

<sup>&</sup>lt;sup>c</sup> Subsequently combined with CHAF IP20150139



## 4.1 First Project Team Meeting

The first project team meeting was held December 3, 2018, at KYTC District 5 to discuss existing conditions in the study area and identify up to ten additional improvements from the gap analysis for inclusion in the prioritization matrix. The meeting summary is included in **Appendix D**. Ten of nineteen additional improvements were selected to add to the Stage 1 evaluation, listed in **Table 4-2**.

**Table 4-2: Additional Projects for Stage 1 Evaluation** 

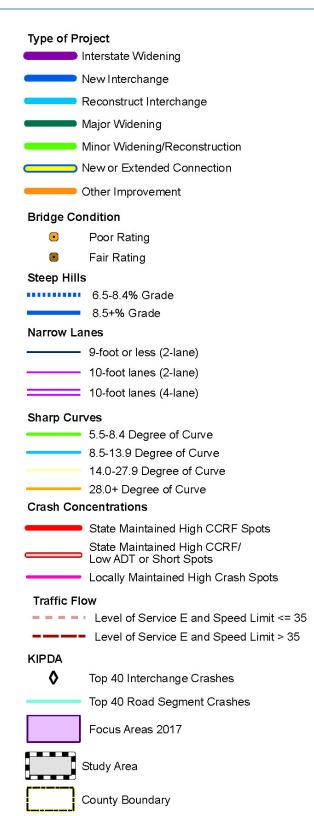
Project ID(s)	Location	Type of Work
Concept A KIPDA MTP #1323	CR-1002D (Flat Rock Rd) MP 0.000–3.848	Minor Widening, US 60 to KY 1531
Concept C CHAF IP20080198	US 60 (Shelbyville Rd) MP 15.114–17.375	US 60 Widening, Rockcrest to county line (add center turn lane)
Concept D	KY 1848 (Todds Point Rd) MP 6.418-7.005	KY 1848 Minor Widening, North of Simpsonville
Concept G CHAF IP20080217	KY 1747 (Hurstbourne Pkwy) MP 7.489–11.033	KY 1747 Safety improvements, US 31E to KY 155.
Concept L	KY 155 (Taylorsville Rd) MP 3.00–4.200	KY 155 Major Widening, KY 148 to KY 1531, Fisherville (four lanes)
Concept M KIPDA MTP #1325	CR-1008H (Old Heady Rd) MP 0.000-1.376	Widening, KY 155 to Chenoweth Run (with center turn lane)
Concept N	KY 22 (Ballardsville Rd) MP 1.825 / KY 362 (Central Ave) MP 0.000	Intersection Improvements
Concept O	I-265 (Gene Snyder Freeway) / KY 155 (Taylorsville Rd) Interchange	O: Reconstruct Interchange O2: Improve Safety and Mobility (add second eastbound left lane)
Concept P <sup>A</sup> KIPDA MTP #390	New Route	New connector generally following Echo Trail, paired with new I-64 interchange serving Eastwood/Fisherville area
Concept R	KY 146 (LaGrange Rd) / CR-1005C (Whipps Mill Road)	Intersection Improvements

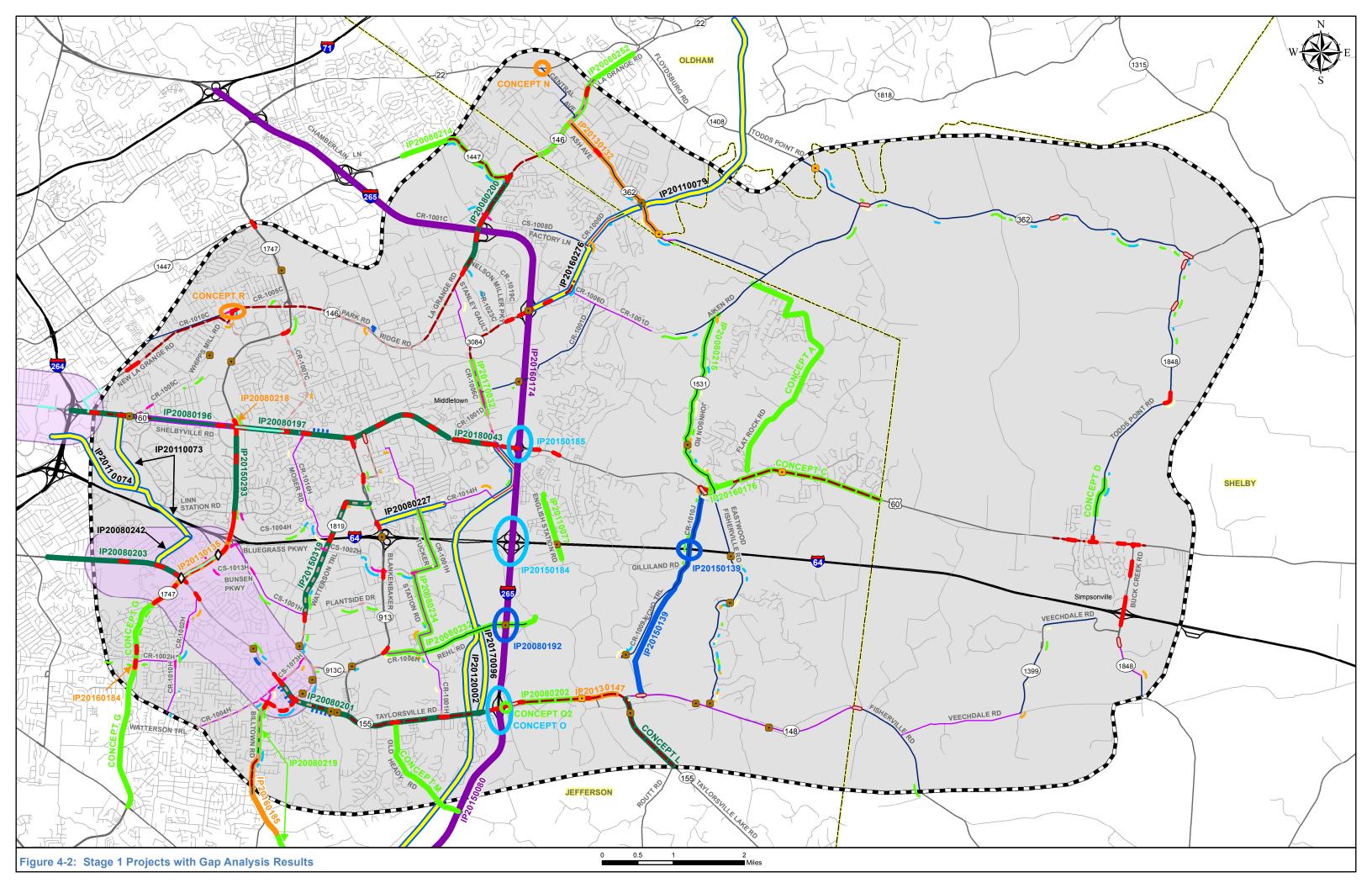
A Subsequently combined with CHAF IP20150139

**Figure 4-2** shows the 49 Stage 1 projects geographically, overlaid on the key findings of the gap analysis. Due to space limitations, the legend corresponding to the **Figure 4-2** map is presented at right.



Recently reconstructed US 60 (Shelbyville Road) / Flat Rock Road intersection





# 5.0 COMPARISON OF STAGE 1 PROJECTS

As described in the previous chapter, 48 projects were identified for inclusion in the Stage 1 evaluation.

## 5.1 Stage 1 Matrix

The following subsections explain the scope of the analyses, summarized in the matrix (**Figure 5-4**, **p. 34+**) following this introductory text. Data were intended to assist KYTC District 5 personnel in prioritizing improvements as the 2020 SHIFT cycle approached its sponsorship phase in February 2019. **Figure 5-1** contains a template of the matrix format, including a hypothetical example project to illustrate information included for Stage 1 projects.

Project sheets for all Stage 1 projects, organized by CHAF PIF numbers followed by concept letters, are included following the matrix (**p. 39+**). Sheets are arranged alphanumerically by CHAF PIF name. Each sheet contains a stand-alone project description, providing a concise overview of transportation needs. Project location maps and phase costs are also included for easy reference.

### 5.1.1 Background Project Information

The first portion of the matrix, noted with a red 1 in **Figure 5-1**, contains background information about the proposed project: the relevant KYTC or KIPDA identifiers, project location with beginning mile point (BMP) and ending mile point (EMP) designations, and a description of the improvement from its corresponding CHAF PIF.

The next columns, noted with a blue 2 in **Figure 5-1**, contain additional supporting information. This includes a conceptual description of the planned improvement assumed in build traffic analyses and development of preliminary cost estimates. The "Other Notes" field provides a description of how the project ranked in the 2018 SHIFT prioritization process, prioritization information from other planning efforts, or other miscellaneous supporting information about the importance of the improvement.

## 5.1.2 Existing and No-Build Traffic

The central portion of the matrix, noted with a purple 3 in **Figure 5-1**, describes 2018 existing and 2040 No-Build future traffic, as discussed in **Section 2.3**. Presented information includes existing ADT and truck percentages from recent counts, future No-Build ADT projections from the statewide travel demand model, plus LOS and v/c operational measures for both scenarios. The matrix highlights any segments operating at LOS E/F or with a v/c ratio  $\ge 0.8$  in red text to emphasize these as potential priorities based on congested peak hour traffic operations. A v/c ratio  $\ge 0.8$  is approaching capacity; a more detailed intersection-level analysis is likely to show locations at or above capacity within the larger segment.

One additional factor, "Delay" is added beyond data presented in **Chapter 2.0**. GIS-based delay data was provided by KYTC staff as a preliminary input describing congestion for the 2020 SHIFT process, built on 2015-2017 speed data acquired from HERE Technologies. Vehicle Hours of Delay (VHD) represents the excess time spent on a trip compared to what would be required in uncongested conditions. It represents total delay experienced by all vehicles traveling on a section of highway during the analysis period, divided into five categories:

- Low (L), representing less than 1,000 vehicle-hours of delay during an average daytime weekday (6 AM—8 PM)
- Medium-Low (ML), representing 1,000 to 2,500 vehicle-hours
- Medium (M), representing 2,500 to 5,000 vehicle-hours
- Medium-High (MH), representing 5,000 to 10,000 vehicle-hours
- High (H), representing over 10,000 vehicle-hours

The matrix highlights any section with a Medium-High or High rating as red text to emphasize these as potential priorities. For large projects containing all five categories, additional information describes the extents categorized as Medium-High and High.

**Figure 5-2 (p. 30)** presents VHD data within the study area limits. As expected, the greatest delays are concentrated near high volume congested interchanges: I-265 at I-64 and KY 3084, I-64 east of KY 913, KY 1747 near I-64, and along US 60.

### 5.1.3 Historic Crash Data

Noted with a green 4 in **Figure 5-1**, the next portion of the matrix describes crashes and high CCRF spots/segments within the limits of each Stage 1 project, using the data described in **Section 2.4**. Reported crashes during July 2015 through June 2018 are presented, also broken down by severity into fatal (F), injury (I), and property damage only (PDO) collisions. The total number of high CCRF spots and segments within the project limits are included, highlighting locations with more than one high CCRF spot/segment in red text.

The next column, noted with a gray 5 in **Figure 5-1**, represents Excess Expected Crashes (EEC). KTC developed a new methodology based on the Highway Safety Manual (HSM) to rank safety needs of projects included in the 2020 SHIFT process. EEC is based on a crash prediction model estimating the number of crashes expected on an average roadway segment of that type and length. It suggests the number of excess crashes a segment is experiencing compared to others of its type. GIS-based data is measured for both segments and intersections. Legend categories break the data into quartiles, categorizing sites as Minimal, Low, Medium, or High. The matrix lists the length of segments and intersections with a positive EEC (any category). The matrix highlights as red text any High crash areas exceeding the median value for its roadway type.

Study area EEC values are shown on **Figure 5-3 (p. 31)**. The highest concentrations in the study area are found along KY 1747: at the I-64 westbound ramp terminal (215 additional crashes, the highest intersection in the entire database), at the intersection with CS-1013H (Bunsen Parkway, 83 crashes), and at the intersection with KY 155 (Taylorsville Road, 79 crashes).

## 5.1.4 Substandard Geometry

The results of the HIS data review described in **Sections 2.1** and **2.2** are included in the next column of the matrix, noted with a yellow 6 in **Figure 5-1**. The column identifies any substandard roadway design features (i.e., narrow lane widths, steep grades, sharp curves, or poor condition bridges) within each project's limits.

Guide to interpreting the Matrix:

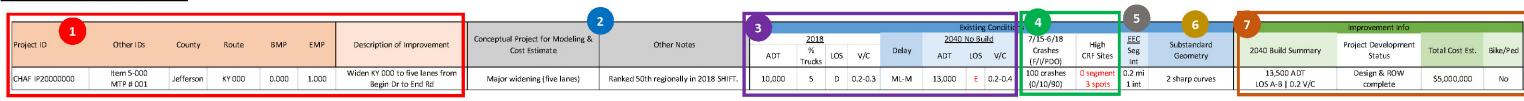
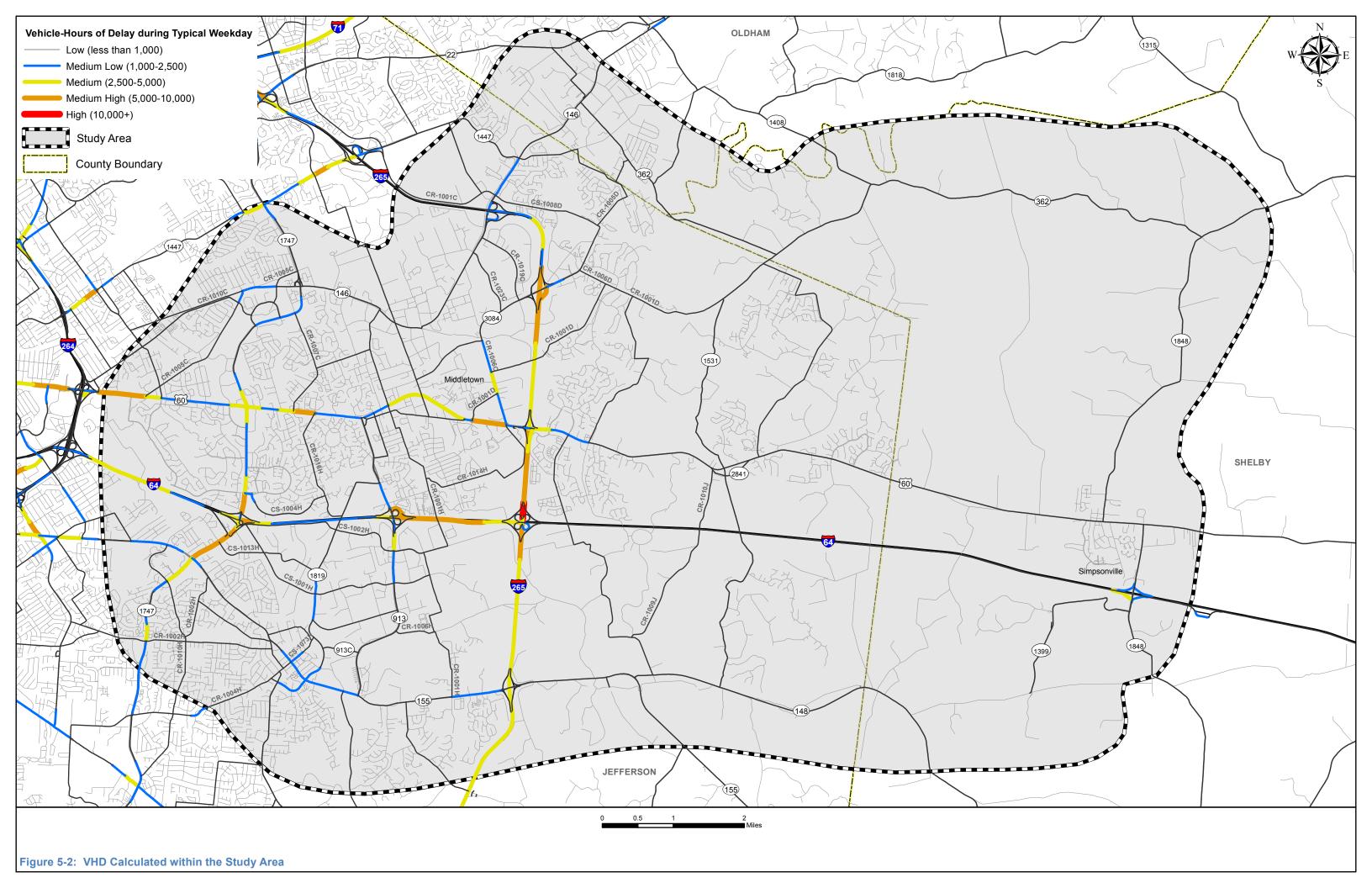
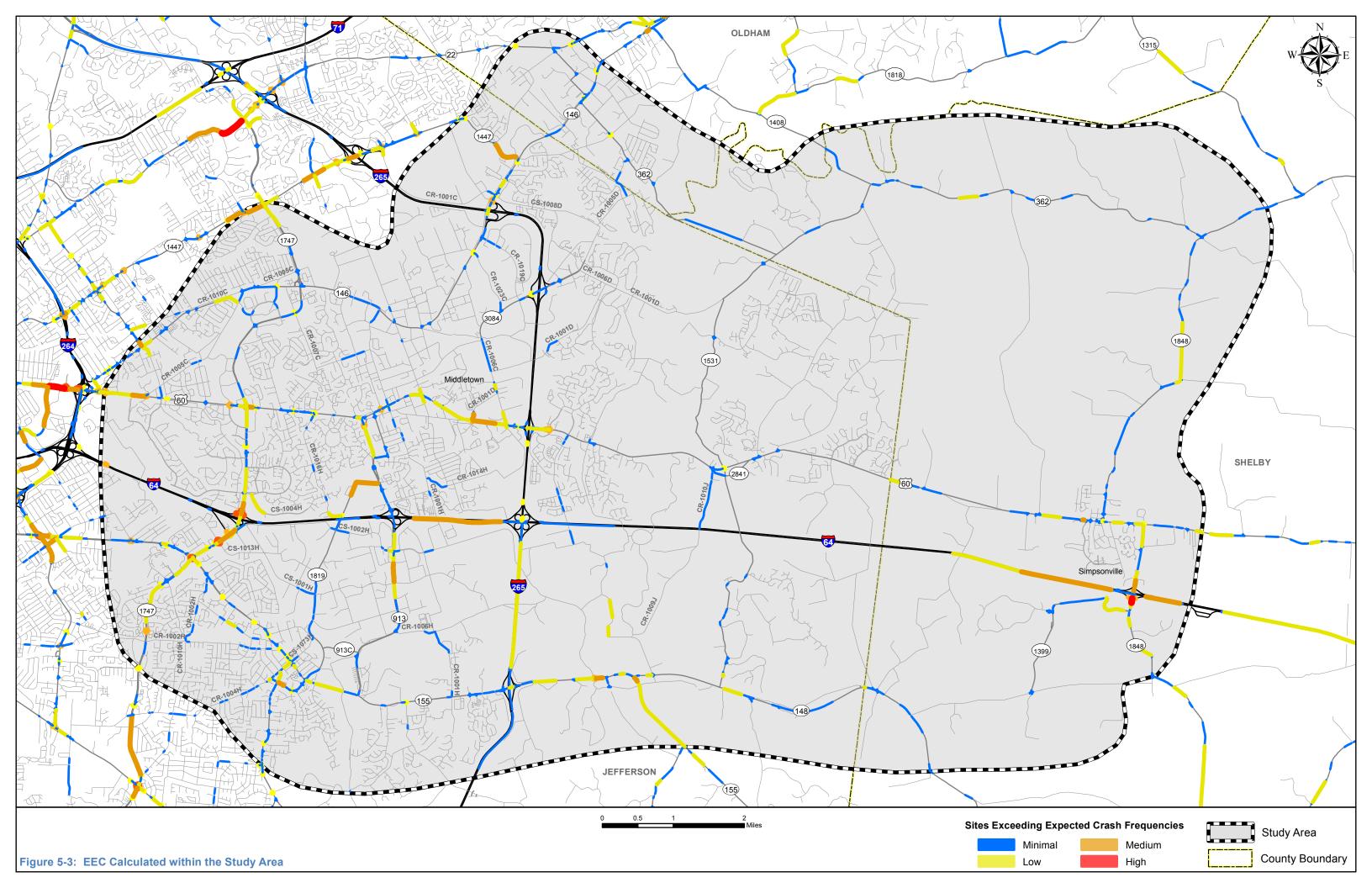


Figure 5-1: Guide to Data Headings in Stage 1 Matrix





### 5.1.5 Improvement Information

The final section of the matrix, noted with an orange 7 in **Figure 5-1**, describes the Build condition, assuming the proposed project is implemented. It includes traffic impacts, project development activities, costs, and bicycle/pedestrian considerations.

The "Project Development Status" column shows whether KYTC has invested in any previous project development efforts, including design, right-of-way (ROW) acquisition, utility relocations, or construction.

The "Bike/Ped" column identifies whether accommodations for bicyclists and pedestrians have been identified for consideration for inclusion into the improvement, based on the CHAF database and/or approved local bicycle and pedestrian plans.

### 2040 Build Traffic

The "2040 Build Summary" column describes future traffic impacts. Each large-scale build scenario was modeled independently. This means the cumulative impact on regional traffic flows from multiple projects are not evaluated. That is, widening I-265 to six lanes (CHAF IP20160174) is likely to influence future traffic volumes/operations using the I-265 / I-64 interchange (CHAF 20150184) but this study does not quantify those impacts. Each project is treated as a standalone concept since SHIFT evaluates each independently.

Build traffic reports one of two metrics for these large-scale projects.

- For existing route improvements, ADT, LOS, and v/c are presented, assuming the improvement is built.
- For interstates or projects on new alignment, ADT, Vehicles Hours Traveled (VHT), and Vehicle Miles Traveled (VMT) are presented. VHT equates to the regional time savings network-wide over a 24-hour period; for example, -100 VHT means 100 fewer hours spent sitting in congestion every day if the project is built, divided between all the drivers on all the routes influenced by the project. VMT represents the total distance driven by all motorists; the model assumes drivers will choose whichever route provides the shortest travel time, even if it is a longer path. For example, +100 VMT means 100 extra miles would be driven if the project were built, divided between all the drivers on all the routes influenced by the project.

As noted in the matrix, three projects were not run within the statewide model. Located near the western limit of the study area, the statewide model does not contain adequate coverage in the vicinity to estimate impacts from the proposed new local routes. Results are presented in **Figure 5-4** from the KIPDA model instead. While the values are not directly comparable to other build scenarios evaluated with the statewide model, they are included to provide scale of reference. The three projects in question are in the Oxmoor vicinity near the western limit of the study area: CHAF IP20080242 Blowing Tree Boulevard extension, CHAF IP20110073 Bunsen Boulevard to Christian Way Connector, and CHAF IP20110074 Bowling Boulevard to Christian Way Connector.

Small-scale projects (e.g., intersection improvements and hazard elimination/safety projects) would result in minimal operational changes and were not input into the model as they represent a finer level of detail than the model is built to approximate.

### **Cost Estimates**

Planning-level cost estimates were prepared for all remaining project development phases: design, ROW, utilities, and construction. Where available, costs were incorporated from CHAF PIF or earlier planning studies, adjusted to current year dollars as needed using KYTC's 2017 construction cost index, inflated to 2019 and rounded. For new project concepts, construction costs were estimated based on planning-level

quantities for pavement, structures, earthwork, etc. KYTC District 5 staff provided necessary ROW and utility estimates. Remaining costs by phase are summarized—with project IDs in numerical order—in **Table 5-1**.

