

Overview – High Speed Rail



Analysis of Economic, Employment and Tax Revenue Impact 2015-2040 High Speed Rail Operations & Construction Only¹

Direct Investment – HSR Construction	\$10,000,000,000
Cumulative Economic Impact 2015-2040 HSR Construction & Operation	\$36,330,000,000
Tax Revenue Impact HSR - Direct & Indirect ^{2, 3}	\$3,108,000,000
Jobs	
Total Jobs Related to HSR Construction	48,672
Estimated Jobs HSR Construction – Peak Construction Years ⁴	40,000
Direct Jobs HSR Operations⁵	1,086
Indirect Jobs HSR Operations ⁵	4,283

- 1) Figures referenced from Insight Research Corporation report titled *Texas Central's High Speed Rail Corridor and Related Private Development Houston to Dallas/Fort Worth, Texas; October 13, 2015.*
- 2) Tax Revenue Impact values are not included in the larger "Cumulative Economic Impact" value of \$36.33 Billion.
- 3) Tax rates were based on those in effect at the time of study and are assumed constant. The study assumed the investment by Texas Central would result in an increased taxable assessment base in each jurisdiction that would result in additional tax revenue. However, individual jurisdictions may choose to implement a tax rate decrease that would create a reduction in taxes for all taxpayers but generate less tax revenue growth. Methods for tax rate regulation can be found in the Texas Constitution and the State Tax Code. Additional information can be accessed at http://comptroller.texas.gov/taxinfo/proptax/tnt/
- 4) Jobs during peak construction years exclude the mobilization, full implementation, and demobilization of construction workforce captured in Total Jobs figure of 48,672.
- 5) Direct jobs are based on Texas Central operations assumptions. Indirect Job estimates are based on geographically specified U.S. Bureau of Economic Analysis multipliers.

Overview – Private Development



Analysis of Economic, Employment and Tax Revenue Impact 2015-2040 Private Development in the Vicinity of HSR Stations^{1, 2}

Private Development Economic Impact	\$37,780,000,000
Tax Revenue Impact Private Development - Direct & Indirect ^{3,4}	\$3,900,000,000
Jobs	
Total Jobs - Private Development	36,969
Construction⁵	
Direct Jobs - Private Development⁵	14,027
Indirect Jobs - Private Development⁵	21,263

- 1) Figures referenced from Insight Research Corporation report titled *Texas Central's High Speed Rail Corridor and Related Private Development Houston to Dallas/Fort Worth, Texas; October 13, 2015.*
- 2) Economic impacts shown in private development do not represent a direct investment by Texas Central. These impacts are based on assumed third party developments that will occur in the vicinity of the proposed high-speed rail station locations.
- 3) Tax Revenue Impact values are not included in the larger "Private Development Economic Impact" value of \$37.78 Billion.
- 4) Tax rates were based on those in effect at the time of study and are assumed constant. The study assumed the investment by Texas Central would result in an increased taxable assessment base in each jurisdiction that would result in additional tax revenue. However, individual jurisdictions may choose to implement a tax rate decrease that would create a reduction in taxes for all taxpayers but generate less tax revenue growth. Methods for tax rate regulation can be found in the Texas Constitution and the State Tax Code. Additional information can be accessed at http://comptroller.texas.gov/taxinfo/proptax/tnt/
- 5) Direct & Indirect Job estimates are based on geographically specified U.S. Bureau of Economic Analysis multipliers.

Estimated Tax Revenue Impact^{1, 2} Texas Central HSR 2015 - 2040



\$2.5 Billion³

			Total Direct and
	Direct	Indirect	Indirect Taxes
Cities	\$257,999,000	\$73,685,000	\$331,683,000
Counties	\$321,917,000	\$109,490,000	\$431,405,000
State of Texas	\$1,139,765,000	\$237,042,000	\$1,376,806,000
Schools	\$641,657,000	\$181,035,000	\$822,691,000
Transit	\$138,632,000	\$6,847,000	\$145,479,000
TOTAL	\$2,499,970,000	\$608,099,000	\$3,108,064,000

