

Section 8:

Economic Development

What role does economic development play in transportation?

he T-WORKS transportation program was designed to create jobs, preserve highway infrastructure and provide multimodal economic development opportunities across the state. The program was developed with input from more than 2,000 Kansans in order to create a better business model for transportation. Input from those stakeholders helped craft the following key features of T-WORKS:

- A new highway project selection process that uses engineering data, local input and economic impact analysis to evaluate projects. Economic impact analysis helps Kansans get a good return on their investments. This process is illustrated in Figure 8-1.
- An expanded Economic Development Program, which will be more flexible and responsive (i.e. ,decisions made in 45 days or less) to help communities capitalize on emerging economic opportunities.
- A regional transit approach to make services more efficient and expand coverage across the state.
- More Kansans will have access to air ambulance services thanks to a strategic selection process for aviation projects.
- An expanded Rail Program that will now allow shippers and industrial parks to be eligible for program funds along with local governments.
- And T-WORKS means that Kansas highways can be maintained at the performance level Kansans have come to expect.¹

TRED#S US-54 from onverts the K-10: South US-69 from transportation benefit measures shown Liberal to Lawrence N. of Arma at the left into net new statewide US-160 business activity (which are referred to **Construction Cost** Trafficway to Fort Scott (NE of Plains) as direct economic effects). These are Annual Vehicle Tr Annual Vehicle Tri then fed (with construction costs) into 262,278,270* 3,258,394 Annual Vehicle Trip 2,257,445 an Input-Output Model to calculate Jobs Safety Economic Development indirect and induced economic effects Before 0.029 0.20 0.02 Congestion Reduce wait of Traffic Relief ongestion After 0.021 0.00 0.00 Input-Output Change in Annual 0.06% Model/Economic Model 0% Vehicles (%) Input-Output Models are designed to capture the Change in Annual Travel Time 2,094,239 Reduce travel follow-on effects of a "direct" economic change. Miles Traveled (miles Savings These follow-up effects are known as the indirect \$ and induced effect. An indirect effect is additional Change in Annual supply chain impacts generated by the direct effect Hours of Travel -6,753,605 -36,205 -108,840 and the induced effect is the impact from the wage spending of the direct and the indirect effect. The results of I-O Models are based on localized. Kansas Market Expand access to Change in Market Size specific data in the form of existing industry patterns 10,000 Access Ś people) and the propensity of each industry to purchase Expansion within the state (typically called regional purchase coefficients). Change in Fatalities -0.55 -0.53 events per yr) Change in Personal Safety -174 Improve safety events per yr) **Impacts** Change in Property -435 -35 \$ events per yr Contingent Results Contingent Development encouraged by 1347 21 150 evelopment Development total jobs) KDOT focuses mainly on two outputs. Gross Regional Product plus non-business Traveler Benefit (GRP+B) and Jobs. Gross Regional Product is the additional This information was gathered from the public amount of economic activity that can be directly Results through economic development surveys. All attributed to the full operation of a transportation estimations of job creation or development improvement. The "+B" part is an added amount that size estimates are reviewed by KDOT for Project Cost \$188 Million \$45 Million \$164 Million reflects traveler benefits that don't contribute to GRP (for example personal time, safety, and environment). These two results are easily understandable and work \$50 Million \$250 Million \$3,710 Million (GRP+B) as a great comparison point between different projects. The results for our example projects can be seen to the left. Jobs 3,565 43 274 *Figures based on the Lawrence Traffic Model

Figure 8-1: The Use of TREDIS in Evaluating T-WORKS Projects

1 KDOT, www.ksdot.org/tworks

Source: Kansas Department of Transportation

Under T-WORKS, economic impact analysis was used as a factor in selecting highway expansion projects. Through an extensive public engagement process, Kansans made it clear they want transportation investments to be linked to the economic priorities of the state.

To analyze the potential economic impact of highway expansion projects, KDOT adopted the use of the Transportation Economic Development Impact System (TREDIS) economic model, created by the Economic Development Research Group. TREDIS estimates the number of long-term jobs, increase in Gross Regional Product, added safety benefits and income growth that would result from an expansion project. These factors are weighed against the cost of the project to determine its overall economic impact score. To calculate that score, TREDIS relies on county-level economic data about employment patterns, business activity and freight movements by type, amount and value. Rural and urban projects are scored separately. KDOT also discusses with communities how they are impacted by projects.²

As part of T-WORKS, \$1.7 billion was programmed for expansion and modernization projects across the state. An estimated \$10 billion in economic impact will be generated. In the 5-County region under T-WORKS, over \$650 million in highway modernization and expansion projects have been programmed, resulting in an estimated economic impact of over \$8.5 billion. Those projects are listed in Table 8-1. The construction of the South Lawrence Trafficway provides the highest economic benefit in the state, with a cost of \$192 million and a economic benefit of \$3.7 billion.

Table 8-1:T-WORKS Modernization & Expansion Projects in the 5-County Region

Project	Construction Cost Estimate (in millions)	Economic Impact (in millions)
<i>I-70 and K-7 in Wyandotte County – Interchange Improvements for Phase 1, 2 and 3</i> This project has an excellent economic impact including helping support continued growth at the Legends. It will address the most congested movements within the existing interchange and replaces some deteriorated I-70 pavement. KTA will contribute funds for construction commensurate with the improvements gained to their maintenance responsibilities.	\$68	\$1,123
<i>I-35 Interchange at Homestead Lane between Edgerton and Gardner</i> This project is critical to handle truck traffic from the area and opens it up for new development. This fast-track project is expected to be completed by 2013. Johnson County will provide \$35 million towards construction of the local network connecting the interchange to the new intermodal facility.	\$26	\$629
I-435/I-35/K-10 and Lackman Road – part of the project known as the Gateway Project (Yellow). First phase – improve ramps/add lanes on I-35 from 119th to I-435. This is the first phase of the Gateway Project, which provides immediate and significant improvements to one of the biggest bottlenecks in the state. This project has a tremendous economic benefit for a relatively low cost.	\$14	\$1,055
I-435/I-35/K-10 and Lackman Road – 2nd phase of the Gateway project (Orange). Builds 2-lane flyovers from I-435 to I-35, adds auxiliary lanes to just north of 95th street. Improves interchange and K-10 from Ridgeview to I-35. While the most expensive project in T-WORKS, there's regional support for this project because people worry this growing bottleneck threatens traffic flow and economic activity. Full build out of the Gateway is \$600 million; this second phase at \$249 million should provide acceptable traffic operations for the next 20-25 years. Olathe and Lenexa have agreed to consider phasing and sequencing concepts that may prolong adverse impacts to the local street connections but would reduce the total cost of the project. This is a design build project.	\$249	\$1,375
South Lawrence Trafficway (SLT) in Douglas County-construct 4-lane freeway from US-59 to K10 The SLT received strong regional support and is viewed as an important regional connector linking Topeka, Lawrence and Johnson County. This project has the highest economic impact in the T-WORKS program.	\$192	\$3,710
US-69 improvements: I-435/Quivira to 119th in Johnson County US-69 is Overland Park's top priority. Overland Park will contribute \$8 million towards construction and \$4 million for project development.	\$102	\$779

² KDOT, Using Economic Impact Analysis to Select Highway Projects, http://kdotapp.ksdot.org/TWorks/docs/doing-biz_economic-impact.pdf