Table 5-1: Cost Estimates by Phase for Remaining Project Development Activities (2019 Dollars)

Project ID	Planning	Design	ROW	Utilities	Construction	Total
CHAF IP20080192	\$470,000	\$2,780,000	\$1,390,000	\$580,000	\$31,360,000	\$36,580,000
CHAF IP20080196	\$240,000	\$1,970,000	\$1,050,000	\$470,000	\$23,160,000	\$26,890,000
CHAF IP20080197	\$0	\$3,500,000	\$6,245,000	\$10,408,000	\$34,730,000	\$54,883,000
CHAF IP20080200	\$0	\$1,500,000	\$500,000	\$500,000	\$12,000,000	\$14,500,000
CHAF IP20080201	\$0	\$1,800,000	\$2,000,000	\$2,500,000	\$18,000,000	\$24,300,000
CHAF IP20080202	\$915,000	\$1,495,000	\$1,000,000	\$500,000	\$15,930,000	\$19,840,000
CHAF IP20080203	\$0	\$1,200,000	\$750,000	\$1,500,000	\$12,000,000	\$15,450,000
CHAF IP20080214	\$0	\$470,000	\$240,000	\$120,000	\$4,640,000	\$5,470,000
CHAF IP20080215	\$0	\$930,000	\$470,000	\$240,000	\$10,190,000	\$11,830,000
CHAF IP20080218	\$0	Authorized	\$750,000	\$1,040,000	\$2,600,000	\$4,390,000
CHAF IP20080219	\$240,000	\$2,090,000	\$1,160,000	\$470,000	\$23,160,000	\$27,120,000
CHAF IP20080227	\$0	\$350,000	\$240,000	\$120,000	\$3,710,000	\$4,420,000
CHAF IP20080232	\$0	\$930,000	\$470,000	\$240,000	\$10,420,000	\$12,060,000
CHAF IP20080234	\$0	\$930,000	\$470,000	\$240,000	\$10,240,000	\$11,880,000
CHAF IP20080242	\$0	\$500,000	\$450,000	\$580,000	\$3,000,000	\$4,530,000
CHAF IP20080252	\$250,000	\$1,500,000	\$500,000	\$500,000	\$12,000,000	\$14,750,000
CHAF IP20110073	\$0	\$2,250,000	\$560,000	\$370,000	\$20,260,000	\$23,440,000
CHAF IP20110074	\$0	\$2,000,000	\$860,000	\$890,000	\$20,000,000	\$23,750,000
CHAF IP20110077	\$0	\$150,000	\$80,000	\$30,000	\$1,800,000	\$2,060,000
CHAF IP20110079	\$0	\$3,600,000	\$1,800,000	\$710,000	\$41,220,000	\$47,330,000
CHAF IP20120002	\$0	\$4,000,000	\$3,000,000	\$2,500,000	\$52,000,000	\$61,500,000
CHAF IP20130132	\$250,000	\$1,365,000	\$1,000,000	\$420,000	\$7,350,000	\$10,385,000
CHAF IP20130135	\$250,000	\$275,000	\$100,000	\$50,000	\$2,761,279	\$3,436,279
CHAF IP20130147	\$0	Authorized	\$175,000	\$150,000	\$1,800,000	\$2,125,000
CHAF IP20150080	\$0	\$7,500,000	\$2,030,000	\$1,200,000	\$75,000,000	\$85,730,000
CHAF IP20150139	\$1,400,000	\$4,500,000	\$10,190,000	\$2,450,000	\$55,700,000	\$74,240,000
CHAF IP20150184	\$0	\$540,000	\$1,250,000	\$1,270,000	\$38,270,000	\$41,330,000
CHAF IP20150185	\$0	\$3,250,000	\$4,260,000	\$4,260,000	\$52,640,000	\$64,410,000
CHAF IP20150293	\$0	\$0	\$100,000	\$2,380,000	\$3,330,000	\$5,810,000
CHAF IP20150319	\$0	Authorized	Authorized	\$2,870,000	\$12,410,000	\$15,280,000
CHAF IP20160174	\$0	Authorized	\$3,150,000	\$4,160,000	\$140,000,000	\$147,310,000
CHAF IP20160176	\$0	\$325,000	\$400,000	\$450,000	\$900,000	\$2,075,000
CHAF IP20160184	\$0	\$85,000	\$0	\$0	\$115,000	\$200,000
CHAF IP20160185	\$0	Authorized	Authorized	Authorized	\$2,700,000	\$2,700,000
CHAF IP20160276	\$0	Authorized	Authorized	Authorized	\$18,180,000	\$18,180,000
CHAF IP20170032	\$0	Authorized	Authorized	Authorized	\$6,410,000	\$6,410,000
CHAF IP20170096	\$0	\$1,663,000	\$8,200,000	\$800,000	\$13,000,000	\$23,663,000

Project ID	Planning	Design	ROW	Utilities	Construction	Total
CHAF IP20180043	\$0	\$1,255,000	\$550,000	\$720,000	\$1,500,000	\$4,025,000
Concept A	\$0	\$6,350,000	\$2,309,000	\$3,078,000	\$63,500,000	\$75,237,000
Concept C	\$565,250	\$570,000	\$1,357,000	\$1,809,000	\$5,652,500	\$9,953,750
Concept D	\$0	\$228,977	\$352,000	\$470,000	\$2,289,773	\$3,340,750
Concept G	\$0	\$180,000	\$90,000	\$36,000	\$1,800,000	\$2,106,000
Concept L	\$0	\$4,053,333	\$900,000	\$450,000	\$40,533,333	\$16,926,000
Concept M	\$0	\$4,560,000	\$826,000	\$1,101,000	\$45,600,000	\$52,087,000
Concept N	\$0	\$323,000	\$162,000	\$65,000	\$3,230,000	\$3,780,000
Concept O	\$0	\$2,926,000	\$30,000	\$150,000	\$29,260,000	\$32,366,000
Concept O2	\$0	\$750,000	\$30,000	\$10,000	\$4,000,000	\$4,790,000
Concept R	\$0	\$120,000	\$80,000	\$1,480,000	\$1,200,000	\$2,880,000

# 5.2 Second Project Team Meeting

The project team met January 8, 2019 at KYTC District 5 in Louisville to discuss the analysis completed to date and refine the draft matrix. The team reviewed 2040 traffic analyses and examined the draft matrix to adjust content and format to improve utility. The meeting summary is included in **Appendix D**.

Figure 5-4: Stag	e 1 Matrix																		Mic	ddletown to Simpson	ville Needs Ana	lysis Study
							Conceptual Project for			2018			_	xisting Conditi No Build	ons 7/15-6/18		EEC			Improvement Info		
Project ID	Other IDs	County	Route	ВМР	EMP	Description of Improvement	Modeling & Cost Estimate	Other Notes	ADT	% Trucks	LOS V/C	Delay	· ·	LOS V/C	Crashes (F/I/PDO)	High CCRF Sites	Com	Substandard Geometry	2040 Build Summary	Project Development Status	Total Remaining Cost Estimate	Bike/Ped
Statewide Signifi	cance (Interstates &	NHS Rou	tes)																			
CHAF IP20160174	Item 5-537.00/01/02 MTP # 958	Jefferson	I-265	23.409	34.727	SIX LANE PRIORITY SECTION OF I-265 BETWEEN TAYLORSVILLE ROAD AND I-71.	Major Widening (six lanes)	Priority 1-2-4 in 2015 Programming Study. Ranked 1st statewide in 2018 SHIFT.	48,500- 86,500	10-11		L-H MH 2.6 mi H 0.2 mi	56,000- 95,000				2.6 mi 0 int	N/A	64,000-115,000 ADT -7,027 VHT   +11,242 VMT	Design ongoing	\$147,310,000	N/A
CHAF IP20150080	Item 5-558.00 MTP # 959	Jefferson	I-265	17.300	23.100	IMPROVE SAFETY AND REDUCE CONGESTION ON I-265 FROM US- 31E (BARDSTOWN RD) TO KY-155 (TAYLORSVILLE RD).	Major Widening (six lanes)	Priority 5 of 5 in 2015 Programming Study. Ranked 29th statewide in 2018 SHIFT.	66,000- 71,000	9-12		ML-M	77,000- 83,000				2.6 mi 0 int	N/A	87,000-93,000 ADT -2,716 VHT   +6,774 VMT	Pre-design	\$85,730,000	N/A
CHAF IP20150184	Item 5-549.00/.01 MTP # 179	Jefferson	I-265 I-64	24.600		RECONSTRUCTION OF THE I-265/I-64 INTERCHANGE. (2016BOP)	Reconstruct I-265/I-64 Interchange	Priority in 2015 Programming Study. Ranked 33rd statewide (#5-549) and 22nd regionally (#5-21.2) in 2018 SHIFT.	48,500 60,000-	10.6 9.5		L-H MH 0.7 mi H 0.3 mi	56,000- 111,000				3.4 mi 0 int	N/A	57,000-111,000 -347 VHT   -3,001 VMT	Design ongoing	\$41,330,000	N/A
CHAF IP20080196	N/A	Jefferson	US 60	5.529	7.857	Improve safety and reduce congestion on US 60 from I-264 to KY 1747. Project design will evaluate one added travel lane in each drection and consider bicycle and pedestrian facilities.	Major Widening (six+ lanes)	CHAF notes dense development, regional attractions, growing UL Shelby campus. Not sponsored in 2018 SHIFT.	95,000 38,400- 56,590	7.8	C-E 0.6-0.8	ML-MH	43,000- 62,000	D-E 0.6-0.9	474 crashes (1/49/424)	2 segments 4 spots		10-foot lanes 1 fair condition bridge	52,000-68,000 ADT LOS D   0.6-0.8 V/C	Pre-design Pre-design	\$26,890,000	Yes
Concept L	N/A	Jefferson	KY 155	3.000	4.200	Improve safety and congestion on KY 155 (Taylorsville Lake Road) from KY 148 (Taylorsville Road) to KY 1531 (Routt Road). Project will evaluate the addition of one travel lane in each direction and the addition of bicycle and pedestrian facilities.	Major Widening (four lanes)	Covington by the Park development (800+ homes, retail) to add turn lanes. New project.	17,460	7.5	E 0.6	L	28,000	F 1.0	25 crashes (0/3/22)	0 segments 0 spot	s 1.2 mi 2 int	1 fair condition bridge	29,000 ADT LOS B   0.4 V/C	Pre-design	\$16,926,000	Yes
CHAF IP20080202	Item 5-8908.00 MTP #956	Jefferson	KY 155	4.400	5.750	IMPROVE SAFETY AND REDUCE CONGESTION ON KY 155 (TAYLORSVILLE ROAD) FROM I-265 TO KY 148 (TAYLORSVILLE ROAD).	Minor Widening (add center turn lane)	\$19.8M in SPP funds in 2018-24 SYP.  Ranked 7th regionally in 2018 SHIFT  (MP 4.4-6.3).	20,310	7.5	A-E 0.2-0.5	L	25,000- 29,000	A-E 0.3-0.8	87 crashes (1/29/57)	0 segments 2 spots	3 int	N/A	28,000-29,000 ADT LOS A-E   0.3-0.7 V/C	Pre-design	\$19,840,000	Yes
CHAF IP20080218	Item 5-8953 MTP # 2384	Jefferson	KY 1747 US 60	13.400 7.857	13.600 7.857	IMPROVE THE HURSTBOURNE PARKWAY (KY 1747) AT SHELBYVLLE ROAD (US 60) INTERSECTION TO INCREASE CAPACITY, REDUCE DELAYS, AND IMPROVE SAFETY. (SEE	Intersection Improvements	In 2016-22 SYP but not 2018-24. Ranked 126th regionally in 2018 SHIFT.	22,180- 33,930 38,400	2-10 8-10	0.3-0.4 E	М	26,000- 40,000 43,000	0.4-0.5 F	83 crashes (0/5/78)	2 segments 2 spots	0.4 mi 1 int	1 sharp curve	26,000-40,000 ADT LOS E-F for intersection 43,000 ADT	Design completed	\$4,390,000	No
CHAF IP20080197	MTP #479	Jefferson	US 60			5-344.02)  Improve safety and reduce congestion on US 60 from KY 1747 to Old Shelbyville Road (CS3596). Project will evaluate the addition of one travel lane in each direction and will consider accommodations for bicyclists, pedestrians, and transit users.	Major Widening (six lanes)	CHAF notes dense development, regional attractions, growing area. Ranked 184th regionally in 2018 SHIFT.	30,500- 45,600		C-D 0.4-0.7	ML-MH				5 segments 14 spots		1 steep grade 1 sharp curve	38,000-56,000 ADT LOS B-D   0.4-0.6 V/C	Pre-design	\$54,883,000	Yes
CHAF IP20180043	Item 5-80001.00	Jefferson	US 60	11.093	11.684	WIDEN US-60 TO 6 LANES FROM	Major Widening (six lanes)	\$4.0M in SPP funds in 2018-24 SYP. Not sponsored in 2018 SHIFT.	32,430- 35,620	9.6	C 0.6	МН	41,000- 45,000	D 0.7-0.8	208 crashes (0/20/188)	1 segment 3 spots		N/A	42,000-46,000 ADT LOS C   0.5 V/C	Pre-design	\$4,025,000	Yes
CHAF IP20080201	MTP # 1372	Jefferson	KY 155	6.300	9.350	Improve safety and reduce congestion on KY 155 from Watterson Trail to I-265. Project	Major Widening (five lanes)	CHAF notes developing area plus commuter link for Shelby & Spencer Co. Ranked 108th regionally in 2018 SHIFT.	11,620- 18,060	7-15	A-E 0.2-0.5	L-ML	17,000- 23,000	A-E 0.3-0.7	241 crashes (2/30/209)	2 segments 4 spots		N/A	24,000-32,000 ADT LOS A-B   0.3-0.4 V/C	Pre-design	\$24,300,000	Yes
CHAF IP20130147	Item 5-808.00 TIP #1507	Jefferson	KY 155	4.400	5.000	SAFETY PROJECT FOR RECONSTRUCTION OF TAYLORSVILLE	Safety/Hazard Elimination (intersection/bridge)	\$2.1M in STP funds in 2018-24 SYP. Ranked 79th regionally in 2018 SHIFT.	20,310	7.5	E 0.5	ML	29,000	E 0.7	47 crashes (1/18/28)	0 segments 1 spot	3 int	1 poor condition bridge	Minimal operational changes	Design ongoing	\$2,125,000	Yes
CHAF IP20080203	MTP # 469	Jefferson	KY 155	11.395	13.314	Improve safety and reduce congestion on KY 155 from Hikes Lane/Browns Lane to KY 1747 (Hursbourne Parkway). To include bicycle and pedestrian facilities.	Major Widening (six lanes)	CHAF notes developing area. Ranked 254th regionally in 2018 SHIFT.	30,850- 42,020	7-8	B-D 0.307	L-M	36,000- 46,000	C-D 0.4-0.8	202 crashes (0/41/161)	0 segments 4 spots		N/A	38,000-58,000 ADT LOS C-D   0.4-0.7 V/C	Pre-design	\$15,450,000	Yes

													E	xisting Condition	ons					Improvement Info		
Project ID	Other IDs	County	Route	ВМР	EMP	Description of Improvement	Conceptual Project for	Other Notes		2018			2040	No Build	7/15-6/18	High	EEC	Substandard		Project Development	Total Remaining	g
,		,				· · ·	Modeling & Cost Estimate		ADT	% Trucks	LOS V/C	Delay	ADT	LOS V/C	Crashes (F/I/PDO)	CCRF Sites	Seg	Geometry	2040 Build Summary	Status	Cost Estimate	BIKE/Pec
						REDUCE CONGESTION AND				TTUCKS					(17171 20)		IIIC					
CHAF IP20130135	Item 5-555.00	Jefferson	KY 1747	10.500	11.995	IMPROVE SAFETY ALONG KY-1747	Congestion Management	\$250K NH planning funds in 2018-24 SYP.	32,680-	3-4	B-C 0.3-0.5	ML-MH	34,000-	B-C 0.4-0.5	709 crashes	5 segments	0.9 mi	N/A	38,000-66,000 ADT	Pre-design	\$3,436,279	Yes
CHAI 1F20130133	item 5-555.00	Jenerson	KI 1/4/	10.500	11.995	(HURSTBOURNE PARKWAY) FROM	Congestion Management	Ranked 11th regionally in 2018 SHIFT.	56,410	3-4	B-C 0.3-0.3	IVIL-IVIII	62,000	B-C 0.4-0.3	(0/75/634)	9 spots	10 int	N/A	LOS B-C   0.4-0.6	Fie-design	33,430,279	163
						STONY BROOK DRIVE TO I-64.  Improve safety and mobility on KY																+
						1747 (South Hurstbourne Parkway)		ATT #200 (4000)														
Concept G	N/A	Jefferson	KY 1747	7.489	11.033	from US 31F (Bardstown Road) to KY	Safety Improvements	MTP #386 (1999) showed 6 lane widening with improved access to Christian	24,300-	12	B-C 0.3-0.5	L-M	34,000	B-C 0.4-0.5	304 crashes	1 segment	1.7 mi	1 sharp curve	Minimal operational	Pre-design	\$2,106,000	Yes
CHAF IP20080217	N/A	Jenerson	KT 1/4/	7.469	11.055	155 (Taylorsville Road). Project Will	Safety improvements	Academy. New project.	32,680	4.5	B-C 0.3-0.3	L-IVI	34,000	B-C 0.4-0.3	(0/36/268)	6 spots	4 int	1 Sharp curve	changes	Pre-uesign	\$2,100,000	165
						evaluate operational improvements		,														
						and signal optimization.																+
			I-265	26 500	27.100	SNYDER FREEWAY; RECONSTRUCT I- 265/US-60 INTERCHANGE AS A			86,500	10.0			83,000-					N/A				
			. 203	20.500	27.1200	SINGLE POINT URBAN INTERCHANGE	Reconstruct I-265/US 60		00,500	10.0		L-MH	95,000				0.3 mi	.,,	83,000-95,000			
CHAF IP20150185	Item 5-41.10	Jefferson				AND CONSTRUCT NEEDED	Interchange as SPUI with	Ranked 185th regionally in 2018 SHIFT.				MH 1.0 MI	1				8 int		-180 VHT   -1,289 VMT	Pre-design	\$64,410,000	N/A
			US 60	11.800	12.300	IMPROVEMENTS TO CONNECT WITH THE I-265/I-64 INTERCHANGE	C/D to I-64 Interchange		34,500	2.0								N/A				
			03 00	11.800	12.300	(2006BOPC)			34,300	2.0								N/A				
						WIDEN SOUTHBOUND																+
						HURSTBOURNE LANE TO 3 LANES		In 2016-22 SYP but not 2018-24. Ranked														
CHAF IP20150293	Item 5-344.01	Jefferson	KY 1747	12.289	13.362	FROM LINN STATION RD (CS-1004H)	Reconstruction	36th statewide and 32nd regionally in	33,930	2	B-C 0.3-0.4	ML-M	26,000-	В 0.4	205 crashes	0 segment		N/A	39,000-43,000 ADT	Utilities cleared	\$5,810,000	No
	MTP # 359					TO EDEN AVE (CS-1660H).	(add 3rd SB thru lane)	2018 SHIFT.	,	_			40,000		(0/33/172)	2 spots	3 int		LOS C   0.4-0.7 V/C		40,020,000	
						(06CCR)(03KYD)(2006BOPP)(SEE 5- 344.02 FOR KYD C PHASE)(14CCR)																
						Improve safety and reduce																1
			I-265	22 700	23.400	congestion on the I-265/KY 155	Reconstruct I-265/KY 155	Identified in 2015 Programming Study	71,000	12.4			56,000-				0.5 mi	N/A	56,000-83,000			
Concept O	N/A	Jefferson	. 200	22.700	251.00	(Taylorsville Road) interchange.	Interchange	(moderate/low priority). New project.	, 1,000	12		L-M	83,000				3 int	.,,	-75 VHT   +160 VMT	Pre-design	\$32,366,000	N/A
			KY 155	6.058	6.058	Project will evaluate reconstruction of the interchange.			20,000	6.7		_						N/A	_			
			KT 155	0.030	0.030	Improve safety and mobility at the I-			20,000	0.7								14/71				+
						265/KY 155 (Taylorsville Road)																
Concept 03	NI/A	lofforcon	VV 155	6.059	6.059	interchange. Project will evaluate	Add seemed easth aread laft	Short term option versus Concept 0. Also	20.000	6.7					12 crashes	1 segment	0 mi	NI/A	Minimal operational	Dro dosian	¢4.700.000	Vos
Concept O2	N/A	Jefferson	KY 155	6.058	6.058	the addition of a second eastbound left turn lane on KY 155 to	Add second eastbound left	identified in 2015 Programming Study.	20,000	6.7		L			(0/2/10)	1 spot	1 int	N/A	changes	Pre-design	\$4,790,000	Yes
						northbound I-265 with consideration																
						of bicycle and pedestrian facilities.																
						Provide connectivity and improved mobility on I-265 at Rehl Road. The																
CHAF IP20080192	MTP #1514	Jefferson	I-265	24.000	24.600		New Interchange at I-	Identified in 2015 Programming Study	48,500	10.6		М	56,000				0.6 mi	N/A	57,000 ADT	Pre-design	\$36,580,000	N/A
						enhanced safety for bicyclists and	265/Rehl Road	(moderate/low priority).									0 int		+508 VHT   -6,500 VMT			
	H F 00002 00					pedestrians.	Name Carteria and Cialan and III.															
	Item 5-80002.00 Item 5-80000.00					NEW INTERCHANGE ON I-64E EAST OF THE GENE SNYDER FREEWAY.	New Eastwood/Fisherville Interchange with										0 mi		78,000 ADT			
CHAF IP20150139	Item 5-8200.1	Jefferson	I-64	21.000	22.000	EASTWOOD FISHERVILLE	connection between US	Ranked 186th regionally in 2018 SHIFT.	60,000	9.5		L-ML	75,000				0 int	N/A	+59 VHT   -1,970 VMT	Pre-design	\$74,240,000	N/A
	MTP # 390					CONNECTOR TO I-64. (18CCN)	60 and KY 148															
CHAF IP20160184	Item 5-8905.00	Jefferson	KY 1747	9.483	9.583	EXTEND THE LEFT TURN LANE ON HURSTBOURNE LANE AT	Safety/Hazard Elimination		24,300	4.3	В 0.3	ML	34,000	В 0.4	29 crashes (0/3/26)	0 segment 1 spot	0.1 1111	N/A	Minimal operational changes. Queue storage	Pre-design	\$200,000	No
C17/1 11 20100104	MTP # 2383	Jenerson	Six Mile Ln	2.868	2.868	INTERSECTION WITH SIX MILE LANE.	(extend left turn lane)	156th regionally in 2018 SHIFT.	7,130			IVIL	10,160		(0/3/20)		0 int	1 sharp curve	ratio improves (<1).	The design	\$200,000	110
Other Regional &	Local Routes																					
						Improve safety and reduce												<del></del>				
						congestion on KY 146 from Nelson Miller Parkway (CR1019C) to																
						Reamers Road (CR1004D). To include		CHAF notes regional attractions,														
CHAF IP20080200	MTP # 443	Jefferson	KY 146	6.964	8.251	consideration for bicycle and	Major Widening (five	anticipated growth, adjacent rail line.	11,070-	2.6	A-E 0.2-0.6	L-ML	14,000-	A-E 0.2-0.8	224 crashes	2 segments	0.7 mi	N/A	15,000-33,000 ADT	Pre-design	\$14,500,000	Yes
CHAF 1P20080200	WITF # 443	Jenerson	KT 140	0.904	0.231	pedestrian facilities. Project will	lanes)	Ranked 118th regionally in 2018 SHIFT	18,680	3-0	A-E 0.2-0.6	L-IVIL	23,000	A-E 0.2-0.6	(0/23/201)	4 spots	6 int	N/A	LOS B-C   0.3-0.5 V/C	Pre-design	\$14,500,000	165
						consider improvements to the I- 265/KY 146 Interchange and the		(MP 7.5-8.3).														
						addition of one travel lane in each																
						direction.																
	Itom F 272					RECONSTRUCT AND WIDEN			E 040				0.00		70 orashas	0.0000000	0.0:		0.200.12.000 ADT			
CHAF IP20150319	Item 5-373 MTP # 233	Jefferson	KY 1819	10.795	12.811	WATTERSON TRAIL FROM PLANTSIDE DRIVE TO	Major Widening	Ranked 100th regionally in 2018 SHIFT.	5,840- 10,880	8-9	E 0.2-0.3	L-ML	8,00- 13,000	E 0.2-0.4	79 crashes (0/11/68)	0 segment 3 spots	0.9 mi 2 int	6 sharp curves	9,300-13,000 ADT LOS A-B   0.2 V/C	ROW complete	\$15,280,000	No
						BLANKENBAKER ROAD. (98CCR)						<u> </u>			(-, -1, 00,	2 2 50 65				<u> </u>		
						WIDEN ENGLISH STATION ROAD			-													
	Item 5-353.00		N English Ct			FROM 2 TO 3 LANES (3RD LANE WILL	Minor Widening	\$6.5M SLO const funds in 2018-24 SYP.					16 000				0.5 m;		18,000-23,000 ADT			
CHAF IP20170032	MTP # 188	Jefferson	N English Str CR-1006C	0.457	1.232	BE A CENTER LANE) FROM AIKEN ROAD TO AVOCA ROAD. (FUNDING	(add center turn lane)	Ranked 32nd regionally in 2018 SHIFT.	17,400	8.6	E 0.6	ML-M	16,000- 22,000	E 0.6-0.8	0 crashes		0.5 mi 0 int	10-foot lanes	LOS D-E   0.4-0.5 V/C	Design & ROW ongoing	\$6,410,000	Yes
						SUBJECT TO FISCAL CONSTRAINT		<u> </u>					, , , , , ,									
1		1				PENDING MPO TIP).						1	1						I			

													E:	xisting Conditi	ons					Improvement Info		
Project ID	Other IDs	County	Route	ВМР	EMP	Description of Improvement	Conceptual Project for	Other Notes		2018				No Build	7/15-6/18	High	EEC	Substandard		Project Development	Total Remaining	
1 Toject ID	Other ibs	County	Noute	DIVII	LIVII	Description of improvement	Modeling & Cost Estimate	other Notes	ADT	_ %	LOS V/C	Delay	ADT	LOS V/C	Crashes	CCRF Sites	Seg	Geometry	2040 Build Summary	Status	Cost Estimate	Bike/Ped
CHAF IP20080214	Overlaps MTP # 484	Jefferson	KY 1447	7.500	9.240	widening with two-way center turn lane and consider bicycle and	Minor Widening (add center turn lane)	CHAF notes ongoing growth, Ford plant freight and employee flows. Not sponsored in 2018 SHIFT.	7,540	Trucks	E 0.2	L	11,000	E 0.4	(F/I/PDO)  54 crashes (0/8/46)	0 segment 1 spot	0.6 mi 5 int	5 sharp curves 10-foot lanes	11,000 ADT LOS E   0.4 V/C	Pre-design	\$5,470,000	Yes
Concept R	N/A	Jefferson	KY 146 Whipps Mill	2.740	2.740	pedestrian facilities.  Improve safety at the KY 146 (LaGrange Road)/Whipps Mill (CR- 1005C) intersection. Project will evaluate adding a two-way center turn lane and other capacity improvements including consideration of bicycle and	Intersection Improvements	New project	9,710	5.5	0.3 D-E	L-ML	13,000	D-F	2 crashes (0/0/2)	0 segment 1 spot	0 mi 1 int	sharp curve	13,000 ADT LOS D-E for intersection	Pre-design	\$2,880,000	Yes
CHAF IP20160185	Item 5-8203.00 MTP # 1819	Jefferson	KY 1819	6.900	8.100	pedestrian facilities.  RECONSTRUCT BILLTOWN ROAD FROM NORTH OF COLONNADES PLACE TO SOUTH OF EASUM	Reconstruction of three intersections	\$2.7M SPP const funds in 2018-24 STP. Ranked 17th regionally in 2018 SHIFT.	13,770- 13,900	4-7	E 0.5	L	18,000	E 0.6-0.7	39 crashes (0/4/35)	0 segment 0 spot	0.3 mi 7 int	3 sharp curves 10-foot lanes	18,000 ADT LOS E   0.6-0.7 V/C	ROW complete	\$2,700,000	No
CHAF IP20080219	MTP # 257	Jefferson	KY 1819	5.300	8.900	ROAD.(04CCN)(06CCN)(08CCR)(10CC R)(12CCR)  Improve safety, mobility for all modes, and address geometric deficiencies along KY 1819 (Billtown Road) from I-265 (Gene Snyder Freeway) to Ruckriegel Parkway/Billtown Road (in and near Jeffersontown). Project will evaluate 3-lane widening and consider accommodations for bicyclists and pedestrians	Minor Widening	Ultimate solution beyond IP20160185. CHAF notes ongoing growth. Not sponsored in 2018 SHIFT.	13,770- 13,900	4-7	E 0.5	L	18,000	E 0.5-0.7	94 crashes (0/12/82)	0 segment 0 spot	1.3 mi 12 int	3 sharp curves 10-foot lanes	16,000-18,000 ADT LOS E   0.5-0.7 V/C	Pre-design	\$27,120,000	Yes
Concept C CHAF IP20080198	Overlaps MTP # 953	Jefferson	US 60	15.114	17.375	Improve safety and reduce congestion on US 60 from Rockcrest Way (CS-3157) to Notting Hill Blvd (CS-1224J) at the Jefferson/Shelby County line. Project design will evaluate 3-lane widening with a continuous two-way center turn lane and other low impact alternatives.  Design will also consider accommodations for bicyclists, pedestrians, and future transit users.	Minor Widening (add center turn lane)	New project.	13,570- 19,330	6.6	B-E 0.3-0.5	L	19,000- 26,000	B-E 0.4-0.7	33 crashes (0/5/28)	0 segment 0 spot	0 mi 3 int	1 poor condition bridge	20,000-26,000 ADT LOS B-E   0.4-0.7 V/C	Pre-design	\$9,953,750	Yes
CHAF IP20080252	MTP # 412	Oldham	KY 146	0.000	2.021	Reduce congestion, improve access, and provide better mobility for all modes along KY 146 from the Oldham/Jefferson County line to Pryor Avenue in Crestwood. Project design will consider reconstructing KY 146 as a 2 lane road (no additional lanes) from Jefferson/Oldham County line to Pryor Avenue in Oldham County with consideration for turn lanes at Ash Avenue, Houston Avenue, Maple Avenue, and Central Avenue.	Reconstruction	CHAF notes regional attractions, anticipated growth, adjacent rail line. Not sponsored in 2018 SHIFT.	9,920- 19,130	5.8	A-E 0.2-0.4	L	12,000- 24,000	E 0.5	59 crashes (1/10/48)	0 segment 1 spot	0.7 mi 5 int	10-foot lanes	16,000 ADT LOS E   0.5-0.6 V/C	Pre-design	\$14,750,000	Yes
CHAF IP20080234	MTP # 472	Jefferson	Tucker Stn CR-1001H	1.079	3.538	Reconstruct Tucker Station Road from Rehl Road to Ellingsworth Lane. Project design will evaluate 2 lane road (no added lanes) and consider intersection improvements (S. Pope Lick, Rehl Road, & Ellingsworth Lane) and bicycle and pedestrian facilities.	Reconstruction (no additional lanes)	CHAF notes ongoing growth, few I-64 crossings. Not sponsored in 2018 SHIFT.	4,220	6.9	C-D 0.3	L	6,300- 7,800	D-E 0.4-0.5			0.2 mi 0 int	5 sharp curves 10-foot lanes	6,300-7,800 ADT LOS D-E   0.4-0.5 V/C	Pre-design	\$11,880,000	Yes
CHAF IP20160176	Item 5-8952.00 Overlaps MTP # 953	Jefferson	US 60	14.718	15.114	WIDEN US-60 TO THREE LANES FROM EASTWOOD CUTOFF (MP 14.7) TO ROCKCREST WAY (MP 15.1). (16CCN)	Minor Widening and Intersection Improvements	\$1.9M in SPP funds in 2018-24 SYP. Ranked 80th regionally in 2018 SHIFT.	19,330	6.6	В 0.3	L	26,000	B 0.4	32 crashes (1/3/28)	0 segment 1 spot	0.1 mi 2 int	4 sharp curves	25,000 ADT LOS B   0.4 V/C	Pre-design	\$2,075,000	No

														Ex	isting Conditio	ons					Improvement Info		
Project ID	Other IDs	County	Route	ВМР	EMP	Description of Improvement	Conceptual Project for	Other Notes		2018				2040 N	No Build	7/15-6/18	High	EEC	Substandard		Project Development	Total Remaining	/
,							Modeling & Cost Estimat	e	ADT	% Trucks	LOS V/	С	elay	ADT	LOS V/C	Crashes (F/I/PDO)	CCRF Sites	Seg Int	Geometry	2040 Build Summary	Status	Cost Estimate	Bike/Ped
CHAF IP20130132	N/A	Oldham	KY 362	0.975	3.039	Improve safety, access, and address geometric deficiencies along KY 362 from the Oldham/Shelby County Line to KY 146 (in and south of Pewee Valley). Includes consideration of a 3 lane widening with a two-way left turn lane and bike/ped accommodations.		CHAF notes future connection to Old n Henry Rd (IP20110079). Not sponsored in 2018 SHIFT.	1,590-4,290			0.2		5,100- 5,900	C-D 0.1-0.3	16 crashes (0/2/14)	0 segments 1 spot	0 mi	2 sharp curves 1 poor condition bridge 1 fair condition bridge 9-foot lanes	2,200-7,700 ADT LOS C-D   0.1-0.3 V/C	Pre-design	\$10,385,000	Yes
Concept N	N/A	Oldham	KY 362	0.000	0.000	Improve safety at the KY 22/KY 362 intersection. Project will evaluate adding a northbound right turn lane on KY 362 (Central Avenue) to KY 22 (Ballardsville Road) and add a		Moderate short-term in KY 22 Scoping study (2005). New project.	1,940	5	A 0.	1		1,400	В 0.1	2 crashes (0/0/2)	0 segment 0 spot	0.1 mi 0 int	skewed intersection 9-foot lanes on KY 362	Minimal operational changes	Pre-design	\$3,780,000	No
			KY 22	1.825	1.825	westbound left turn lane and an eastbound right turn lane on KY 22 at KY 362.		, (, ,, ,, ,,	9,100											gst			
CHAF IP20080215	MTP # 411	Jefferson	KY 1531	9.100	11.900	Relocate & reconstruct KY 1531 (Johnson Road) as a 2 lane road (no additional lanes) with improved geometry from US 60 (Shelbyville Road) to Aiken Road. Project will consider bicycle and pedestrian facilities.	Reconstruction (no additional lanes)	CHAF notes ongoing growth, outlet for US 60 congestion. Not sponsored in 2018 SHIFT.	940-2,420	7-11	в О.	1		,,600- 1,300	C 0.1-0.2	9 crashes (0/1/8)	0 segment 0 spot	0 mi 2 int	16 sharp curves 1 fair condition bridge 9-foot lanes	3,500-4,300 ADT LOS C   0.1-0.2 V/C	Pre-design	\$11,830,000	Yes
Concept D	Comp Plan #29	Shelby	KY 1848	6.418	7.005	Improve connectivity to KY 1848 (Todds Point Road) from Grand Central Drive to approximately 3,100 feet north of Grand Central Drive. Project will consider roadway widening with no additional thru lanes and bicycle and pedestrian facilities.	Minor Widening	New project.	2,690	8.2	C 0.	1	L 5	5,200	C 0.2	3 crashes (0/0/3)	0 segment 0 spot	0.1 mi 0 int	2 sharp curves 9-foot lanes	5,200 ADT LOS C   0.2 V/C	Pre-design	\$3,340,750	Yes
Concept A	MTP #1323	Jefferson	Flat Rock CR-1002D	0.000	3.848	Improve safety on Flat Rock Road (CR-1002D) from Shelbyville Road (US 60) to Aiken Road (KY 1531). Project will evaluate widening with no additional thru lanes and consider bicycle and pedestrian facilities. Bicycle and pedestrian facilities would be proposed due to parks etc. in area.		KIPDA MTP project. US 60 intersection already improved. New project.	4,800				L						sharp curves 10-foot lanes	6,700 ADT LOS D   0.3 V/C	Pre-design	\$75,237,000	No
CHAF IP20110077	MTP # 277	Jefferson	S English Stn CR-1002J	2.950	3.900	Reconstruct South English Station Road (CR1002J) from Poplar Lane to Christian Academy. Project design will evaluate 2 lane road (no added lanes) and consider bicycle and pedestrian facilities.	Reconstruction (no additional lanes)	Not sponsored in 2018 SHIFT.	1,700				L					0.4 mi 0 int	N/A	1,700 ADT LOS C   0.2 V/C	Pre-design	\$2,060,000	Yes
CHAF IP20080232	MTP # 462	Jefferson	Rehl CR-1006H	0.000	2.255	Reconstruct Rehl Road from KY 913 (Blankenbaker Parkway) to S. Pope Lick Road. Project design will evaluate 2 lane road (no added lanes) and consider bicycle and pedestrian facilities.	Reconstruction (no additional lanes)	CHAF notes proposed growth from new interchange (IP20080192). Not sponsored in 2018 SHIFT.	750	2	В 0.	1	L 3	3,000	C 0.3	±7 crashes		0.1 mi 1 int	3 sharp curves 9- to 10-foot lanes	3,000 ADT LOS C   0.3 V/C	Pre-design	\$12,060,000	Yes
Concept M	MTP #1325	Jefferson	Old Heady CR-1008H	0.000	1.376	Improve safety and mobility on Old Heady Road (CR-1008H) from KY 155 (Taylorsville Road) to Chenoweth Run Road (CR-1003H). Project will evaluate adding a two-way center turn lane and bicycle and pedestrian facilities.	Widening with Center Turn Lane	MTP (2004) shows adding TWLTL. New project.	4,350				L					0 mi 1 int	10-foot lanes sharp curves	5,400 ADT LOS C   0.2 V/C	Pre-design	\$52,087,000	Yes
CHAF IP20080227	MTP # 277	Jefferson	Ellingsworth CS-1030H	0.000	0.607	Extend & widen Ellingsworth Lane from KY 913 (Blankenbaker Parkway) to Urton Lane. Project design will evaluate 3 lane road with two-way center turn lane and consider bicycle and pedestrian facilities.	Ellingsworth Lane (add	CHAF notes dense development, proposed link to Urton (IP20120002). Not sponsored in 2018 SHIFT.	7,000			N,	I/A 3	3,700				0.1 mi 0 int	N/A	-18 VHT   +105 VMT	Pre-design	\$4,420,000	Yes

												E:	cisting Condition	ons					Improvement Info		
Project ID	Other IDs	County	Route	BMF	P EMP	Description of Improvement	Conceptual Project for Other Notes  Modeling & Cost Estimate		)18		Delay	2040	No Build	7/15-6/18 Crashes	High	EEC Soc	Substandard	2040 Build Summary	Project Development	Total Remaining	Bike/Ped
							Modeling & Cost Estimate	ADT 7	cks LOS	V/C	Delay	ADT	LOS V/C	(F/I/PDO)	CCRF Sites	Seg Int	Geometry	2040 Build Suffiffiary	Status	Cost Estimate	віке/Рец
CHAF IP20080242	MTP # 258	Jefferson	Blowing Tree CS-1163H	0.000	0 0.459	Extend & reconstruct Blowing Tree Boulevard from KY 155 (Taylorsville Road) to Bunsen Parkway. Project design will evaluate 3 lane road with two-way center turn lane and consider bicycle and pedestrian facilities.	Extend/widen Blowing Tree Blvd (three lanes)  CHAF notes dense development, outlet for KY 155 and KY 1747 congestion. Ranked 329th regionally in 2018 SHIFT.	1,900			N/A						Narrow lanes	-435 VHT   -4,971 VMT*	Pre-design	\$4,530,000	Yes
CHAF IP20110073	MTP # 265	Jefferson	New		N/A	Improve Safety & Connectivity and Reduce Congeston along Shelbyville Road (US60), Hurstbourne Lane (KY 1747), Interstate I-64 and Taylorsville Road (KY 155) in the vicinity of Oxmoor Farms. Project will consider a Bunsen Boulevard/Christian Way connector as a 5 lane (5th lane will be a center turn lane) divided highway with consideration of bicycle and pedestrian facilities.					N/A						N/A	-623 VHT   -8,965 VMT*	Pre-design	\$23,440,000	Yes
CHAF IP20110074	MTP#260	Jefferson	New		N/A	Improve Safety and Connectivity and Reduce Congestion along Shelbyville Road (US60), Hurstbourne Lane (KY 1747), Interstate I 64 and Taylorsville Road (KY 155) in the vicinity of Oxmoor Farms. Project will consider a Bowling Boulevard/Chrisitian Way connector as a 5 lane (5th lane will be a center turn lane) divided highway with consideration of bicycle and pedestrian facilities.	Bowling Blvd/Christian Way Connector (five  CHAF notes proposed growth (Bullitt Farm), poor connectivity, US 60 & KY 1747 Congestion, Ranked 157th regionally in				N/A				-		N/A	-1,173 VHT   -367 VMT*	Pre-design	\$23,750,000	Yes
CHAF IP20110079	Item 5-376.00 MTP # 198	Oldham	New		N/A	New Route Between KY 362 (Ash Avenue) in Pewee Valley and KY 22 (Ballardsville Road)/KY 329B (KY 329 Bypass) In Crestwood. Project is Section 2 of the 5-367.00 Crestwood Bypass Parent Project. Section 1, KY 3084 (Old Henry Road) From I-265 (Gene Snyder Freeway) To KY 362 (Ash Avenue), being constructed under 5-367.20. Project design will evaluate 3-lane roadway section with Two-Way Center Turn Lane and will consider accommodations for bicyclists and pedestrians.	Connector (four lanes), Old Henry Rd Interchange to KY 22  CHAF notes proposed connection replacing KY 146. Not sponsored in 2018 SHIFT.		_		N/A	-					N/A	-4,482 VHT   -6,321 VMT	Pre-design	\$47,330,000	Yes
CHAF IP20120002	MTP # 474	Jefferson	New		N/A	Extend Urton Lane from north of I- 64 to Seatonville Road. Includes consideration of facilities for all modes (pedestrian, bicycle, SOV, and transit).	Extend Urton Lane (three lanes), north of I-64 to Seatonville Rd CHAF notes planned growth, development potential, outlet for I-265. Not sponsored in 2018 SHIFT.	2,400-6,500			N/A						N/A	-1,594 VHT   -2,721 VMT	Pre-design	\$61,500,000	Yes
CHAF IP20160276	Item 5-367.20/.21	Oldham	New		N/A	EXTENSION OF OLD HENRY ROAD EAST TO ASH AVENUE (KY362). (12CCR)(18CCN)	Extend Old Henry Rd to KY 362 Ash Ave CHAF notes traffic uses residential Village Green Blvd to access Old Henry Rd today. Ranked 129th regionally in 2018 SHIFT.				N/A						N/A	-1,393 VHT   -1,364 VMT	Utilities ongoing	\$18,180,000	Yes
CHAF IP20170096	Item 5-80003.00 MTP # 458	Jefferson	New		N/A	EXTEND PLANTSIDE DRIVE FROM REHL ROAD TO TAYLORSVILLE ROAD (18CCN)	Extend Plantside Drive \$750k SPP design funds in 2018-24 SVP				N/A						N/A	-495 VHT   -1621 VMT	Pre-design	\$23,663,000	No

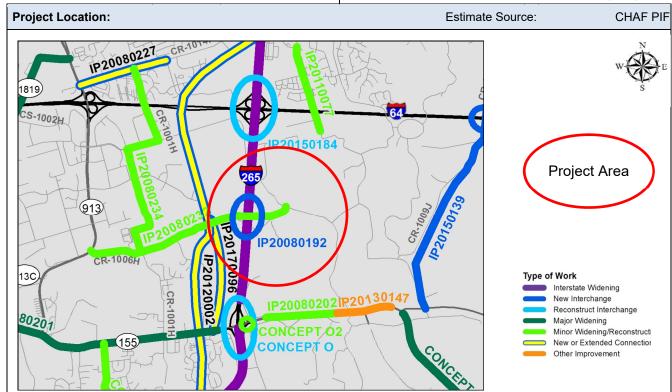
# 5.3 Project Sheets

Statewide Significance	CHAF IP20080192, Jefferson County	Route:	I-265
CHAF PIF Description:		Name: Work Type:	Gene Snyder New Interchange

Provide connectivity and improved mobility on I-265 at Rehl Road. The Rehl Road portion would include enhanced safety for bicyclists and pedestrians.

MP <b>24.000</b> to M	P <b>24.600</b>	F	Project Len	gth: <b>0</b>	.60	<b>0</b> M
Identified Needs:		Crash History Analysis Period	:			N/A
			CCRF	MP	-	MP
			N/A		<b> -</b>	
	<ul> <li>Identified in 2015 Programming Study (moderate/low priority).</li> <li>Beyond scope of safety/operational analysis.</li> </ul>				-	
Beyond scope of	sarety/operational anal	y515.			1-1	
					-	
Project Dev. Status:	Predesign	Project Phase Estimates:	(20	19 Doll	ars	)

Project Dev. Status:	Predesign	Project Phase Estimates:	(	2019 Dollars)
SYP Number:	N/A	Planning:	\$	470,000
2035 KIPDA MTP:	# 1514	Design:	\$	2,780,000
Functional Class:	Urban Interstate	Right-of-Way:	\$	1,390,000
2018 ADT   % Trucks:	48,500 vpd   10.6%	Utilities:	\$	580,000
2040 No Build ADT:	56,000 vpd	Construction:	\$	31,360,000
Bike/Ped Facilities:	N/A	Total Remaining Cost:	\$	36,580,000



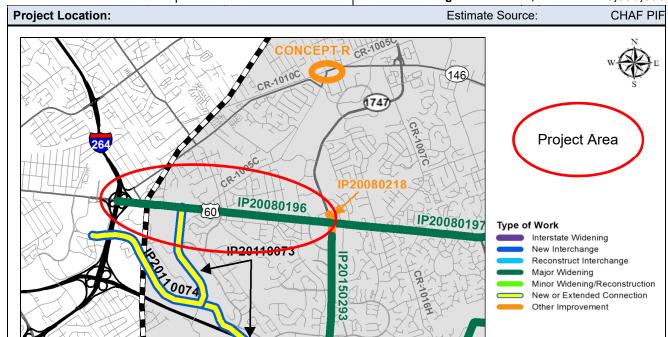
Statewide	CHAF IP20080196, Jefferson County	Route:	US 60
Significance		Name:	Shelbyville Road
CHAF PIF Description:		Work Type:	Major Widening

Improve safety and reduce congestion on US 60 from I-264 to KY 1747. Project design will evaluate one added travel lane in each direction and consider bicycle and pedestrian facilities.

MP	5.529	to	MP	7.857	Project Length:	2.328	MI

Identified Needs:	Crash History Analysis Period:	July	2015 –	Ju	ne 2018
CHAF PIF notes dense development, regional att	ractions, growing UL Shelby	CCRF	MP	•	MP
campus.  Not Sponsored in 2018 SHIFT		1.73	5.85	-	5.96
Existing: 4-6 lanes		1.10	6.23	-	6.44
<ul> <li>Existing LOS C-E, worsening to LOS D-E in 2040</li> </ul>		1.60	5.80	-	5.90
<ul> <li>Existing v/c 0.6-0.8, worsening to v/c 0.6-0.9 in 20</li> <li>474 total crashes: 1 fatal/49 injury/424 PDO</li> </ul>	040 No-Build	1.53	6.20	-	6.30
<ul> <li>Geometry: 10 foot lanes, 1 fair condition bridge</li> </ul>		1.38	7.60	-	7.70
2 high crash segments and 4 high crash spots, de-	etails at right	2.35	7.80	-	7.90

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Project Status:	Predesign	Project Phase Estimates:	(2	(019 Dollars)
SYP Number:	N/A	Planning:	\$	240,000
2035 KIPDA MTP:	N/A	Design:	\$	1,970,000
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$	1,050,000
2018 ADT   % Trucks:	38,400-56,590 vpd   7.8%	Utilities:	\$	470,000
2040 No-Build ADT:	43,000-62,000 vpd	Construction:	\$	23,160,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	26,890,000



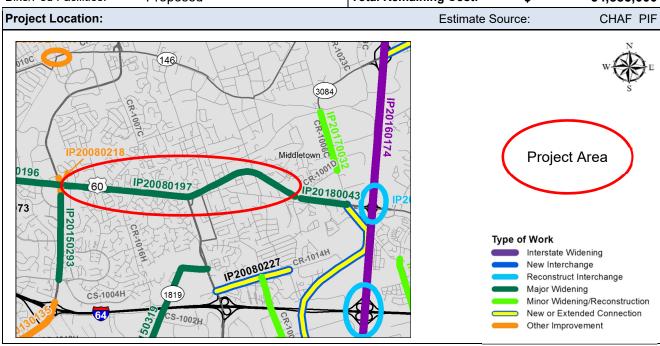
Statewide	CHAF IP20080197, Jefferson County	Route:	US 60
Significance		Name:	Shelbyville Road
<b>CHAF PIF Description:</b>		Work Type:	Major Widening

Improve safety and reduce congestion on US 60 from KY 1747 to Old Shelbyville road (CS-3596). Project will evaluate the addition of one travel lane in each direction and will consider accommodations for bicyclists, pedestrians, and transit users.

**7.857** to MP **11.093** Project Length: 3.236 MI

lden	tified Needs: Crash History Analysis Period:	July 2015 – June 2			ne 2018
•	CHAF PIF notes dense development, regional attractions, growing area.	CCRF	MP	-	MP
•	Ranked 184th regionally in 2018 SHIFT.  Existing: 4 lanes	1.00	7.86	-	9.41
•	Existing LOS C-D, worsening to LOS C-E in 2040 No-Build	1.36	9.41	-	9.47
•	Existing v/c 0.4-0.7, worsening to v/c 0.5-1.0 in 2040 No-Build	2.35	7.80	-	7.90
•	753 total crashes: 1 fatal/97 injury/655 PDO	1.93	7.90	-	8.00
•	2 high crash segments and 14 high crash spots (segments and highest 4 spots listed at right)	1.68	9.40	-	9.50
•	Geometry: 1 steep grade and 1 sharp curve	1.62	10.30	-	10.40

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)			
SYP Number:	N/A	Planning:	\$	0		
2035 KIPDA MTP:	# 479	Design:	\$	3,500,000		
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$	6,245,000		
2018 ADT   % Trucks:	30,500-45,600 vpd   2-10%	Utilities:	\$	10,408,000		
2040 No-Build ADT:	35,000-60,000 vpd	Construction:	\$	34,730,000		
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	54,883,000		



Regional/	CHAF IP20080198/Concept C, Jefferson County	Route:	US 60
Local	onal in 20000130/0011cept of Jenerson County	Name:	Shelbyville Road
CHAF PIF Description	on:	Work Type:	Minor Widening

Improve safety and reduce congestion on US 60 from Rockcrest Way (CS-3157) to Notting Hill Blvd (CS-1224J) at the Jefferson/Shelby County line. Project design will evaluate 3-lane widening with a continuous two-way center turn lane and other low impact alternatives. Design will also consider accommodations for bicyclists, pedestrians, and future transit users.

MP 15	5.114	to	MP	17.375
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MP 15.114 to MP 17.375	Pro	ect Leng	jtn: 2	.26	1 1/11
Identified Needs:	Crash History Analysis Period:	July 20	015 – .	Jun	e 2018
		CCRF	MP	-	MP
Existing: 2 lanes		N/A		-	
<ul> <li>Existing LOS B-E, maintaining LOS B-E in</li> </ul>				-	
<ul> <li>Existing v/c 0.3-0.5, worsening to v/c 0.4-0</li> <li>33 total crashes: 0 fatal/5 injury/28 PDO</li> </ul>	.7 in 2040 No-Build			-	
<ul> <li>0 high crash segments and 0 high crash s</li> </ul>	pots			-	
Geometry: 1 poor condition bridge	•			-	•

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)		
SYP Number:	N/A	Planning:	\$	565,250	
2035 KIPDA MTP: Overlaps # 953 (MP 14.7-1		Design:	\$	570,000	
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$	1,357,000	
2018 ADT   % Trucks:	13,570-19,330 vpd   6.6%	Utilities:	\$	1,809,000	
2040 No-Build ADT:	19,000-26,000 vpd	Construction:	\$	5,652,500	
Bike/Ped Facilities: Proposed 1		Total Remaining Cost:	\$	9,953,750	



1.96 9.30 - 9.40

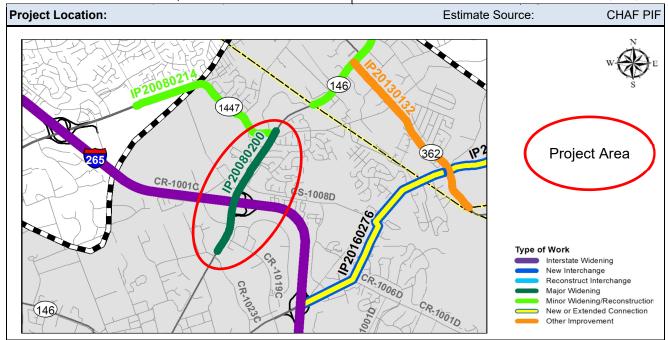
Regional/ Local	CHAF IP20080200, Jefferson County	Route:	KY 146
	211/11 II 20000200, 0011010011 000111,	Name:	LaGrange Road
<b>CHAF PIF Description:</b>		Work Type:	Major Widening

Improve safety and reduce congestion on KY 146 from Nelson Miller Parkway (CR-1019C) to Reamers Road (CR-1004D). To include consideration for bicycle and pedestrian facilities. Project will consider improvements to the I-265/KY 146 interchange and the addition of one travel lane in each direction.

MP **6.964** to MP **8.251** Project Length: **1.500** MI

Identified Needs: Crash History Analysis P		Crash History Analysis Period:	July 2015 – June 2018			2018
	OHAE DIE		CCRF	MP	-	MP
•		F PIF notes regional attractions, anticipated growth, adjacent rail line.  ———————————————————————————————————	1.20	6.96	-	7.28
•	Existing: 2-4 lanes Existing LOS A-E, maintaining LOS A-E in 2040 No-Build	,	2.22	7.28	-	7.72
•		1.48	7.20	-	7.30	
•		total crashes: 0 fatal/23 injury/201 PDO —	2.94	7.40	-	7.50
•			2.94	7.50	-	7.60
	2 mgn clash segment and 4 mgn clash spots, det	tails at right	1.50	8.20	-	8.30

Project Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	N/A	Planning:	\$	0
2035 KIPDA MTP:	# 443	Design:	\$	1,500,000
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$	500,000
2018 ADT   % Trucks:	11,070-18,680 vpd   3-6%	Utilities:	\$	500,000
2040 No-Build ADT:	14,000-23,000 vpd	Construction:	\$	12,000,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	14,500,000

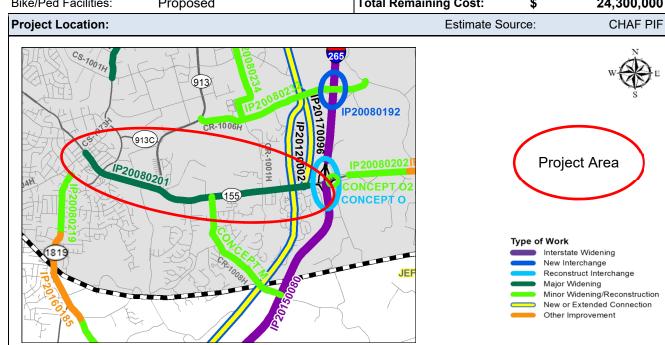


Statewide Significance	CHAF IP20080201, Jefferson County	Route:	KY 155
	GHAI IF 20000201, Sellerson County	Name:	Taylorsville Road
<b>CHAF PIF Description:</b>		Work Type:	Major Widening

Improve safety and reduce congestion on KY 155 from Watterson Trail to I-265. Project design will evaluate 3-lane widening with two-way center turn lane and consider bicycle and pedestrian facilities.

MP	6.300	to	MP	9.350	Proje	ect Lengtl	h: <b>3</b>	.05	5 MI
Identified Needs: Crash History Analysis Period: July							15 – Ju	ıne	≥ 2018
	011455	\				CCRF	MP	-	MP
•	D. L. 14001				1.07	5.71	-	6.45	
•	Fortalism O. A. Lance				1.74	9.02	-	9.44	
•	F. C. LOOA F. C. C. LOOA F. COAON B. C.				ning LOS A-E in 2040 No-Build	1.11	6.80		6.90
•	Existing v/c 0.2-0.5, worsening to v/c 0.3-0.7 in 2040 No-Build			1.05	7.50	-	7.60		
•					0 injury/209 PDO I 4 high crash spots, details at right	1.86	9.00	-	9.10
•	Z mgm c	ıasıı	segiii	cino and	i 4 nign crasn spois, ucialis at ngni	4.00			0.40

Project Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	N/A	Planning:	\$	0
2035 KIPDA MTP:	# 1372	Design:	\$	1,800,000
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$	2,000,000
2018 ADT   % Trucks:	11,620-18,060 vpd   7-15%	Utilities:	\$	2,500,000
2040 No-Build ADT:	17,000-23,000 vpd	Construction:	\$	18,000,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	24,300,000



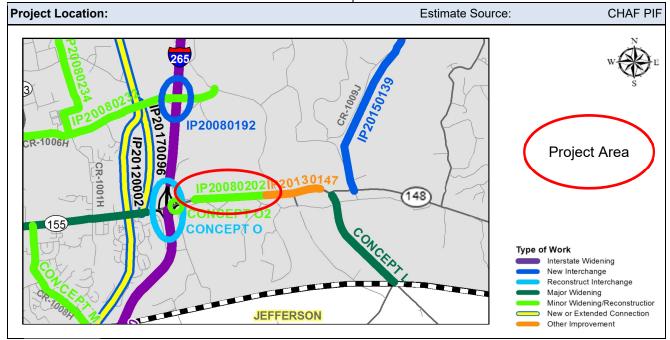
CHAF PIF Description:		Work Type:	Major Widening
Significance	onal in 20000202, denotison county	Name:	Taylorsville Road
Statewide	CHAF IP20080202, Jefferson County	Route:	KY 155

IMPROVE SAFETY AND REDUCE CONGESTION ON KY 155 (TAYLORSVILLE ROAD) FROM I-265 TO KY 148 (TAYLORSVILLE ROAD). PROJECT WILL EVALUATE UP TO 5-LANE WIDENING WITH TWO-WAY CENTER TURN LANE AND CONSIDER BICYCLE AND PEDESTRIAN FACILITIES.

4 400 to MP 5 750 Project Length: 1 350 MI

MP	4.400	lO	IVIP	5.750	Projec	i Lengu	n: 1.	35	U IVII	
lden	dentified Needs: Crash History Analysis Period: J					July 20	July 2015 – June 2018			
						CCRF	MP		MP	
•	Ranked	7th r	egion	ally in 2018 SHIFT	(MP 4.4-6.3)	2.78	4.80	-	4.90	
•	Existing: 2 lanes						5.70	-	5.80	
•	_			•	E in 2040 No-Build			-		
•	87 total crashes: 1 fatal/29 injury/57 PDO							-		
•								-		
								-		

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)
SYP Number:	5-8908.00	Planning:	\$ 915,000
2035 KIPDA MTP:	# 956	Design:	\$ 1,495,000
Functional Class:	Rural Minor Arterial	Right-of-Way:	\$ 1,000,000
2018 ADT   % Trucks:	20,310 vpd   7.5%	Utilities:	\$ 500,000
2040 No-Build ADT:	25,000-29,000 vpd	Construction:	\$ 15,930,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$ 19,840,000



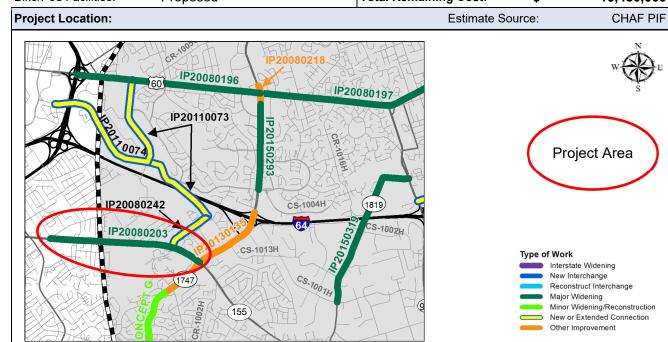
Statewide	CHAF IP20080203, Jefferson County	Route:	KY 155
Significance		Name:	Taylorsville Road
<b>CHAF PIF Description:</b>		Work Type:	Major Widening

Improve safety and reduce congestion on KY 155 from Hikes Lane/Browns Lane to KY 1747 (Hurstbourne Parkway). To include bicycle and pedestrian facilities.

MP	11.395	to	MP	13.314
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MP	11.395	to	MP	13.314	Pi	oject Ler	igth: 1	.9′	19 MI	
Iden	Identified Needs: Crash History Analysis Period:						July 2015 – June 2018			
	011455					CCRF	MP		MP	
•	<ul> <li>CHAF PIF notes developing area.</li> <li>Ranked 254th regionally in 2018 SHIFT.</li> </ul>				1.71	11.30	-	11.40		
•	Existing: 4 lanes				2.01	11.40	-	11.50		
•	Existing	LOS	B-D,		to LOS C-D in 2040 No-Build	1.21	11.70	-	11.80	
•	<ul><li>Existing v/c 0.3-0.7, worsening to v/c 0.4-0.8 in 2040 No-Build</li></ul>				1.86	12.20	-	12.30		
•		2 total crashes: 0 fatal/41 injury/161 PDO nigh crash segments and 4 high crash spots, details at right						-		
•	u nigh ci	asn	segm	ents and 4	nigh crash spots, details at right			_		

Project Status:	Predesign	Project Phase Estimates:	(2	(2019 Dollars)	
SYP Number:	N/A	Planning:	\$	0	
2035 KIPDA MTP:	# 469	Design:	\$	1,200,000	
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$	750,000	
2018 ADT   % Trucks:	30,850-42,020 vpd   7-8%	Utilities:	\$	1,500,000	
2040 No-Build ADT:	36,000-46,000 vpd	Construction:	\$	12,000,000	
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	15,450,000	



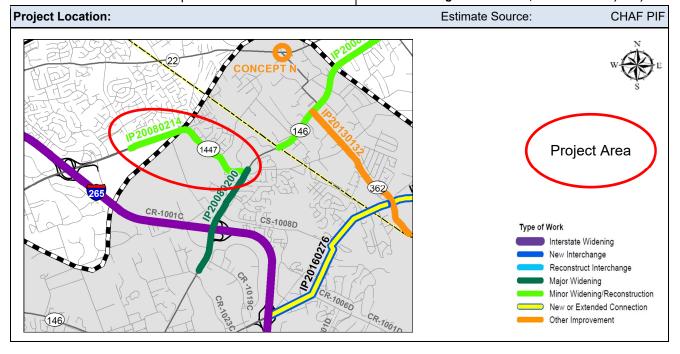
Regional/	CHAF IP20080214, Jefferson County	Route:	KY 1447
Local	Official in 20000214, Sellerson County	Name:	Westport Road
CHAF PIF Description:		Work Type:	Minor Widening

Improve safety and reduce congestion on KY 1447 (Westport Road) from Murphy Lane to KY 146. Project design will evaluate 3-lane widening with two-way center turn lane and consider bicycle and pedestrian facilities.

MP	7.500	to	MP	9.240	Project Length:	1.740	M

IVIP	7.500	ιO	IVIP	9.240	PIO	ject Len	igiri. 1	1./4	40 1711
lden	Identified Needs: Crash History Analysis Period:				July 2015 – June 2018				
•	CHAF P	IF no	tes o	ngoing gro	vth, Ford plant freight and employee flows.	CCRF	MP	•	MP
•	Not spor	nsore	d in 2	2018 SHIFT		1.29	9.20	-	9.30
•	Existing: 2 lanes							-	
•	Externing 200 E, maintaining 200 E in 2010 140 Band						-		
•	_			_	v/c 0.4 in 2040 No-Build				
•				fatal/8 inju	•				
•	•		_		nigh crash spot, details at right			-	
•	Geometi	y: 5	snarp	curves an	I 10-foot lanes			-	

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)		
SYP Number:	N/A	Planning:	\$	0	
2035 KIPDA MTP:	Overlaps # 484 (MP 7.5-8.0)	Design:	\$	470,000	
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$	240,000	
2018 ADT   % Trucks:	7,540 vpd   18.3%	Utilities:	\$	120,000	
2040 No-Build ADT:	11,000 vpd	Construction:	\$	4,640,000	
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	5,470,000	

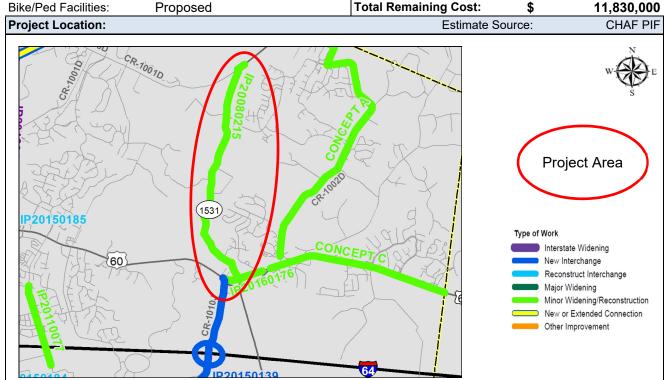


Regional/ Local	CHAF IP20080215, Jefferson County	Route: Name:	<b>KY 1531</b> Johnson Road
CHAF PIF Description:		Work Type:	Reconstruction

Relocate & reconstruct KY 1531 (Johnson Road) as a 2 lane road (no additional lanes) with improved geometry from US 60 (Shelbyville Road) to Aiken Road. Project will consider bicycle and pedestrian facilities.

MP <b>9.100</b> to MP <b>11.900</b>	Proje	ect Leng	th: <b>2</b> .	80	0 MI
Identified Needs:	Crash History Analysis Period:	July 20	015 – Jı	une	2018
CHAF PIF notes ongoing growth, outlet for	LIS 60 congestion	CCRF	MP	-	MP
<ul> <li>Not sponsored in 2018 SHIFT.</li> </ul>	N/A		-		
Existing: 2 lanes			-		
• Existing LOS B, worsening to LOS C in 20			-		
<ul> <li>9 total crashes: 0 fatal/1 injury/8 PDO</li> </ul>	Existing v/c 0.1,worsening to v/c 0.1-0.2 in 2040 No-Build 9 total crashes: 0 fatal/1 injury/8 PDO				
0 high crash segments and 0 high crash spots				-	
Geometry: 16 sharp curves, 1 fair condition			-		

Project Status:	Predesign	<b>Project Phase Estimates:</b>	(2019 Dollars)		
SYP Number:	N/A	Planning:	\$	0	
2035 KIPDA MTP:	# 411	Design:	\$	930,000	
Functional Class:	Urban Minor Collector	Right-of-Way:	\$	470,000	
2018 ADT   % Trucks:	940-2,420 vpd   7-11%	Utilities:	\$	240,000	
2040 No-Build ADT:	2,600-4,300 vpd	Construction:	\$	10,190,000	
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	11,830,000	



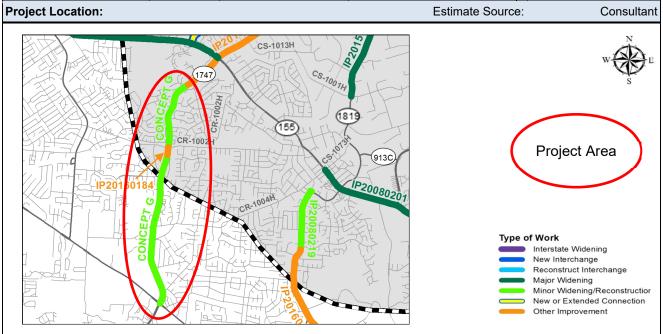
Statewide	CHAF IP20080217/Concept G, Jefferson County	Route:	KY 1747
Significance		Name:	Hurstbourne Pkwy
<b>Project Description:</b>		Work Type:	Safety Improvements

Improve safety and mobility on KY 1747 (South Hurstbourne Parkway) from US 31E (Bardstown Road) to KY 155 (Taylorsville Road). Project will evaluate operational improvements and signal optimization.

MP **7.489** to MP **11.033** Project Length: **3.544** MI

Project Issues/Existing Conditions:	Crash History Analysis Period:	July 2	2015 – 、	Jur	ne 2018
		CCRF	MP	-	MP
CHAF PIF and MTP showed 6 lane widening with	improved access to Christian	1.03	9.58		11.03
Academy.  • Existing: 4 lanes		1.78	9.50	-	9.60
<ul> <li>Existing LOS B-C, maintaining LOS B-C in 2040 I</li> </ul>	040 No-Build	1.09	9.70	-	9.80
• Existing v/c 0.3-0.5, worsening to v/c 0.4-0.5 in 20		1.13	10.50	-	10.60
304 total crashes: 0 fatal/36 injury/268 PDO     high grash appearant and 6 high grash appearant and 6 high grash appearant and 6 high grash appearant.		1.00	10.60	-	10.70
<ul><li>1 high crash segment and 6 high crash spots, det</li><li>Geometry: 1 sharp curve</li></ul>	alls at right	1.17	10.80		10.90
200		2.16	11.00	-	11.10

Project Status:	Predesign	Project Phase Estimates:	 (2019 Dollars)
SYP Number:	N/A	Planning:	\$ 0
2035 KIPDA MTP:	N/A	Design:	\$ 180,000
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$ 90,000
2018 ADT   % Trucks:	24,300-32,680 vpd   4.3%	Utilities:	\$ 36,000
2040 No-Build ADT:	34,000 vpd	Construction:	\$ 1,800,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$ 2,106,000

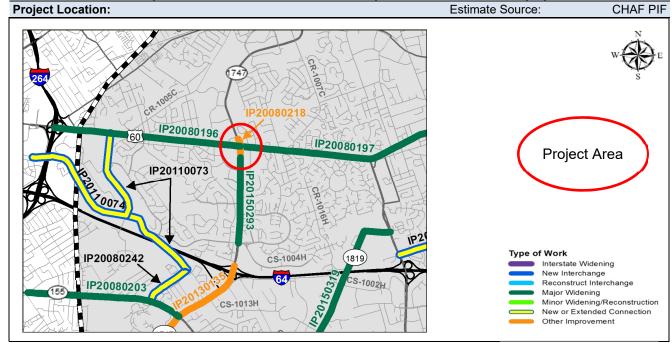


		INTERSECTION			
Statewide Significance	CHAF IP20080218 Jefferson	KY 1747 (MP 13.40-13.60) & US 60 (MP 7.71-7.96)			
9		Hurstbourne Parkway & Shelbyville Road			
CHAF PIF Descr	ription:	Work Type: Intersection Improvem	ents		

IMPROVE THE HURSTBOURNE PARKWAY (KY 1747) AT SHELBYVILLE ROAD (US 60) INTERSECTION TO INCREASE CAPACITY, REDUCE DELAYS, AND IMPROVE SAFETY. (SEE 5-344.02) (16CCN)

Identified Needs:			Crash History An	alysis Period: Jul	y 2015 – June 2018	
		KY 174	47	US 60		
		Existing	2040 No-Build	Existing	2040 No-Build	
• Int	tersection LOS	Е	F	E	F	
• v/c	C	0.3-0.4	0.4-0.5	0.5-0.6	0.5-0.7	
• Cra	ashes	83 total (0 fatal/5 ir	njury/78 PDO)	-		
•	gh crash segment   spot CRF)	2 segments. MP 13.39-13.50 (1.5) MP 13.50-13.63 (1.4)	2 Spots MP 13.4-13.5 (1.1) MP 13.5-13.6 (2.0)	-	-	
• Ge	eometry	1 sharp c	urve	N	/A	

Project Status:	oject Status: Design complete		<b>Project Phase Estimates:</b>	•	(2019 Dollars)
SYP Number:	5-8953		Planning:	\$	0
2035 KIPDA MTP:	# 2384		Design:	\$	Authorized
Functional Class:	Urban Pr	incipal Arterials	Right-of-Way:	\$	750,000
2018 ADT   % Trucks:	KY 1747:	22,180-33,930vpd   2-10%	Utilities:	\$	1,040,000
	US 60:	38,400 vpd   8-10%	Construction:	\$	2,600,000
2040 No-Build ADT:	KY 1747:	26,000-40,000 vpd			_
	US 60:	43,000 vpd			
Bike/Ped Facilities:	Not Propo	osed	Total Remaining Cost:	\$	4,390,000



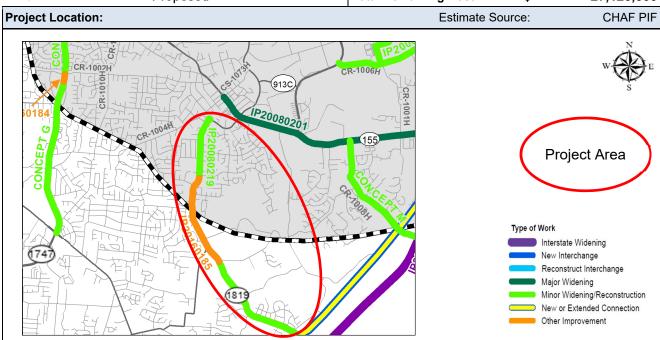
Local  CHAF PIF Description:	CHAP IP 20000219, Sellerson County	Name: Work Type:	Billtown Road Minor Widening
Regional/	CHAF IP20080219, Jefferson County	Route:	KY 1819

Improve safety, mobility for all modes, and address geometric deficiencies along KY 1819 (Billtown Road) from I-265 (Gene Snyder Freeway) to Ruckriegel Parkway/Billtown Road (in and near Jeffersontown). Project will evaluate 3-lane widening and consider accommodations for bicyclists and pedestrians.

MP **5.300** to MP **8.900** Project Length: **3.600** MI

IVIE	5.300	ιO	IVIT	0.900	FIO	ject Leng	jui. S	.00	JU IVII
lden	tified Nee	ds:			Crash History Analysis Period:	July 2	015 – .	Jur	e 2018
•	Ultimate	solu	tion b	eyond I	20160185.	CCRF	MP	-	MP
•	CHAF P	IF no	otes o	ngoing	rowth. Not sponsored in 2018 SHIFT.	N/A		-	
•	Existing							-	
•					g LOS E in 2040 No-Build o v/c 0.5-0.7 in 2040 No-Build			-	
•	-			-	injury/82 PDO			-	
•	_		_		0 high crash spot			-	
•	Geomet	ry: 3	sharp	curves	and 10-foot lanes			-	

Project Status:	Predesign	Project Phase Estimates:	(2	2019 Dollars)
SYP Number:	N/A	Planning:	\$	240,000
2035 KIPDA MTP:	# 257	Design:	\$	2,090,000
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$	1,160,000
2018 ADT   % Trucks:	13,770-13,900 vpd   4-7%	Utilities:	\$	470,000
2040 No-Build ADT:	18,000 vpd	Construction:	\$	23,160,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	27,120,000



Local  CHAF PIF Description:	CHAP IP20080227, Jenerson County	Name: Work Type:	Ellingsworth Lane New Connector
Regional/	CHAF IP20080227, Jefferson County	Route:	CS-1030H

Extend & widen Ellingsworth Lane from KY 913 (Blankenbaker Parkway) to Urton Lane. Project design will evaluate 3-lane road with two-way center turn lane and consider bicycle and pedestrian facilities.

MP <b>0.000</b> to N	ΛΡ <b>0.607</b>	Pr	oject Lengtl	n: <b>0.607</b>	<b>'</b> M
Identified Needs:		Crash History Analysis Period:			N/A
			CCRF	MP -	MP
CHAF PIF note	s dense development propo	osed link to Urton Lane (IP20120002).	N/A	-	
<ul> <li>Not sponsored</li> </ul>		3000 mm to Orton Earlo (ii 2012002).		-	
Existing: 2 lane				-	
<ul> <li>Beyond scope</li> </ul>	of safety/operational analysi	S.		-	
				-	
Project Status:	Predesign	Project Phase Estimates:	(2019	Dollars)	
SYP Number:	N/A	Planning:	\$		
2035 KIPDA MTP:	# 277	Design:	\$	35	0,000
Functional Class:	N/A	Right-of-Way:	\$	24	0,000
2018 ADT   % Trucks:	7,000 vpd	Utilities:	\$	12	0,000
2040 No-Build ADT:	3,700 vpd	Construction:	\$		0,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	4,42	<u> </u>
Project Location:		Estimate Sour	ce:	CHA	F PI
IP20080	IP20080227 OR-1	20180043 IP20150185	Project ype of Work		
	19) S-1002H	IP20150184	Major Wide	hange ct Interchange	

CHAF Description:		Work Type:	Reconstruction
Local	OTIAL II 20000232, Sellerson County	Name:	Rehl Road
Regional/	CHAF IP20080232, Jefferson County	Route:	CR-1006H

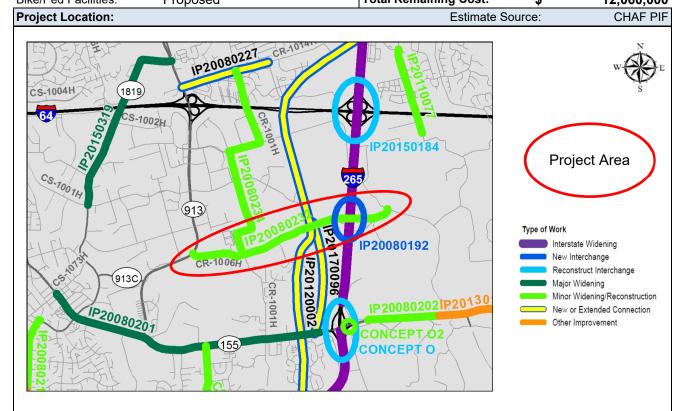
Reconstruct Rehl Road from KY 913 (Blankenbaker Parkway) to S. Pope Lick Road. Project design will evaluate 2-lane road (no added lanes) and consider bicycle and pedestrian facilities.

MP	0.000	to	MP	2.255	Project Length:	0.950	MI

Identified Needs: Crash History Analysis Period:		July 2015 – July 20				
•	CHAF PIF notes proposed growth from new interchange (IP20080192).					MP
•	Not sponsored in 2018 SHIFT.	· ,	N/A		-	
•	Existing: 2 lanes				-	
•	Existing LOS B, worsening to LOS C in 2040 No-E	Build			-	
•	Existing v/c 0.1, worsening to v/c 0.3 in 2040 No-E	Build			-	
•	Approximately 7 total crashes, but no high crash s	egments or spots			-	

Project Status:	Predesign	Project Phase Estimates:	(2	2019 Dollars)
SYP Number:	N/A	Planning:	\$	0
2035 KIPDA MTP:	# 462	Design:	\$	930,000
Functional Class:	Urban Major Collector	Right-of-Way:	\$	470,000
2018 ADT   % Trucks:	750 vpd   2%	Utilities:	\$	240,000
2040 No-Build ADT:	3,000 vpd	Construction:	\$	10,420,000
Rike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	12 060 000

Geometry: 3 sharp curves and 9 to 10-foot lanes.



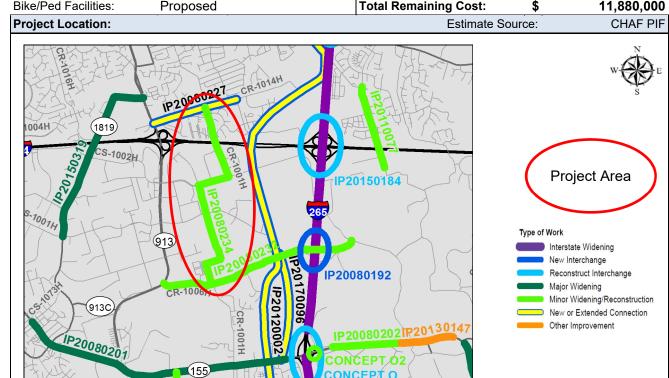
CHAF PIF Description:		Work Type:	Reconstruction
Local	CHAF IP20080234, Jefferson County	Name:	Tucker Station
Regional/		Route:	CR-1001H

Reconstruct Tucker Station Road from Rehl Road to Ellingsworth Lane. Project design will evaluate 2-lane road (no added lanes) and consider intersection improvements (S. Pope Lick, Rehl Road, & Ellingsworth Lane) and bicycle and pedestrian facilities.

MP	1.079	to	MP	3.538

MP 1.079 to MP 3.538	oject Len	gtn: 🛂	2.45	9 1/11
Identified Needs: Crash History Analysis Period:	July 2	2015 –	Jun	e 2018
	CCRF	MP	-	MP
<ul> <li>CHAF PIF notes ongoing growth, few I-64 crossings.</li> </ul>	N/A		<b> -</b>	
<ul> <li>Not sponsored in 2018 SHIFT.</li> </ul>				
Existing: 2 lanes			-	
Existing LOS C-D, worsening to LOS D-E in 2040 No-Build			-	
<ul> <li>Existing v/c 0.3, worsening to v/c 0.4-0.5 in 2040 No-Build</li> </ul>			-	
No crash data available				
Geometry: 5 sharp curves, 10-foot lanes			-	

Project Status:	Predesign	<b>Project Phase Estimates:</b>	(2	019 Dollars)
SYP Number:	N/A	Planning:	\$	0
2035 KIPDA MTP:	# 472	Design:	\$	930,000
Functional Class:	Urban Major Collector	Right-of-Way:	\$	470,000
2018 ADT   % Trucks:	4,220 vpd   6.9%	Utilities:	\$	240,000
2040 No-Build ADT:	6,300-7,800 vpd	Construction:	\$	10,240,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	11,880,000



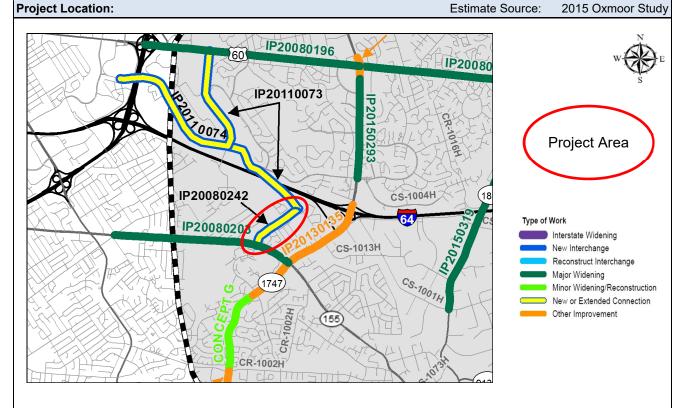
Regional/	CHAF IP20080242, Jefferson County	Route:	CS-1163H
Local		Name:	Blowing Tree Blvd.
<b>CHAF PIF Description:</b>		Work Type:	Extend/Widen

Extend & reconstruct Blowing Tree Boulevard from KY 155 (Taylorsville Road) to Bunsen Parkway. Project design will evaluate 3-lane road with two-way center turn lane and consider bicycle and pedestrian facilities.

MP	0.000	to	MP	0.459	Pro	oject Len	gth:	0.4	59	MI
Iden	tified Nee	eds:	•	•	Crash History Analysis Period:		•		ı	N/A
						CCRF	MP	-	M	Р
•	CHAF F	PIF no	otes d	ense de	evelopment, outlet for KY 155 and KY 1747 congestion.	N/A		-		

- Ranked 329th regionally in 2018 SHIFT.
- Existing: 2 lanes
- Narrow Lanes on existing section of Blowing Tree Blvd.
- Beyond scope of safety/operational analysis

Project Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	N/A	Planning:	\$	0
2035 KIPDA MTP:	# 258	Design:	\$	500,000
Functional Class:	N/A	Right-of-Way:	\$	450,000
2018 ADT   % Trucks:	1,900 vpd	Utilities:	\$	580,000
2040 No-Build ADT:	Beyond Model	Construction:	\$	3,000,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	4,530,000



Regional/ Local	CHAF IP20080252, Oldham County	Route: Name:	<b>KY 146</b> LaGrange Road
<b>CHAF PIF Description:</b>		Work Type:	Reconstruction

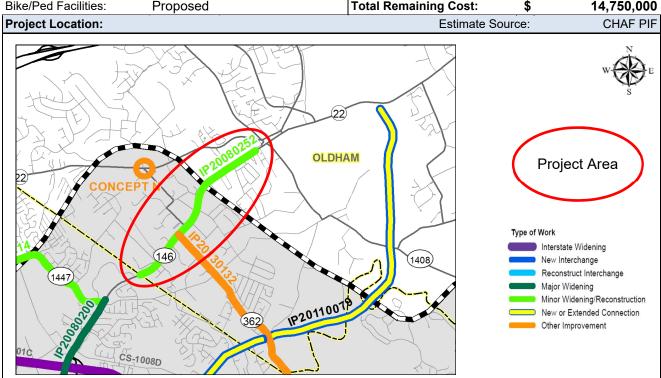
Reduce congestion, improve access, and provide better mobility for all modes along KY 146 from the Oldham/Jefferson county line to Pryor Avenue in Crestwood. Project design will consider reconstructing KY 146 as a 2-lane road (no additional lanes) from Jefferson/Oldham county line to Pryor Avenue in Oldham County with consideration for turn lanes at Ash Avenue. Houston Avenue. Maple Avenue, and Central Avenue.

Identified Needs:Crash History Analysis Period:July 2015 – June 201• CHAF PIF notes regional attractions, anticipated growth, adjacent rail line.• Not sponsored in 2018 SHIFT.  • Not sponsored in 2018 SHIFT.	VVILI	COHSIGE	alion	וטו נט	IIII Iaii63	o at Asii Avenue, Houston Avenue, Maple Avenue, and O	ciiliai <i>F</i>	wenue		
<ul> <li>CHAF PIF notes regional attractions, anticipated growth, adjacent rail line.</li> <li>Not sponsored in 2018 SHIFT.</li> <li>Existing: 2 lanes</li> <li>Existing LOS A-E, worsening to LOS E in 2040 No-Build</li> <li>Existing v/c 0.2-0.4,worsening to v/c 0.5 in 2040 No-Build</li> </ul>	MP	0.000	to	MP	2.021	Proj	ect Leng	th: <b>2</b> .	02 <sup>-</sup>	<b>1</b> M
<ul> <li>CHAF PIF notes regional attractions, anticipated growth, adjacent rail line.</li> <li>Not sponsored in 2018 SHIFT.</li> <li>Existing: 2 lanes</li> <li>Existing LOS A-E, worsening to LOS E in 2040 No-Build</li> <li>Existing v/c 0.2-0.4,worsening to v/c 0.5 in 2040 No-Build</li> </ul>	Iden	tified Nee	ds:			Crash History Analysis Period:	July 2	015 – Jı	une	2018
<ul> <li>Not sponsored in 2018 SHIFT.</li> <li>Existing: 2 lanes</li> <li>Existing LOS A-E, worsening to LOS E in 2040 No-Build</li> <li>Existing v/c 0.2-0.4,worsening to v/c 0.5 in 2040 No-Build</li> </ul>	_	CHAER	IF no	ntes re	e dional a	attractions, anticipated growth, adjacent rail line	CCRF	MP	-	MP
<ul> <li>Existing LOS A-E, worsening to LOS E in 2040 No-Build</li> <li>Existing v/c 0.2-0.4,worsening to v/c 0.5 in 2040 No-Build</li> </ul>					•		1.45	0.90	-	1.00
Existing v/c 0.2-0.4, worsening to v/c 0.5 in 2040 No-Build	•	_					1.22	1.00	-	1.10
									-	
		_				•			-	

0 high crash segments and 2 high crash spots, details at right

• Geometry: 10-foot lanes

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)		
SYP Number:	N/A	Planning:	\$	250,000	
2035 KIPDA MTP:	# 412	Design:	\$	1,500,000	
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$	500,000	
2018 ADT   % Trucks:	9,920-19,130 vpd   5.8%	Utilities:	\$	500,000	
2040 No-Build ADT:	12,000-24,000 vpd	Construction:	\$	12,000,000	
Rike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	14 750 000	

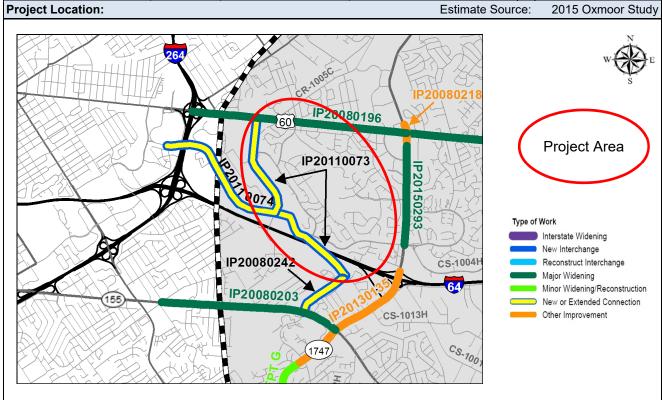


CHAF PIF Description:	CHAF IP20110073, Jeπerson County  Name: Bunsen	New Connector	
Local	OTIAL II 20110073, Sellerson County	Name:	Bunsen to Christian
Regional/	CHAE IP20110073 Lafferson County	Route:	<b>New Connector</b>

Improve safety & connectivity and reduce congestion along Shelbyville Road (US 60), Hurstbourne Lane (KY 1747), Interstate I-64 And Taylorsville Road (KY 155) in the vicinity of Oxmoor Farms. Project will consider a Bunsen Boulevard/Christian Way Connector as a 5 lane (5th lane will be a center turn lane) divided highway with consideration of bicycle and pedestrian facilities.

MP	-	to	MP	-	Pr	oject Len	gth:	-	MI
Iden	tified Ne	eds:			Crash History Analysis Period:				N/A
						CCRF	MP	-	MP
	CLIAET	)IF	-4		are with a consequent with and LIC CO. 9. I/V 1717	N/A		-	
•	conges		oles pro	oposea	growth, poor connectivity, and US 60 & KY 1747			-	
•	_		h regio	nally in	2018 SHIFT.			-	
•			_	•	erational analysis.			-	
•	Deyono	i Scop	DE 01 50	петуюр	eralional analysis.			1_1	

Predesign	Project Phase Estimates:		(2019 Dollars)
N/A	Planning:	\$	0
# 265	Design:	\$	2,250,000
N/A	Right-of-Way:	\$	560,000
N/A	Utilities:	\$	370,000
N/A	Construction:	\$	20,260,000
Proposed	Total Remaining Cost:	\$	23,440,000
	N/A # 265 N/A N/A N/A	N/A Planning: # 265 Design: N/A Right-of-Way: N/A Utilities: N/A Construction:	N/APlanning:\$# 265Design:\$N/ARight-of-Way:\$N/AUtilities:\$N/AConstruction:\$



Marie. Downing to Orinstian			
Local CHAF IP20110074, Jeπerson County	Name:	Bowling to Christian	
CHAF PIF Description:		Work Type:	New Connector

Improve safety and connectivity and reduce congestion along Shelbyville Road (US 60), Hurstbourne Lane (KY 1747), Interstate I-64 and Taylorsville Road (KY 155) in the vicinity of Oxmoor Farms. Project will consider a Bowling Boulevard/Christian Way Connector as a 5 lane (5th lane will be a center turn lane) divided highway with consideration of bicycle and pedestrian facilities.

MP - to	MP	-			Project I	_ength	ո:	-	М
Identified Needs:				Crash History Analysis Per	iod:				N//
					CC	RF	MP	-	MP
CHAF PIF no	tes nro	nnosed ara	wth poor connecti	vity, US 60 & KY 1747	N	/A		<u> - </u>	
congestion.	tos pro	oposca gre	Will, poor conficci	vity, 00 00 a 101 1741				-	
Ranked 157th	n regio	nally in 20	18 SHIFT.					H	
Beyond scope	e of sa	ifety/opera	tional analysis.					-	
								1-1	
Project Status:		Predesign		Project Phase Estimates	s:	(2019	Dolla	ars)	)
SYP Number:		N/A		Planning:	\$				
2035 KIPDA MTP:		# 260		Design:	\$		2	2,00	0,00
Functional Class:		N/A		Right-of-Way:	\$			86	0,00
2018 ADT   % Truck	s:	N/A		Utilities:	\$			89	00,00
2040 No-Build ADT:		N/A		Construction:	\$		20	),00	0,00
Bike/Ped Facilities:		Proposed		Total Remaining Cost:	\$		23,	750	0,00
Project Location:				Estimate	Source:	2015	Oxm	oor	Stuc
		264		IP20080218 20080196 D110073	Р	rojec	t Are	a	
			IP20080242	93 CS-1004H		ork sterstate V ew Interc econstruc	hange		

Other Improvement

Regional/ Local	CHAF IP20110077, Jefferson County	Route: Name:	CR-1002J S. English Stn. Rd.
CHAF PIF Description:		Work Type:	Reconstruction

Reconstruct South English Station Road (CR-1002J) from Poplar Lane to Christian Academy. Project design will evaluate 2-lane road (no added lanes) and consider bicycle and pedestrian facilities.

 MP
 2.950
 to
 MP
 3.900
 Project Length:
 0.950
 MI

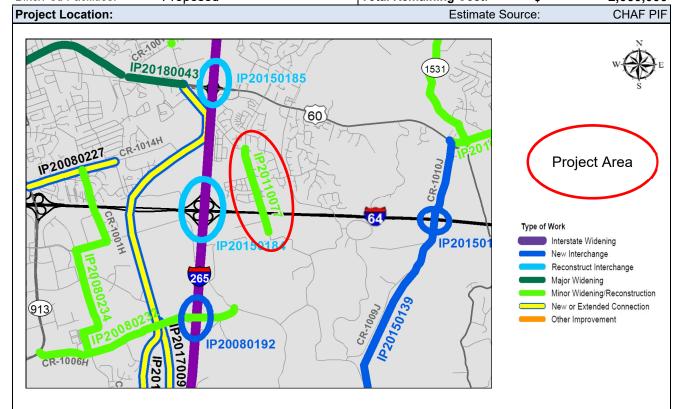
 Identified Needs:
 Crash History Analysis Period:
 N/A
 N/A

 • Not sponsored in 2018 SHIFT.

 • Existing: 2-3 lanes

 • Beyond scope of safety/operational analysis.

Project Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	N/A	Planning:	\$	0
2035 KIPDA MTP:	# 277	Design:	\$	150,000
Functional Class:	Urban Minor Collector	Right-of-Way:	\$	80,000
2018 ADT:	1,700 vpd	Utilities:	\$	30,000
2040 No-Build ADT:	N/A	Construction:	\$	1,800,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	2,060,000

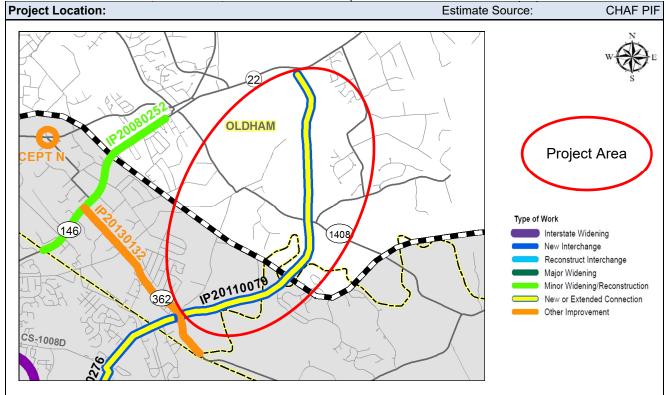


Regional/ Local	CHAF IP20110079, Oldham County		New Connector KY 3084 to KY 329B
CHAF PIF Description:		Work Type:	New Connector

New Route Between KY 362 (Ash Avenue) in Pewee Valley and KY 22 (Ballardsville Road)/KY 329B (KY 329Bypass) In Crestwood. Project is Section 2 of the 5-367.00 Crestwood Bypass Parent Project. Section 1, KY 3084 (Old Henry Road) From I-265 (Gene Snyder Freeway) To KY 362 (Ash Avenue), being constructed under 5-367.20. Project design will evaluate 3-lane roadway section with Two-Way Center Turn Lane and will consider accommodations for bicyclists and pedestrians.

acc	ommod	ations	for bi	cyclists a	nd pedestrians.				
MP	-	to	MP	-	Pr	oject Len	gth:	-	MI
Ident	ified Ne	eds:			Crash History Analysis Period:				N/A
						CCRF	MP	-	MP
						N/A		T-T	
•	CHAF I	PIF no	otes pr	roposed c	connection replacing KY 146.			-	
•	Not spo	onsore	ed in 2	018 SHIF	FT.			T-T	
•	Beyond	d scop	e of s	afety/ope	rational analysis.			-	
								T	

Project Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	N/A	Planning:	\$	0
2035 KIPDA MTP:	# 198	Design:	\$	3,600,000
Functional Class:	N/A	Right-of-Way:	\$	1,800,000
2018 ADT   % Trucks:	N/A	Utilities:	\$	710,000
2040 No-Build ADT:	N/A	Construction:	\$	41,220,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	47,330,000

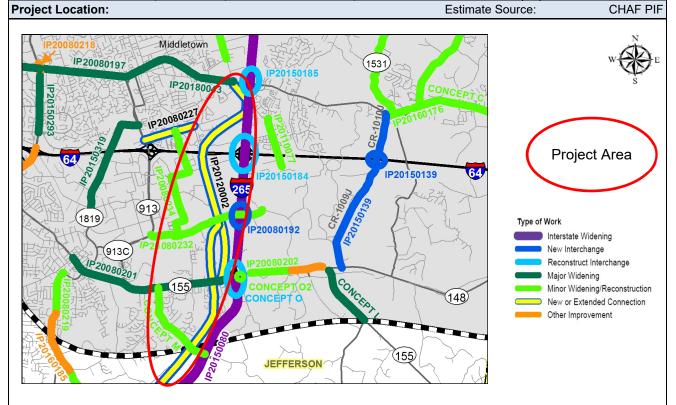


Regional/ Local	CHAF IP20120002, Jefferson County	Route: Name:	New Extension Urton Lane
CHAF PIF Description:		Work Type:	New Connector

Extend Urton Lane from North of I-64 to Seatonville Road. Includes consideration of facilities for all modes (pedestrian, bicycle, SOV, and transit).

MP -	- to	o M	IΡ	-		Р	roject Len	gth:	-	MI
Identified Needs: Crash History Analysis Period:								N/A		
							CCRF	MP	-	MP
							N/A		-	
CHAF PIF notes planned growth, development potential; outlet for I-265.							-			
Not sponsored in 2018 SHIFT.								-		
<ul><li>Bey</li></ul>	ond sc	оре с	of safe	ety/o <sub>l</sub>	erational analysis.				-	
							_			

Project Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	5-376.00	Planning:	\$	0
2035 KIPDA MTP:	# 474	Design:	\$	4,000,000
Functional Class:	N/A	Right-of-Way:	\$	3,000,000
2018 ADT   % Trucks:	2,400-6,500 vpd on Urton Ln.	Utilities:	\$	2,500,000
2040 No-Build ADT:	N/A	Construction:	\$	52,000,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	61,500,000
<b>.</b>	<del></del>	F (: 1 0		01145 515

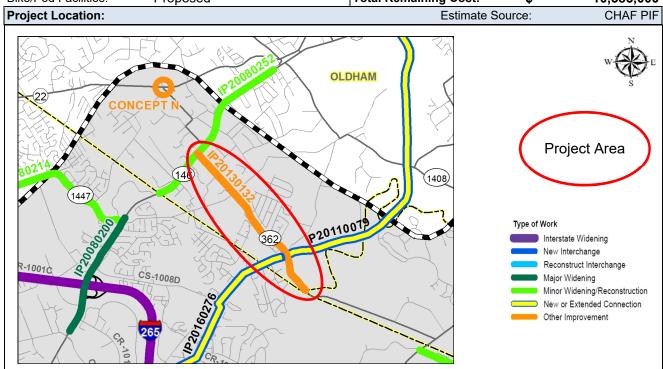


CHAF PIF Description:		Work Type:	Safety/Hazard Elim.
Local	OTIAL II 20100102, Oldhaill County	Name:	Ash Avenue
Regional/	CHAF IP20130132, Oldham County	Route:	KY 362

Improve safety, access, and address geometric deficiencies along KY 362 from the Oldham/Shelby county line to KY 146 (in and south of Pewee Valley). Includes consideration of a 3-lane widening with a two-way left turn lane and bike/ped accommodations.

MP <b>0.975</b> to MP <b>3.039</b>	Project Len	gth: 2	.06	4 MI
Identified Needs: Crash History Analysis Period: July 2015 –				
CHAF PIF notes future connection to Old Henry Rd (IP20110079).	CCRF	MP	-	MP
Not sponsored in 2018 SHIFT.	1.80	1.50	-	1.60
Existing: 2 lanes			-	
<ul> <li>Existing LOS B-D, worsening to LOS C-D in 2040 No-Build</li> <li>Existing v/c 0.1-0.2, worsening to v/c 0.1-0.3 in 2040 No-Build</li> </ul>			-	
16 total crashes: 0 fatal/2 injury/14 PDO			-	
0 high crash segments and 1 high crash spot, details at right			-	
<ul> <li>Geometry: 2 sharp curves, 1 fair and 1 poor condition bridge, 9-foot lanes</li> </ul>			1.	

Project Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	N/A	Planning:	\$	250,000
2035 KIPDA MTP:	N/A	Design:	\$	1,365,000
Functional Class:	Urban Major/Minor Collector	Right-of-Way:	\$	1,000,000
2018 ADT   % Trucks:	1,590-4,290 vpd   5%	Utilities:	\$	420,000
2040 No-Build ADT:	3,100-6,900 vpd	Construction:	\$	7,350,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	10,385,000



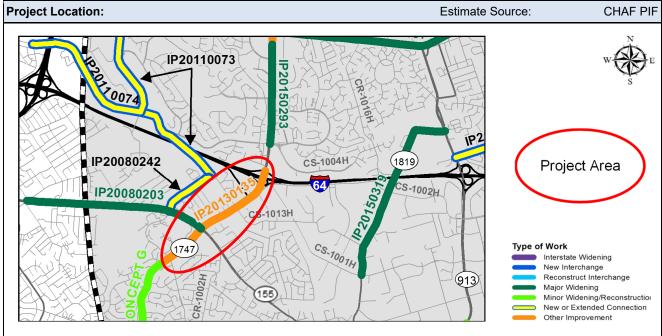
CHAF PIF Description:		Work Type:	Congestion Mgt.
Significance	OTIAL II 20130133, Sellerson Sounty	Name:	Hurstbourne Pkwy
Statewide	CHAF IP20130135, Jefferson County	Route:	KY 1747

REDUCE CONGESTION AND IMPROVE SAFETY ALONG KY 1747 (HURSTBOURNE PARKWAY) FROM STONY BROOK DRIVE TO I-64.

MP	10.500	to	MP	11.995	Project Length:	1.495	MI
----	--------	----	----	--------	-----------------	-------	----

1411	10.000		ojoot Lon	9 <b>.</b>	0		
lden	Identified Needs: Crash History Analysis Period:			July 2015 – June 2018			
	D		CCRF	MP	-	MP	
•	Ranked 11th regionally in 2018 SHIFT.		1.03	9.58	-	11.03	
•	Existing LOS B-C, maintaining LOS B-C in 2040 No-Build			11.03	-	11.12	
•				11.21	-	11.63	
•	709 total crashes: 0 fatal /75 injury/634 PDO		2.06	11.63	-	11.74	
•	5 high crash segments and 9 high crash spots (segn at right)	nents and highest spot listed	1.00	11.74	-	11.92	
	at right)			11.4	-	11.5	

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)		
SYP Number:	5-555.00	Planning:	\$	250,000	
2035 KIPDA MTP:	# N/A	Design:	\$	275,000	
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$	100,000	
2018 ADT   % Trucks:	32,680-56,410 vpd   3-4%	Utilities:	\$	50,000	
2040 No-Build ADT:	34,000-62,000 vpd	Construction:	\$	2,761,279	
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	3,436,279	



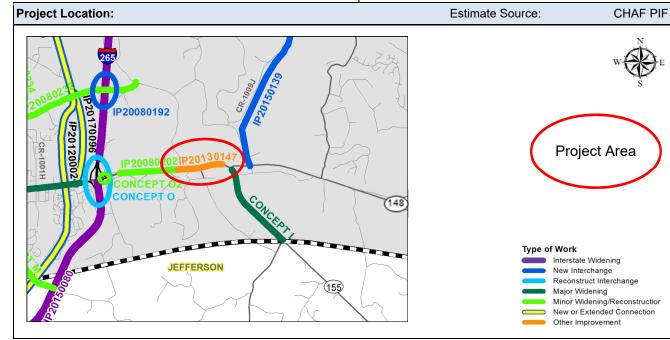
Statewide	CHAF IP20130147, Jefferson County	Rout		KY 155
Significance	CHAI IF 20 130 147, Seller Soll County	N	ame:	Taylorsville Road
CHAF PIF Description:		Work Type:	Safet	y/Hazard Elimination

SAFETY PROJECT FOR RECONSTRUCTION OF TAYLORSVILLE ROAD AND SOUTH POPE LICK ROAD INTERSECTION AND BRIDGE OVER POPE LICK CREEK.(2016BOP)

MP	4.400	to	MP	5.000

MP <b>4.400</b> to MP <b>5.000</b>	Project Leng	ıth: (	.60	0 MI
Project Issues/Existing Conditions: Crash History Analysis Period:				2018
	CCRF	MP	-	MP
Ranked 79th regionally in 2018  Frieding 2 Lange	2.78	4.8	-	4.9
<ul> <li>Existing: 2 lanes</li> <li>Existing LOS E, maintaining LOS E in 2040 No-Build</li> <li>Existing v/c 0.5, worsening to v/c 0.7 in 2040 No-Build</li> <li>47 total crashes: 1 fatal/18 injury/28 PDO</li> <li>0 high crash segments and 1 high crash spot, details at right</li> </ul>			-	
			-	
			-	
			-	
Geometry: poor condition bridge			-	

Project Status:	Ongoing design	Project Phase Estimates:	(2019 Dollars)		
SYP Number:	5-808.00	Planning:	\$	0	
2035 KIPDA TIP:	TIP # 1507	Design:	\$	Authorized	
Functional Class:	Rural Minor Arterial	Right-of-Way:	\$	175,000	
2018 ADT   % Trucks:	20,130 vpd   7.5%	Utilities:	\$	150,000	
2040 No-Build ADT:	29,000 vpd	Construction:	\$	1,800,000	
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	2,125,000	



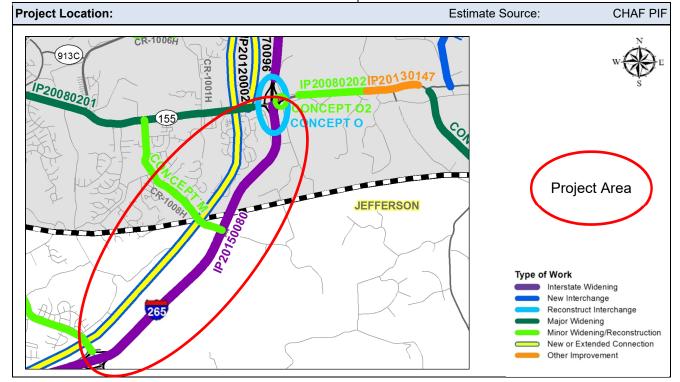
<b>CHAF PIF Description:</b>		Work Type:	Major Widening
Significance	onal in 20100000, beliefson obuity	Name:	Gene Snyder
Statewide	CHAF IP20150080, Jefferson County	Route:	I-265

IMPROVE SAFETY AND REDUCE CONGESTION ON I-265 FROM US-31E (BARDSTOWN RD) TO KY-155 (TAYLORSVILLE RD).

MP **17.300** to MP **23.100** Project Length: **5.800** MI

		-			
Identified Needs: Crash History Analysis Period:					N/A
		CCRF	MP	-	MP
<ul> <li>Priority 5 of 5 in 2015 Programming Study.</li> </ul>		N/A		-	
<ul><li>Ranked 29th statewide in 2018 SHIFT.</li><li>Existing: 4 lanes</li></ul>				-	
<ul> <li>Existing, 4 lanes</li> <li>Beyond scope of safety/operational analysis.</li> </ul>				- [	
				-	

Project Status:	Predesign	Project Phase Estimates:	(2	2019 Dollars)
SYP Number:	5-558.00	Planning:	\$	0
2035 KIPDA MTP:	# 959	Design:	\$	7,500,000
Functional Class:	Urban Interstate	Right-of-Way:	\$	2,030,000
2018 ADT   % Trucks:	66,000-71,000 vpd   9-12%	Utilities:	\$	1,200,000
2040 No-Build ADT:	77,000-83,000 vpd	Construction:	\$	75,000,000
Bike/Ped Facilities:	N/A	Total Remaining Cost:	\$	85,730,000



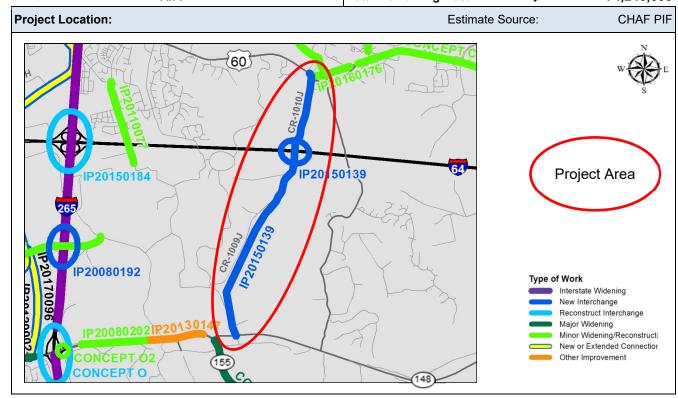
Statewide	CHAF IP20150139, Jefferson County	Route:	I-64
Significance		Name:	
CHAF PIF Description:		Work Type:	New Interchange at Eastwood

NEW INTERCHANGE ON I-64E EAST OF THE GENE SNYDER FREEWAY. EASTWOOD FISHERVILLE CONNECTOR TO I-64. (18CCN)

MP	21.000	to	MP	22.000	Project Length:	1.000	М

Identified Needs:	Crash History Analysis Period:				N/A
		CCRF	MP	-	MP
D 1 1400H 1 H 1 0040 01HET		N/A		-	
<ul> <li>Ranked 186th regionally in 2018 SHIFT.</li> <li>Beyond scope of safety/operational analysis.</li> </ul>				-	
beyond scope of safety/operational analysis.				-	

Project Dev. Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	5-80002/80000/8200.1	Planning:	\$	1,400,000
2035 KIPDA MTP:	# 390	Design:	\$	4,500,000
Functional Class:	Rural/Urban Minor Collector	Right-of-Way:	\$	10,190,000
2018 ADT   % Trucks:	60,000 vpd   9.5 %	Utilities:	\$	2,450,000
2040 No-Build ADT:	75,000 vpd	Construction:	\$	55,700,000
Bike/Ped Facilities:	N/A	Total Remaining Cost:	\$	74,240,000



Project Length: **0.6** MI

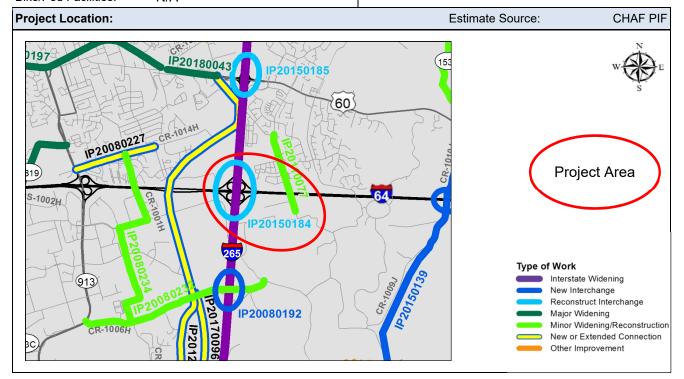
MP **26.500** to MP **27.100** l-265

Statewide Significance	CHAF IP20150184, Jefferson County	Route: Name:	<b>I-265 &amp; I64</b> Gene Snyder & I-64
CHAF PIF Description:		Work Type:	Interchange Reconstruction

# RECONSTRUCTION OF THE I-265/I-64 INTERCHANGE. (2016BOP)

MP	24.600	to	MP	26.400	I-265						Proj	ect Leng	ıth:	1.8	в МІ
MP	18.600	to	MP	19.200	I-64									0.6	6 MI
ldei	ntified Nee	ds:					Crasl	n Histor	y Analy	ysis Peri	od:				N/A
•	Priority in	201	5 Pro	grammiı	ng Study	•						CCRF	MP	-	MP
•				•	,	d 22nd regio	nally (#5	-21.2) i	n 2018	SHIFT.		N/A		_	
•	Existing:													H	
•	Beyond s	cope	or sa	пету/оре	erational	anaiysis.								-	

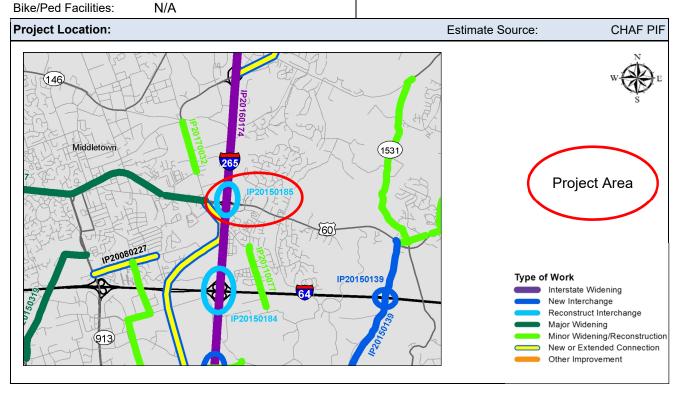
<ul> <li>Beyond scope of</li> </ul>	safety/operational analysis.			-
Project Status:	Ongoing design	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	5-549.00/01	Planning:	\$	0
2035 KIPDA MTP:	# 179	Design:	\$	540,000
Functional Class:	Rural/Urban Interstates	Right-of-Way:	\$	1,250,000
2018 ADT   % Trucks:	I-265: 48,500 vpd   10.6%	Utilities:	\$	1,270,000
2016 ADT   % TIUCKS.	I-64: 60,000-95,000 vpd   9.5%	Construction:	\$	38,720,000
2040 No-Build ADT:	I-265: 56,000-111,000 vpd	Total Remaining Cost:	\$	41,330,000
Bike/Ped Facilities:	N/A		•	



Statewide			Route:	I-265 & US 60
Significance	CHAF IP20150185, Jefferson County		Name:	Gene Snyder Shelbyville Road
CHAF PIF Description:		Work Type:	Intercha	ange Reconstruction

SNYDER FREEWAY; RECONSTRUCT I-265/US-60 INTERCHANGE AS A SINGLE POINT URBAN INTERCHANGE AND CONSTRUCT NEEDED IMPROVEMENTS TO CONNECT WITH THE I-265/I-64 INTERCHANGE (2006BOPC)

			, .	•		
MP <b>11.800</b> to M	P <b>12.300</b> US 60				0.5	MI
Identified Needs:		Crash History Analysis Period:				N/A
Ranked 185th red	gionally (#5-41.10) in 2018 SHIFT.		CCRF	MP	-	MP
•	lanes; US 60, 4 lanes		N/A		-	
<ul> <li>Beyond scope of</li> </ul>	safety/operational analysis.				-	
Project Status:	Predesign	Project Phase Estimates:	(20	19 Dol	lars	<b>s</b> )
SYP Number:	5-41.10	Planning:	\$			0
2035 KIPDA MTP:	N/A	Design:	\$		3,2	50,000
Functional Class:	Urban Interstate/Arterial	Right-of-Way:	\$		4,2	60,000
2019 ADT L % Trucker	I-265: 86,500 vpd   10%	Utilities:	\$		4,2	60,000
2018 ADT   % Trucks:	US 60: 34,500 vpd   2 %	Construction:	\$	5	2,6	40,000
2040 No-Build ADT:	I-265: 56,000-111,000 vpd	Total Remaining Cost:	\$	64	1,41	0,000
Pika/Pad Facilities:	NI/A					



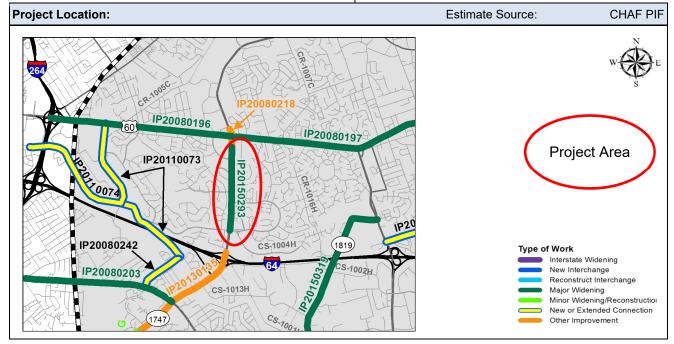
Statewide	CHAF IP20150293, Jefferson County	Route:	KY 1747
Significance		Name:	Hurstbourne Lane
CHAF PIF Description:		Work Type:	Reconstruction

WIDEN SOUTHBOUND HURSTBOURNE LANE TO 3 LANES FROM LINN STATION RD (CS-1004H) TO EDEN AVE (CS-1660H).

MP 12 289 to MP 13 362 Project Length: 1 073 MI

IVIP 12.209 10 IVIP 13.302	PI	oject Len	igiri. 1	.07	3 IVII
Identified Needs:	Crash History Analysis Period:	July :	2015 – .	Jun	e 2018
		CCRF	MP	-	MP
Ranked 36th statewide and 32nd regionally in 20	18 SHIFT.	1.14	12.20	-	12.30
Existing: 5 lanes		1.01	13.00	-	13.10
<ul> <li>Existing LOS B-C, maintaining LOS B in 2040 No</li> <li>Existing v/c 0.3-0.4,maintaining v/c 0.4 in 2040 No</li> </ul>				-	
<ul> <li>205 total crashes: 0 fatal/33 injury/172 PDO</li> </ul>	J-Dullu			-	
0 high crash segments and 2 high crash spots, de-	etails at right			-	
				-	

Project Status:	ROW & Utilities cleared	Project Phase Estimates:	(20	019 Dollars)
SYP Number:	5-344.01	Planning:	\$	0
2035 KIPDA MTP:	# 359	Design:	\$	Authorized
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$	100,000
2018 ADT   % Trucks:	33,930 vpd   2%	Utilities:	\$	2,380,000
2040 No-Build ADT:	26,000-40,000 vpd	Construction:	\$	3,330,000
Bike/Ped Facilities:	Not Proposed	Total Remaining Cost:	\$	5,810,000



CHAF PIF Description:		Name: Work Type:	Watterson Trail  Major Widening
Regional/ Local	CHAF IP20150319, Jefferson County	Route:	KY 1819

RECONSTRUCT AND WIDEN WATTERSON TRAIL FROM PLANTSIDE DRIVE TO BLANKENBAKER ROAD. (98CCR)

|--|

MP <b>10.795</b> to MP <b>12.811</b>	Pr	oject Len	igth: 2	2.01	16 MI
dentified Needs:	Crash History Analysis Period:	July 2	2015 – .	Jun	e 2018
		CCRF	MP	-	MP
Ranked 100th regionally in 2018 SHIFT.  Existing: 2 lanes  Existing LOS E, maintaining LOS E in 2040 No-Build  Existing v/c 0.2-0.3,worsening to v/c 0.2-0.4 in 2040 No-Build  79 total crashes: 0 fatal/11 injury/68 PDO  0 high crash segments and 3 high crash spots, details at right  Geometry: 6 sharp curves		1.24	10.70	-	10.80
		1.12	11.90	-	12.00
		3.10	12.40	-	12.50
				-	
				-	
-					

Project Status:	ROW complete.	<b>Project Phase Estimates:</b>	(2	019 Dollars)
SYP Number:	5-373.00	Planning:	\$	0
2035 KIPDA MTP:	# 233	Design:	\$	Authorized
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$	Authorized
2018 ADT   % Trucks:	5,840-10,880 vpd   8-9%	Utilities:	\$	2,870,000
2040 No-Build ADT:	8,000-13,000 vpd	Construction:	\$	12,410,000
Bike/Ped Facilities:	Not Proposed	Total Remaining Cost:	\$	15,280,000



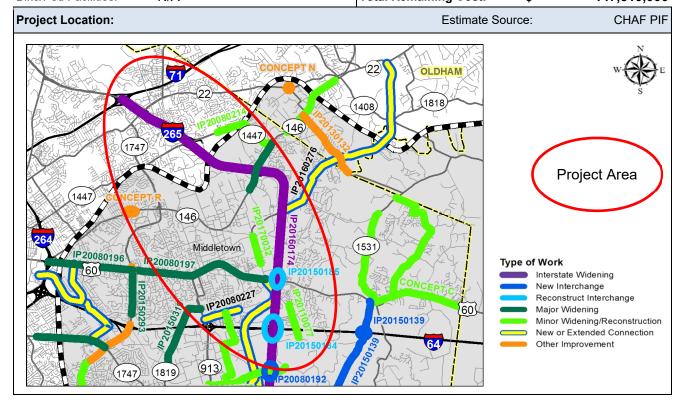
<b>CHAF PIF Description:</b>		Work Type:	Major Widening
Significance	onal in 20100174, beliefson county	Name:	Gene Snyder
Statewide	CHAF IP20160174, Jefferson County	Route:	I-265

# SIX LANE PRIORITY SECTION OF I-265 BETWEEN TAYLORSVILLE ROAD AND I-71.

MP **23.409** to MP **34.727** Project Length: 11.318 MI

lder	ntified Needs:	Crash History Analysis Period:		٠		N/A
			CCRF	MP	-	MP
	Priority 1-2-4 in 2015 Programming Study.		N/A		-	
•	Ranked 1st statewide in 2018 SHIFT.				-	
•	Existing: 4 lanes Beyond scope of safety/operational analysis.				-	
	y 1 y 1				-	

Project Dev. Status:	Ongoing design	Project Phase Estimates:	(2019 Dollars)
SYP Number:	5-537	Planning:	\$ 0
2035 KIPDA MTP:	# 958	Design:	\$ Authorized
Functional Class:	Urban Interstate	Right-of-Way:	\$ 3,150,000
2018 ADT   % Trucks:	48,500-86,500 vpd   10-11%	Utilities:	\$ 4,160,000
2040 No-Build ADT:	56,000-95,000 vpd	Construction:	\$ 140,000,000
Bike/Ped Facilities:	N/A	Total Remaining Cost:	\$ 147,310,000



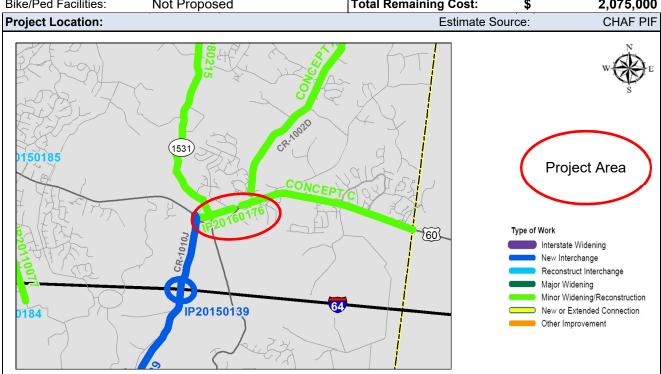
Regional/	CHAF IP20160176, Jefferson County	Route:	US 60
Local		Name:	Shelbyville Road
CHAF PIF Description:		Work Type:	Minor Widening

WIDEN US-60 TO THREE LANES FROM EASTWOOD CUTOFF (MP 14.7) TO ROCKCREST WAY (MP 15.1). (16CCN)

	MP	14.718	to	MP	15.114
--	----	--------	----	----	--------

MP 14./18 to MP 15.114	Pr	oject Len	igth: (	J.3s	96 M
Identified Needs:	Crash History Analysis Period:	July 2	2015 –	Jur	e 2018
		CCRF	MP	-	MP
Ranked 80th regionally in 2018 SHIFT.      Striction: 4 lange.		1.03	14.70	-	14.80
<ul> <li>Existing: 4 lanes</li> <li>Existing LOS B, maintaining LOS B in 2040 No-Box</li> </ul>	uild			-	
• Existing v/c 0.3,worsening to v/c 0.4 in 2040 No-B				-	
• 32 total crashes: 1 fatal/3 injury/28 PDO • 0 high crash sognosts and 1 high crash spot dot	oile at right			-	
<ul> <li>0 high crash segments and 1 high crash spot, details at right</li> <li>Geometry: 4 sharp curves</li> </ul>				-	
, ,					

Project Status:	Predesign	Project Phase Estimates:	(20	019 Dollars)
SYP Number:	5-8952.00	Planning:	\$	0
2035 KIPDA MTP:	Overlaps # 953 (MP 14.7-16.5)	Design:	\$	325,000
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$	400,000
2018 ADT   % Trucks:	19,330 vpd   6.6%	Utilities:	\$	450,000
2040 No-Build ADT:	26,000 vpd	Construction:	\$	900,000
Bike/Ped Facilities:	Not Proposed	<b>Total Remaining Cost:</b>	\$	2,075,000



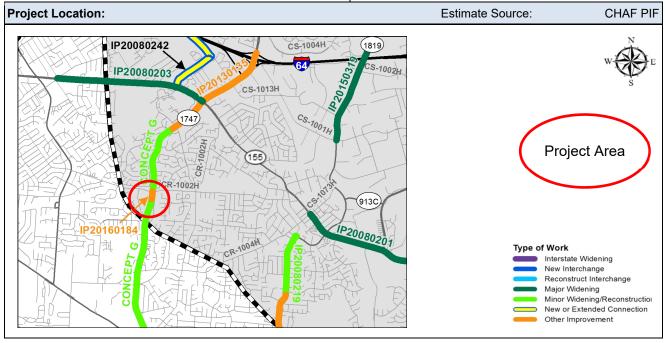
Statewide	CHAF IP20160184, Jefferson County	Route:	KY 1747
Significance	onal in 20100104, ocherson county	Name:	Hurstbourne Lane
<b>CHAF PIF Description:</b>	Work Type:		Safety/Hazard Elimination

EXTEND THE LEFT TURN LANE ON HURSTBOURNE LANE AT INTERSECTION WITH SIX MILE LANE. (16CCN)

MP **9.483** to MP **9.583** Project Length: **0.100** MI

MP	9.483 to MP 9.583	Pro	oject Len	gtn: <b>t</b>	).10	) <b>U</b>  V
Project Issues/Existing Conditions: Crash History Analysis Period:		July 2	2015 – .	Jun	e 2018	
			CCRF	MP	-	MP
•	Ranked 156th regionally in 2018 SHIFT.		1.78	9.5	-	9.6
•	Existing: 4 lanes					
•	<ul> <li>Existing LOS B, maintaining LOS B in 2040 No-Build</li> <li>Existing v/c 0.3, worsening to v/c 0.4 in 2040 No-Build</li> <li>29 total crashes: 0 fatal/3 injury/26 PDO</li> </ul>				-	
•					-	
•					_	
•	0 high crash segments and 1 high crash spot	, details at right				
•	Geometry: 1 sharp curve	-			-	
					-	

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)
SYP Number:	5-8905.00	Planning:	\$ 0
2035 KIPDA MTP:	# 2383	Design:	\$ 85,000
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$ 0
2018 ADT   % Trucks:	24,300 vpd   4.3%	Utilities:	\$ 0
2040 No-Build ADT:	34,000 vpd	Construction:	\$ 115,000
Bike/Ped Facilities:	Not Proposed	Total Remaining Cost:	\$ 200,0000

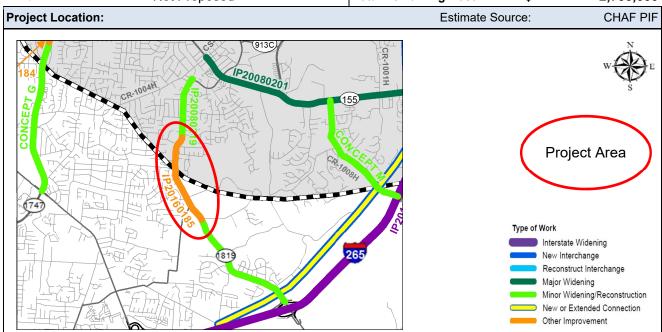


Regional/	CHAF IP20160185, Jefferson County	Route:	KY 1819
Local	onal il 20100100, belleison county	Name:	Billtown Road
CHAF PIF Description:		Work Type:	Reconstruction

RECONSTRUCT BILLTOWN ROAD FROM NORTH OF COLONNADES PLACE TO SOUTH OF EASUM ROAD.(04CCN)(06CCN)(08CCR)(10CCR)(12CCR)

dentified Needs:	Crash History Analysis Period:	July 20	)15 – J	une	2018
		CCRF	MP	-	MP
· ,	Ranked 17th regionally in 2018 SHIFT.			-	
<ul><li>Existing: 2 lanes</li><li>Existing LOS E, maintaining LOS E in 2040 No-Build</li></ul>				-	
<ul> <li>Existing v/c 0.5, worsening to v/c 0.6-0.7 in 20</li> </ul>				-	
• 39 total crashes: 0 fatal/4 injury/35 PDO				1-1	
0 high crash segments and 0 high crash spots				1_	
• Geometry: 3 sharp curves and 10-foot lanes					

Project Status:	ROW complete	Project Phase Estimates:	(2019 Dollars)		
SYP Number:	5-8203.00	Planning:	\$	0	
2035 KIPDA MTP:	# 1819	Design:	\$	Authorized	
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$	Authorized	
2018 ADT   % Trucks:	13,770-13,900 vpd   4-7%	Utilities:	\$	Authorized	
2040 No-Build ADT:	18,000 vpd	Construction:	\$	2,700,000	
Bike/Ped Facilities:	Not Proposed	Total Remaining Cost:	\$	2,700,000	

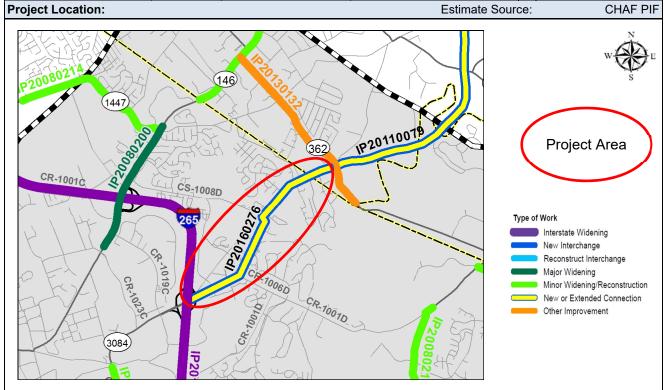


Local  CHAF PIF Description:	CHAF IP20160276, Oldham County		Old Henry to KY 362  New Connector
Regional/	CHAF IP20160276, Oldham County	Route:	New Extension

# EXTENSION OF OLD HENRY ROAD EAST TO ASH AVENUE (KY362). (12CCR)(18CCN)

MP	-	to	MP	-	Р	roject Len	gth:	-	MI
den	tified Ne	eds:			Crash History Analysis Period:		<u>-</u>		N/A
						CCRF	MP	-	MP
	CLIAE	NIAE DIE		N/A		1-1			
•	Rd toda		otes tra	es traffic uses residential Village Green Blvd to access Old Henry				<b>-</b>	
•		-	h regio	nally i	2018 SHIFT			-	
•			29th regionally in 2018 SHIFT. cope of safety/operational analysis.				-		
•	Deyond	i Scop	U 30	aiety/O	cialional analysis.			-	

Project Status:	Utilities ongoing	<b>Project Phase Estimates:</b>	(2	019 Dollars)
SYP Number:	5-367.20/.21	Planning:	\$	0
2035 KIPDA MTP:	N/A	Design:	\$	Authorized
Functional Class:	N/A	Right-of-Way:	\$	Authorized
2018 ADT   % Trucks:	N/A	Utilities:	\$	Authorized
2040 No-Build ADT:	N/A	Construction:	\$	18,180,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	18,180,000



Regional/	CHAF IP20170032, Jefferson County	Route:	CR-1006C
Local	CHAI IF 20170032, Sellerson County	Name:	N English Station
CHAF PIF Description:		Work Type:	Minor Widening

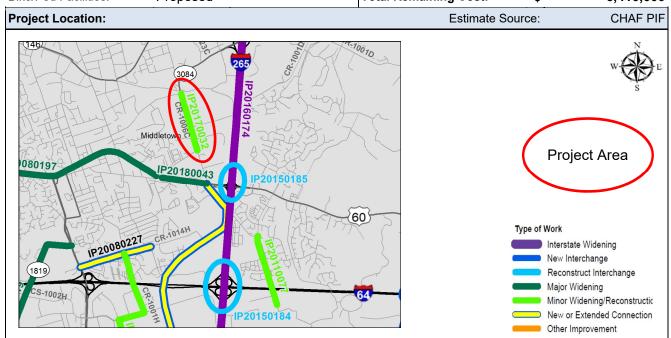
WIDEN ENGLISH STATION ROAD FROM 2 TO 3 LANES (3RD LANE WILL BE A CENTER LANE) FROM AIKEN ROAD TO AVOCA ROAD. (FUNDING SUBJECT TO FISCAL CONSTRAINT PENDING MPO TIP).

MP	0.457	to	MP	1.232		Project Len	igth: 0	.77	5 MI
Iden	tified Ne	ds:			Crash History Analysis Period:	July 2	2015 – .	Jun	e 2018
						CCRF	MP	-	MP
•	Ranked	32nd	l regio	nally in 2	018 SHIFT.	N/A		-	
•	Existing	: 2 laı	nes						
•	Existing	LOS	E, ma	intaining	LOS E in 2040 No-Build				
•	Existing	v/c 0	.6,wor	sening to	v/c 0.6-0.8 in 2040 No-Build			_	

Locally-maintained high crash location

Geometry:10-foot lanes

Project Status:	Ongoing design and ROW	ng design and ROW Project Phase Estimates:		019 Dollars)
SYP Number:	5-353.00	Planning:	\$	0
2035 KIPDA MTP:	# 188	Design:	\$	Authorized
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$	Authorized
2018 ADT   % Trucks:	17,400 vpd   8.6%	Utilities:	\$	Authorized
2040 No-Build ADT:	16,000-22,000 vpd	Construction:	\$	6,410,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	6,410,000



Regional/ Local	CHAF IP20170096, Jefferson County	Route: Name:	New Extension Plantside Drive
CHAF PIF Description:		Work Type:	New Connector

# EXTEND PLANTSIDE DRIVE FROM REHL ROAD TO TAYLORSVILLE ROAD (18CCN)

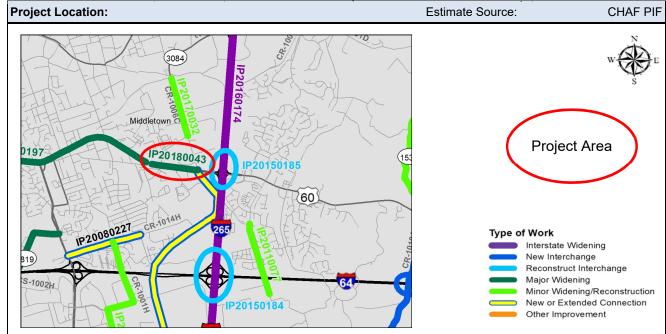
	· -	•	Project Leng	gu 1.	- M
dentified Needs:		Crash History Analysis Period:			N/A
			CCRF N/A	MP	· MP
			IN/A		
<ul> <li>Not sponsored in 2</li> </ul>					
Beyond scope of s	safety/operational analysis.				
					•
Project Status:	Predesign	Project Phase Estimates:	•	19 Dolla	rs)
SYP Number:	5-80003.00	Planning:	\$		
035 KIPDA MTP:	# 458	Design:	\$		,663,00
unctional Class:	N/A	Right-of-Way:	\$	8	,200,00
018 ADT   % Trucks:	2,400-6,500 vpd	Utilities:	\$		800,00
040 No-Build ADT:	N/A	Construction:	\$		,000,00
Project Location:	Proposed	Total Remaining Cost:  Estimate Sou	\$	•	<b>663,00</b> HAF PI
913C) P20080232	IP20080192*	Serios Use In the Control of the Con	Proje	ect Are	

Statewide	CHAF IP20180043, Jefferson County	Route:	US 60
Significance		Name:	Shelbyville Road
CHAF PIF Description:		Work Type:	Major Widening

# WIDEN US-60 TO 6 LANES FROM OLD SHELBYVILLE RD. TO NORTH ENGLISH STATION RD. (18CCN)

Identified Needs:	Cra	ash History Analysis Period:	July 2015 – June 201				
			CCRF	MP	-	MP	
Not sponsored in 2018 SHIFT.	Not sponsored in 2018 SHIFT.						
• Existing: 4 lanes				11.10	-	11.20	
<ul> <li>Existing LOS C, worsening to LOS D in 2040 N</li> <li>Existing v/c 0.6, worsening to v/c 0.7-0.8 in 2040 N</li> </ul>			1.01	11.20	-	11.30	
<ul> <li>208 total crashes: 0 fatal/20 injury/209 PDO</li> </ul>	-10 110 L	Sulla	1.21	11.50	-	11.06	
• 1 high crash segment and 4 high crash spots,					-	11.70	
					-		
Project Status: Predesign	(2019 Dollars)						

Project Status:	Predesign	Project Phase Estimates:	(	(2019 Dollars)
SYP Number:	5-80001.00	Planning:	\$	0
2035 KIPDA MTP:	N/A	Design:	\$	1,255,000
Functional Class:	Urban Principal Arterial	Right-of-Way:	\$	550,000
2018 ADT   % Trucks:	32,430-35,620 vpd   9.6%	Utilities:	\$	720,000
2040 No-Build ADT:	41,000-45,000 vpd	Construction:	\$	1,500,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	4,025,000



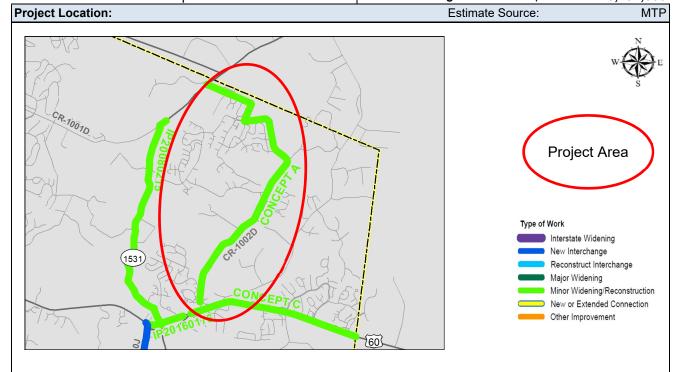
Regional/	Concept A, Jefferson County	Route:	CR-1002D
Local		Name:	Flat Rock Road
<b>Project Description:</b>		Work Type:	Minor Widening

Improve safety on Flat Rock Road (CR-1002D) from Shelbyville Road (US 60) to Aiken Road (KY 1531). Project will evaluate widening with no additional thru lanes and consider bicycle and pedestrian facilities. Bicycle and pedestrian facilities would be proposed due to parks etc. in area.

MP **0.000** to MP **3.848** Project Length: **0.587** MI

Identified Needs: Crash History Analysis F	Period:			N/A
	CCRF	MP	-	MP
Large scale development planned in vicinity.	N/A		-	
<ul> <li>US 60 intersection already improved.</li> </ul>			-	
<ul><li>Existing: 2 lanes</li><li>3 total crashes: 0 fatal/0 injury/3 PDO</li></ul>			-	
Geometry: Sharp curves, 10-foot lanes			-	
Beyond scope of safety/operational analysis.			-	

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)			
SYP Number:	N/A	Planning:	\$	0		
2035 KIPDA MTP:	# 1323	Design:	\$	6,350,000		
Functional Class:	Urban Minor Collector	Right-of-Way:	\$	2,309,000		
2018 ADT   % Trucks:	4,800 vpd	Utilities:	\$	3,078,000		
2040 No-Build ADT:	Beyond model	Construction:	\$	63,500,000		
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	75,237,000		



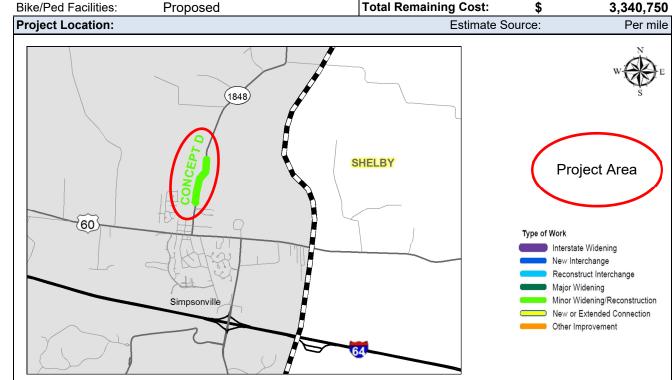
Regional/ Local	Concept D, Shelby County	Route: Name:	<b>KY 1848</b> Todds Point Road
Project Description:		Work Type:	Minor Widening

Improve connectivity to KY 1848 (Todds Point Road) from Grand Central Drive to approximately 3,100 feet north of Grand Central Drive. Project will consider roadway widening with no additional thru lanes and bicycle and pedestrian facilities.

MP <b>6.418</b> to MP <b>7.005</b> Project Length: <b>0.587</b> M	MP	6.418	to	MP	7.005	Project Length:	0.587	MI
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Identified Needs:	<b>Crash History Analysis Perio</b>	d: Jul.	2015 –	Jul	. 2018
		CCRF	MP	-	MP
Existing: 2 lanes		N/A		-	
• Existing LOS C, maintaining LOS C in 2040 No-Build				-	
<ul> <li>Existing v/c 0.1, worsening to v/c 0.2 in 2040 No-Build</li> <li>3 total crashes: 0 fatal/0 injury/3 PDO</li> </ul>				-	
O high crash segments and 0 high crash spots				-	
Geometry: 2 sharp curves, 9-foot lanes				-	
				-	

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)			
SYP Number:	N/A	Planning:	\$	0		
Local ID:	Shelby Comp Plan #29	Design:	\$	228,977		
Functional Class:	Rural Minor Collector	Right-of-Way:	\$	352,000		
2018 ADT   % Trucks:	2,690 vpd   8.2%	Utilities:	\$	470,000		
2040 No Build ADT:	5,200 vpd	Construction:	\$	2,289,773		
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	3,340,750		



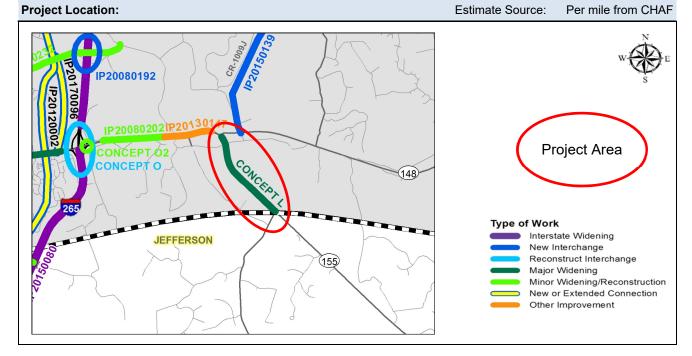
Project Description:	Name: Work Type:	Taylorsville Road Major Widening
Statewide Concept L, Jefferson County	Route:	KY 155

Improve safety and congestion on KY 155 (Taylorsville Lake Road) from KY 148 (Taylorsville Road) to KY 1531 (Routt Road). Project will evaluate the addition of one travel lane in each direction and the addition of bicycle and pedestrian facilities.

MP	3.000	to	MP	4.200	Project Length:	1.200	MI
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						•
lder	tified Needs:	Crash History Analysis Period:	July 20	015 – J	une	2018
•	Covington by the Park development (800+ homes,	retail) to add turn lanes.	CCRF	MP	-	MP
•	Existing: 3 lanes		N/A			
•	Existing LOS E, worsening to LOS F in 2040 No-Bi					
•	Existing v/c 0.6, worsening to v/c 1.0 in 2040 No-B	uild			H	
•	25 total crashes: 0 fatal/3 injury/22 PDO					
•	0 high crash segments and 0 high crash spots				-	
•	Geometry: 1 fair condition bridge				1-1	

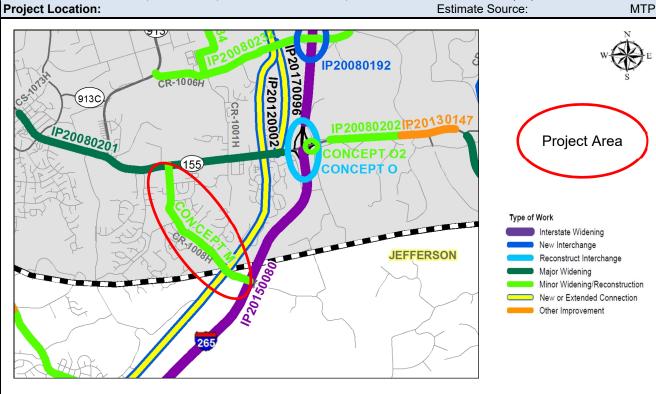
Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)
SYP Number:	N/A	Planning:	\$ 0
2035 KIPDA MTP:	N/A	Design:	\$ 1,416,000
Functional Class:	Rural Minor Arterial	Right-of-Way:	\$ 900,000
2018 ADT   % Trucks:	17,460 vpd   7.5%	Utilities:	\$ 450,000
2040 No-Build ADT:	28,000 vpd	Construction:	\$ 14,160,000
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$ 16,926,000



Regional/	Concept M, Jefferson County	Route:	CR-1008H
Local		Name:	Old Heady Road
Project Description:		Work Type:	Minor Widening

Improve safety and mobility on Old Heady Road (CR-1008H) from KY 155 (Taylorsville Road) to Chenoweth Run Road (CR-1003H). Project will evaluate adding a two-way center turn lane and bicycle and pedestrian facilities

MP <b>0.000</b> to MF	2 1.376	P	roject Leng	th: <b>1.</b>	376	6 MI
Identified Needs:		Crash History Analysis Period:				N/A
			CCRF	MP	-	MP
			N/A		-	
• Existing: 2 lanes					-	
	curves and 10-foot lanes.				-	
<ul> <li>Beyond scope of</li> </ul>	safety/operational analysis.				-	
					-	
Project Status:	Predesign	Project Phase Estimates:	(20	I9 Dolla	ı-ı ırs)	)
SYP Number:	N/A	Planning:	\$			C
2035 KIPDA MTP:	# 1325	Design:	\$	4	,56	0,000
Functional Class:	Urban Major Collector	Right-of-Way:	\$		82	26,000
2018 ADT   % Trucks:	4,350 vpd	Utilities:	\$	1	,10	1,000
2040 No-Build ADT:	Beyond model	Construction:	\$ 45,600		0,000	
	Proposed	Total Remaining Cost:	\$ 52,087		7,000	
Bike/Ped Facilities:						

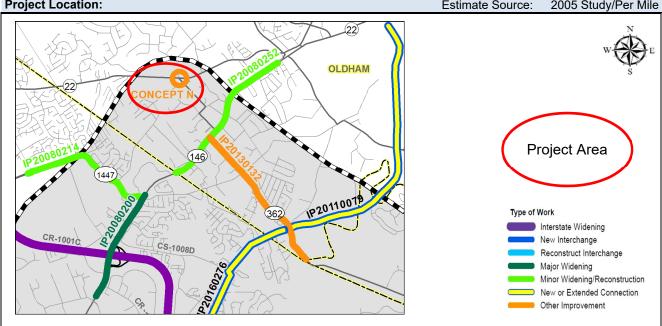


		INTERSECTION			
Regional/ Local	Concept N Oldham County	KY 362 (MP 0.000) & KY 22 (MP 1.825)			
Local	Oldinalli County	Central Avenue & Ballardsville Road			
Project Descrip	otion:	Work Type: Intersection Improveme			

Improve safety at the KY 22/KY 362 intersection. Project will evaluate adding a northbound right turn lane on KY 362 (Central Avenue) to KY 22 (Ballardsville Road) and add a westbound left turn lane and an eastbound right turn lane on KY 22 at KY 362.

Identified Needs:	Crash History Analysis Period: July 2015 – June 2018					
identified Needs:	KY	362	KY	22		
	Existing	2040 No-Build	Existing	2040 No-Build		
Number of Lanes	2		2			
• LOS	Α	В				
• v/c	0.1	0.1	Beyond scope of	safety/operational		
Crashes	2 total (0 fatal/	0 injury/2 PDO)	analysis.			
High crash segment   spot	0 segments	0 spots				
Geometry	Ske	wed intersection; 9	9-foot lanes on KY	362		

Project Status:	Predesig	ın	Project Phase Estimates:	(2019 Dollars)
SYP Number:	N/A		Planning:	\$ 0
2035 KIPDA MTP:	N/A		Design:	\$ 323,000
Functional Class:	Urban M	inor Arterial/Major Collector	Right-of-Way:	\$ 162,000
2018 ADT   % Trucks:	KY 362:	1,940 vpd   5%	Utilities:	\$ 65,000
	KY 22:	9,100 vpd	Construction:	\$ 3,230,000
2040 No Build ADT:	KY 362:	4,400 vpd		
Bike/Ped Facilities:	Not Prop	osed	Total Cost:	\$ 3,780,000
Project Leastion:	*	·	Catimata Cour	 2005 Study/Dar Mila



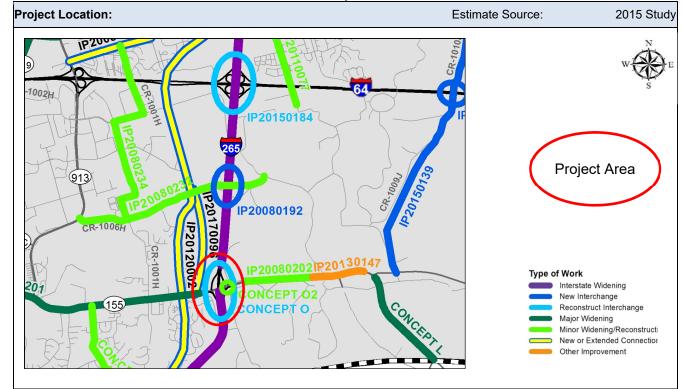
Statewide	Concept O, Jefferson County	Route:	<b>I-265</b>
Significance		Name:	Gene Snyder
Project Description:		Work Type:	New Interchange

Improve safety and reduce congestion on the I-265/KY 155 (Taylorsville Road) interchange. Project will evaluate reconstruction of the interchange.

MP	22.700	to	MP	23.400	
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MP	22.700	το	MP	23.400	Proj	ject Leng	gtn: <b>U</b>	.70	IU	IVII
lde	ntified Nee	ds:	•		Crash History Analysis Period:		·		١	N/A
						CCRF	MP	-	MI	P
•	Identified in 2015 Programming Study (moderate/low priority).					N/A		-		
•				•	ational analysis.			-		
•	High cras	sh se	gmen	its and sp	ots—see Tier 2 discussion in report			-		

Project Dev. Status:	Predesign	Project Phase Estimates:	(2	019 Dollars)
SYP Number:	N/A	Planning:	\$	0
2035 KIPDA MTP:	N/A	Design:	\$	2,926,000
Functional Class:	Interstate/Arterial	Right-of-Way:	\$	30,000
2018 ADT   % Trucks:	71,000 vpd   12.4%	Utilities:	\$	150,000
2040 No-Build ADT:	56,000-83,000 vpd	Construction:	\$	29,260,000
Bike/Ped Facilities:	N/A	Total Remaining Cost:	\$	32,366,000



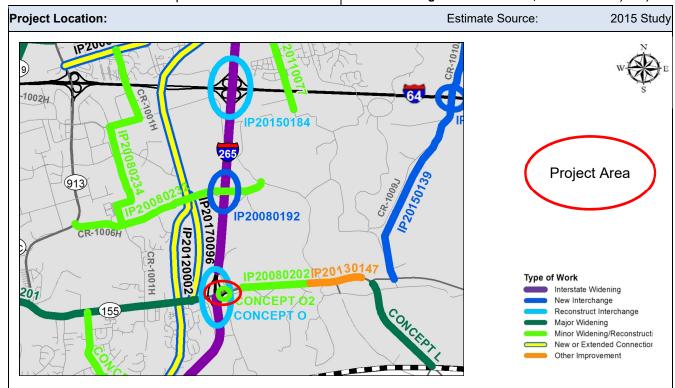
Statewide Significance	Concept O2, Jefferson County	Route: Name:	<b>KY 155 at I-265</b> Taylorsville Rd. &Gene Snyder
Project Description:		Work Type:	Safety Improvement

Improve safety and mobility at the I-265/KY 155 (Taylorsville Road) interchange. Project will evaluate the addition of a second eastbound left turn lane on KY 155 to northbound I-265 with consideration of bicycle and pedestrian facilities.

MP	6.058	to	MP	6.158	Project Length:	0.1	MI
----	-------	----	----	-------	-----------------	-----	----

Identified Needs:	Crash History Analysis Period:		·		N/A
		CCRF	MP	-	MP
<ul> <li>Identified in 2015 Programming Study (moderate/low priority).</li> </ul>	• • • • • • • • • • • • • • • • • • • •	1.1	5.71	-	6.45
<ul> <li>Beyond scope of safety/operational a</li> <li>12 total crashes: 0 fatal/2 injury/10 P</li> </ul>	•	1.8	6.00	-	6.10
<ul> <li>12 total crashes: 0 latal/2 injury/10 i BO</li> <li>1 high crash segment and 1 high crash specified.</li> </ul>				-	
				-	

Project Dev. Status:	Predesign	Project Phase Estimates:	(2019 Dollars)		
SYP Number:	N/A	Planning:	\$	0	
2035 KIPDA MTP:	N/A	Design:	\$	750,000	
Functional Class:	Urban Prin/Rural Minor Arterial	Right-of-Way:	\$	30,000	
2018 ADT   % Trucks:	20,000 vpd   6.7%	Utilities:	\$	10,000	
2040 No-Build ADT:	23,000-25,000 vpd	Construction:	\$	4,000,000	
Bike/Ped Facilities:	Proposed	Total Remaining Cost:	\$	4,790,000	

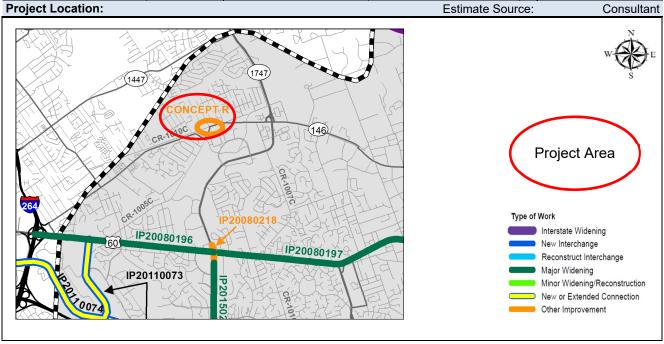


		INTERSECTION – CONCEPT R		
Regional/ Local	Concept R Jefferson County	KY 146 (MP 2.740) &	MP 2.740) & CR-1005C (MP 2.740)	
201101.2011.2011.3	Hurstbourne Lane &	Whipp	s Mill Road	
<b>Project Descri</b>	ption:	Work	Type:	Intersection Improvements

Improve safety at the KY 146 (LaGrange Road)/Whipps Mill (CR-1005C) intersection. Project will evaluate adding a two-way center turn lane and other capacity improvements including consideration of bicycle and pedestrian facilities.

Identified Needs:		Crash History Analysis Period: July 2015 – June 2018					
		KY 146		Whipps Mill Road			
		Existing	2040 No-Build	Existing	2040 No-Build		
•	Number of Lanes	2		2			
•	LOS	D-E	D-F				
•	v/c	0.3	0.4				
•	Crashes	2 total (0 fatal/0 injury/2 PDO)		Beyond scope of safety/operational			
•	High crash segment   spot (CCRF)	0 segments	1 spots (1.2)	analysis.			
•	Geometry	1 shar	p curve				

Project Status:	Predesign	Project Phase Estimates:	(2019 Dollars)
SYP Number:	N/A	Planning:	\$ 0
2035 KIPDA MTP:	N/A	Design:	\$ 120,000
Functional Class:	Urban Minor Arterial	Right-of-Way:	\$ 80,000
2018 ADT   % Trucks:	KY 146: 9,710 vpd   5.5%	Utilities:	\$ 1,480,000
	Whipps: 8,100 vpd	Construction:	\$ 1,200,000
2040 No-Build ADT:	KY 146: 13,000 vpd		
Bike/Ped Facilities:	Proposed	Total Cost:	\$ 2,880,000



### **6.0 STAGE 2 RAMP PRIORITIZATION**

For Stage 2 of the study process, existing traffic/capacity information at four select interchanges were assembled to highlight existing congestion needs, enabling District 5 to prioritize improvements at specific locations. The four interchanges are I-64 at KY 913 (Blankenbaker Parkway), and I-265 at KY 146 (LaGrange Road), US 60 (Shelbyville Road), and KY 155 (Taylorsville Road). Other service interchanges within the study area limits have recently been improved.

## 6.1 Description of Stage 2 Ramp Data

Four datasets were included in the analysis of each interchange; each is shown graphically in the following figures.

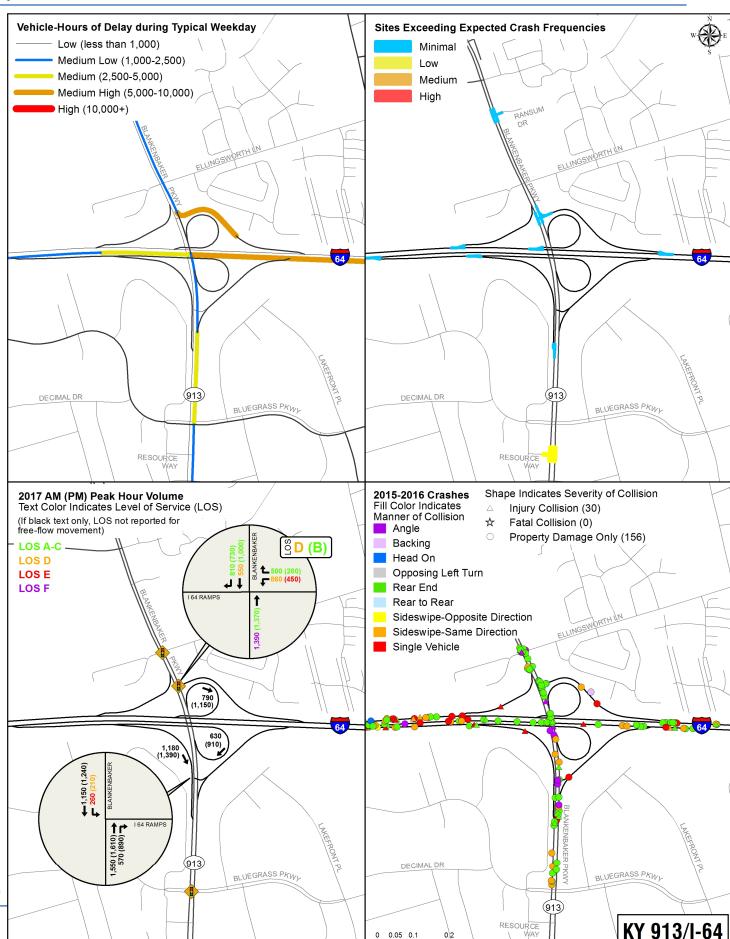
- VHD, as discussed in Section 5.1.2, is included as the top left panel in the figures.
- Intersection LOS for 2017 AM and PM peak hour volumes, included from the Traffic Forecast Reports prepared for the I-265 Widening project (Item #5-537) and I-265 / I-64 Interchange Reconstruction project (Item #5-549), is shown as the bottom left panel.
- EEC, as discussed in **Section 5.1.3**, is presented in the top right panel.
- Reported crashes during 2015 and 2016, categorized by manner of collision and severity, are shown as the bottom right panel.

### 6.1.1 KY 913 (Blankenbaker Parkway) at I-64

A six-ramp partial cloverleaf interchange, KY 913 at I-64 (Figure 6-1) demonstrates recurring delays on I-64 mainline, along KY 913, and on the westbound off-ramp. HCS intersection analyses show LOS E/F for one peak hour for the westbound left turn movement onto KY 913 southbound, northbound through movements at the westbound off-ramp, and southbound lefts onto the eastbound on-ramp.

During 2015-2016, there were 186 crashes in the vicinity, including no fatalities and 30 injury collisions. Data shows clusters of rear end collisions at the westbound off-ramp terminal and at the intersection with Ellingsworth Lane. A cluster of crashes also appears along KY 913 between the loop ramps, divided between directions of travel. Overall, 56% of reported crashes are rear ends. Three intersections and six merge/diverge sections exceed expected crashes.

Based on project team feedback, this location is the highest priority of the four interchanges; widening the westbound off-ramp to two lanes with dual lefts would provide relatively low-cost benefits. Ramp widening is included in the I-64 / I-265 interchange reconstruction project (Item #5-549), scheduled for construction letting in 2020. District 5 will investigate the possibility of including dual left turn lanes into the reconstruction project.



0 0.05 0.1

Figure 6-1: Stage 2 Data for KY 913 / I-64 Interchange

## 6.1.2 KY 146 (LaGrange Road) at I-265

A flop diamond interchange, KY 146 at I-265 (Figure 6-2) exhibits recurring delay on I-265 east of the interchange, on KY 146 to the north, and along the southbound off-ramp. HCS intersection analyses show LOS E/F for one or both peak hours for turns from both off-ramps, southbound KY 146 left turns to the southbound on-ramp, and KY 146 northbound through movements at the southbound ramp terminal. The signalized intersection at the southbound ramps operates at LOS F overall during the PM peak hour. HCS indicates queue lengths approach the available storage capacity for the southbound off-ramp with a v/c ratio over 1.0 during both peak hours. Motorists today can be seen making illegal turn movements to avoid queues.

From a safety perspective, 128 crashes were reported in the vicinity during 2015-2016, including no fatalities and 14 injury collisions. Rear end collisions represent 55% of reported crashes. Geographic distributions show clusters of rear end crashes on KY 146 from north of the interchange to Factory Lane and on KY 146 near the tail of the southbound KY 146 left turn storage space.

The KY 146 interchange is the next highest priority of the four sites studied in Stage 2. The District receives regular complaints about the interchange. The 2015 *I-265 Programming Study* recommended dual turn lanes and increasing the westbound acceleration lane length. The adjacent rail line/yard and closely spaced signal at Factory Lane are challenges. The northern ramp terminus has sight distance issues. Operations are likely to worsen as Ford expands towards the Chamberlain and Collins lanes intersection, increasing traffic volumes in the area.

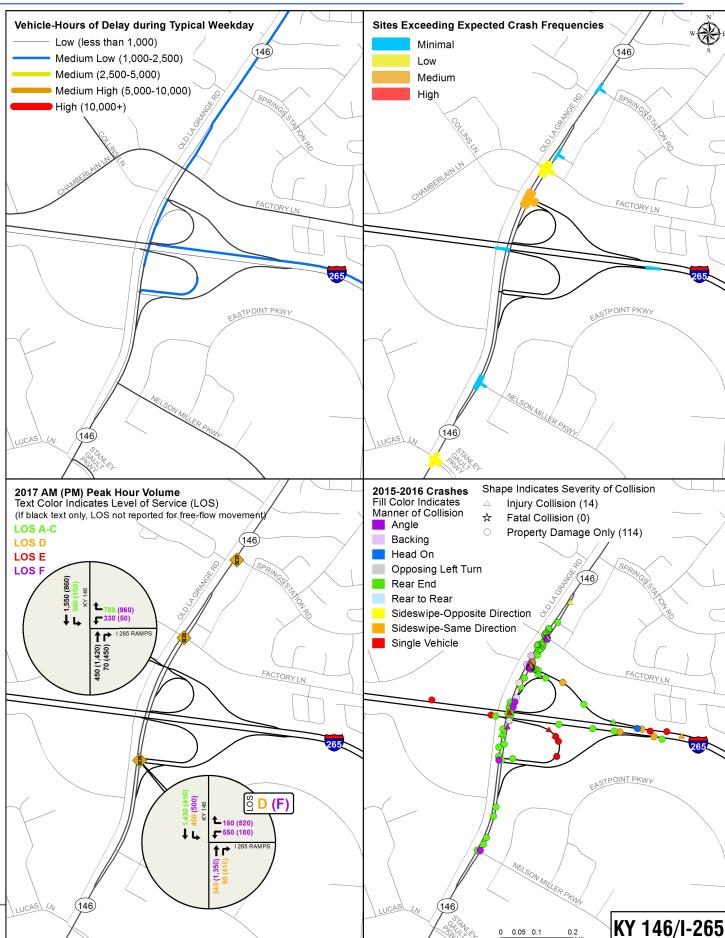


Figure 6-2: Stage 2 Data for KY 146 / I-265 Interchange

## 6.1.3 US 60 (Shelbyville Road) at I-265

A standard diamond interchange, US 60 at I-265 (Figure 6-3) shows recurring congestion along I-265, US 60, North English Station Road, and on the northbound off-ramp to US 60. HCS intersection analyses show LOS E/F for one or both peak hours for turns from the northbound off-ramp and for left turns from the southbound off-ramp. The signalized intersection at the northbound ramps operates at LOS E overall during the PM peak hour. The northbound right turn movement has a v/c ratio over 1.0 during the PM peak hour with over 30 cars queuing to make the turn. Physically, the interchange sits in a low point; all movements traveling uphill from stop positions complicates operations, as do closely spaced signals and high traffic volumes.

Numerous ramp and roadway segments and intersections exceed expected crash rates in the vicinity. During 2015-2016, there were 259 crashes in the vicinity, including no fatalities and 24 injury collisions. Rear end crashes represent 64% of reported incidents.

The US 60 interchange is the third priority of the four sites evaluated in Stage 2. The corridor has already been improved to add as many lanes as possible under the existing I-265 overpass. Field observation and project team input suggests that the primary capacity issue is the southbound on-ramp. Heavy movements to the south are an issue as motorists are trying to reach I-64. Reconstructing the interchange as a single point urban interchange or diverging diamond could improve signal timing and throughput. Alternatively, widening I-265 with additional lanes south to I-64 as part of the interchange reconstruction project (Item #5-549) may address some of the weaving/delay issues.

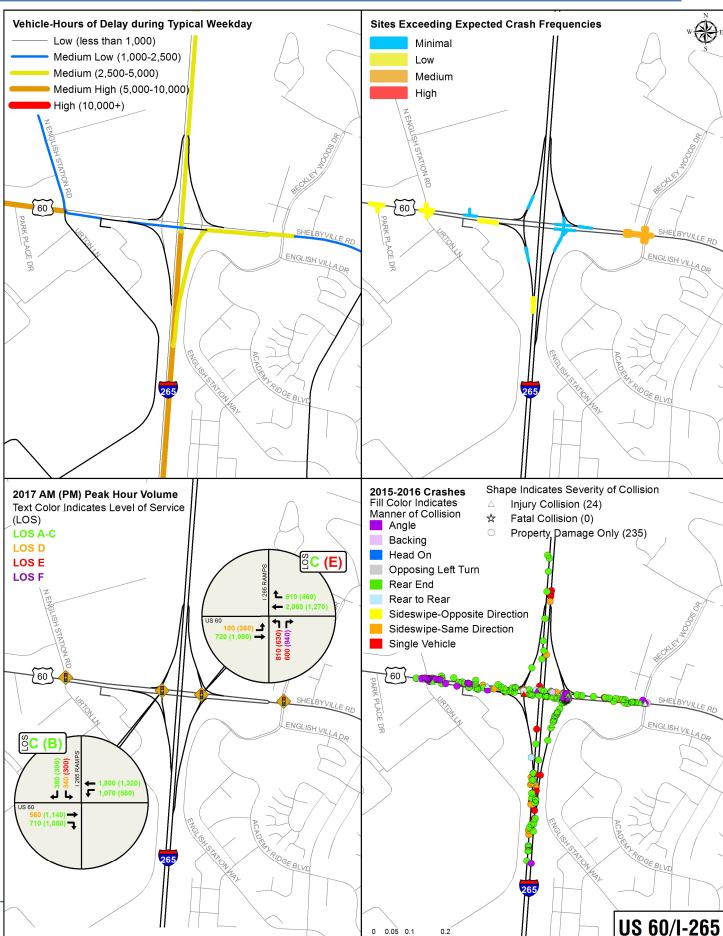


Figure 6-3: Stage 2 Data for US 60 / I-265 Interchange

## 6.1.4 KY 155 (Taylorsville Road) at I-265

A diamond interchange, KY 155 at I-265 (Figure 6-4) demonstrates recurring delays along I-265 and on KY 155 west of the interchange. HCS intersection analyses show LOS E/F for one or both peak hours for turns from the southbound off-ramp and left turns from the northbound off-ramp. The signalized intersection at the southbound ramps operates at LOS E overall during the PM peak hour; the v/c ratio approaches 1.0 for both turn movements with queues approaching the available storage capacity on the southbound ramp per HCS. During the AM peak hour, left turns from the northbound off-ramp exceed capacity with queue lengths approaching available storage capacity. Observation suggests capacity is constrained by adjacent two-lane segments of KY 155 to the east rather than the interchange itself. Proposed development along the corridor will increase existing congestion.

Both ramp termini intersections and the merge/diverge segments on I-265 north of the interchange exceed expected crash rates. During 2015-2016, there were 120 crashes reported in the vicinity, including one fatality (a motorcyclist who lost control) and 22 injury collisions. Rear end crashes represent 58% of reported collisions. Geographic distributions show clusters of crashes approaching the northbound off-ramp divergence and approaching the southbound off-ramp signal.

Per project team recommendations, KY 155 is the lowest priority of the four interchanges studied as delay/safety trends at the interchange are controlled by the capacity limitations along the two-lane portion of the corridor to the east. Improving the interchange will have minimal effect until KY 155 is widened.

## 6.2 Final Project Team Meeting

The final project team meeting was held March 18, 2019 at KYTC District 5 to review the Stage 2 analysis and discuss project team recommendations. A summary of the meeting is included in **Appendix D**.

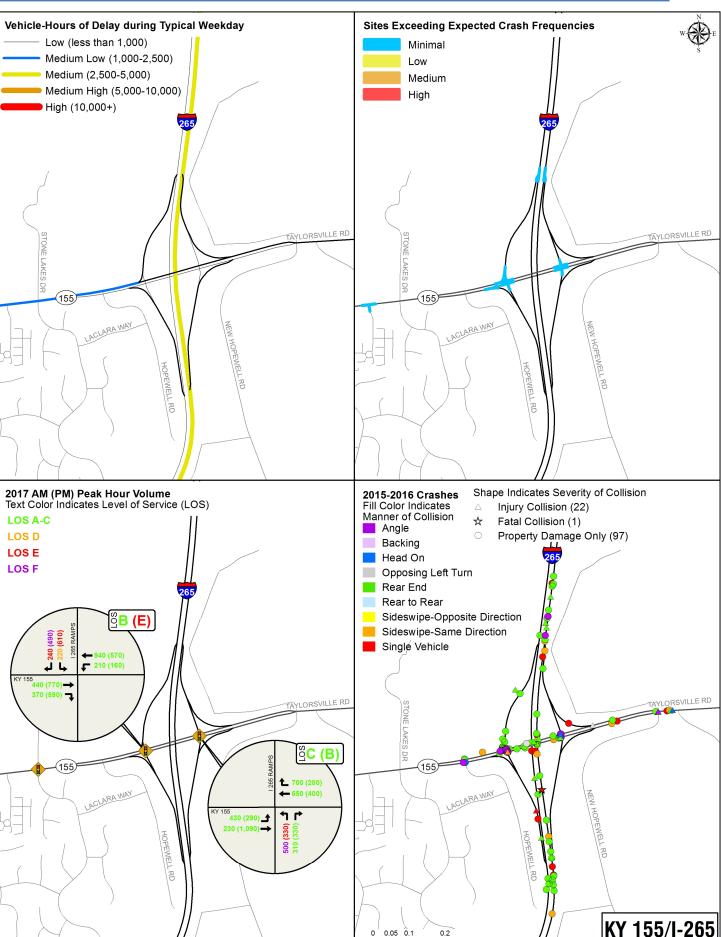


Figure 6-4: Stage 2 Data for KY 155 / I-265 Interchange

### 7.0 CONCLUSIONS

Due to the rapidly developing study area, KYTC District 5 personnel recognized the need for a comprehensive planning study for projects located in the area. This Needs Analysis Study assisted KYTC District 5 and KIPDA personnel in the decision-making process as the 2020 SHIFT cycle approached its sponsorship phase. This occurred in February and March of 2019. The Stage 1 matrix (Figure 5-4, p. 34+) compiles data associated with congestion, safety, geometry, previous project development, and more, highlighting the worst safety/capacity issues for quick reference. The matrix was provided to District 5 and KIPDA staff as a tool to inform sponsorship selections.

For 2020 SHIFT, KYTC District 5 had 74 available sponsorship slots to cover its eight-county jurisdiction. KIPDA's Metropolitan Planning Organization had 54 available sponsorship slots to cover its three Kentucky counties. KIPDA's Regional Transportation Council had 22 available sponsorship slots to cover its four-county jurisdiction.

In total, 26 projects within the Stage 1 matrix were selected for sponsorship by these entities. These projects will be scored over the summer of 2019 as part of SHIFT 2020. The scores will be used in development of the Draft 2020 Recommended Highway Plan, which will be considered by the legislature and finalized in spring 2020.

Preliminary study findings, including the Stage 1 matrix, were shared with elected officials and other stakeholders in February 2019. Several written comments were received, included as **Appendix E** to this report.

For Stage 2 of the study, existing traffic information at four select interchanges were assembled to highlight existing congestion and safety needs, enabling District 5 to prioritize improvements at specific locations.

- I-64 at KY 913 (Blankenbaker Parkway) is the highest priority of the four interchanges; widening the westbound off-ramp to two lanes with dual lefts would provide relatively low-cost benefits.
- I-265 at KY 146 (LaGrange Road) is the next highest priority. The District receives regular complaints about the interchange. Operations are likely to worsen as the Ford plant expands, increasing traffic volumes in the area.
- I-265 at US 60 (Shelbyville Road) is the third priority. Field observation and project team input suggests that the primary capacity issue is the southbound on-ramp. Heavy movements to the south are an issue as motorists are trying to reach I-64.
- I-265 at KY 155 (Taylorsville Road) is the lowest priority as delay/safety trends at the interchange are controlled by the capacity limitations along the two-lane portion of the corridor to the east. Improving the interchange will have minimal effect until KY 155 is widened.

### **8.0 ADDITIONAL INFORMATION**

Any written requests for additional information should be sent to:

Tom Hall, PE KYTC District 5 8310 Westport Road Louisville, Kentucky 40242 Phone: (502) 210-5400

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Amanda R. Spencer, PE KYTC Division of Planning 200 Mero Street Frankfort, Kentucky 40622 Phone: (502) 564-7183