- 1) Figures referenced from Insight Research Corporation report titled *Texas Central's High Speed Rail Corridor and Related Private Development Houston to Dallas/Fort Worth, Texas; October 13, 2015.*
- 2) Tax rates were based on those in effect at the time of study and are assumed constant. The study assumed the investment by Texas Central would result in an increased taxable assessment base in each jurisdiction that would result in additional tax revenue. However, individual jurisdictions may choose to implement a tax rate decrease that would create a reduction in taxes for all taxpayers but generate less tax revenue growth. Methods for tax rate regulation can be found in the Texas Constitution and the State Tax Code. Additional information can be accessed at http://comptroller.texas.gov/taxinfo/proptax/tnt/
- 3) The estimated direct tax revenue impact from Texas Central High Speed Rail construction and operations from 2015 through 2040.

Methodology



Methodologies used for these analyses are provided in the following discussion of the types of impact examined in this report are defined as follows:

- 1. Economic Impact. Economic impact is the benefit to the general economy of the State of Texas, shown as a multiplier on all new capital and operating expenditures of the proposed high speed rail infrastructure and operations, plus that of the planned private development adjacent to the HSR stations. Generally referred to as the economic ripple effect, this analysis uses Insight Research Corporation's Impact TRAKKER methodology, incorporating multipliers from the U.S. Bureau of Economic Analysis Regional Input-Output Modeling System (US BEA RIMS II) specific to the State of Texas.
- **2.** *Direct and Indirect Employment Impact.* Direct and indirect employment is calculated in this analysis for both construction and operating phases of each site. Direct employment refers to persons on each job site and payrolls of the development and the facilities as proposed.

Indirect employment related to HSR construction and operations is generated by the first tier purchase of goods and services by the TC HSR and its employees. Indirect employment related to Private Development is generated by the first tier purchase of goods and services by the businesses, tenants and residents of the private sector development in the vicinity of the proposed stations. As in the case of economic impact, indirect employment is calculated using an assigned set of geographically specific multiplier protocols from the US BEA.

3. Direct and Indirect Tax Revenue Impact. Direct tax revenue refers to the taxes paid or collected by the TC HSR or the private sector businesses as described. and includes property, sales and hotel occupancy taxes. Indirect taxes are tax benefits to the state and local jurisdictions as a result of first tier employment and other taxable spending.

Direct tax revenue streams are prepared using investment-grade protocols, and may be available to investment or financing commitments under certain agreements. Direct tax revenue calculations include the application of rail corridor unitary taxing assessment procedures.

Indirect revenue streams are not investment-grade, but reflect the added benefit of potential taxes which can flow to each jurisdiction from the TC HSR and the private development planned for the adjacent sites.

4. Insight Research Corporation. Insight Research specializes in investment-grade financial forecasting, rail transportation and public/private partnership analysis, providing site location and economic impact analysis for cities, counties and states. Its completed projects include analysis for rail intermodal and transportation hub facilities, BRAC conversions, manufacturing plants, corporate headquarters, high tech firms, research and development labs, data and command centers, stadiums and arenas, retail locations, warehouse, distribution and fulfillment facilities.

Insight now performs more than 450 site location and impact analysis engagements each year. In its 35-year history, Insight has completed more than 9,000 socio-economic analyses engagements in the United States, Canada and Mexico. Insight's client list includes local governments, states and federal governments (US & Canada), transportation agencies, and many of the Fortune 200.

Limitations of the Assumptions



- Total economic impact of the development extends beyond the ten-county HSR corridor area, as many capital and operating expenditures are made outside the region and are not jurisdictionally specific.
- Models use a constant dollar analysis in 2015 dollars, with no property value or tax increases, no depreciation, and no Consumer Price Index (CPI) or Cost of Living Adjustment (COLA) increases assumed.
 Annual increases assume only business case changes.
- Tax impact is consistently prepared throughout this analysis using the reasonable, low estimate of taxable values as these are available to date (on a scale of low-mid-high) to avoid overstating the potential tax revenue benefits for individual jurisdictions and the State.
- Tax rates used in the analysis are those in effect at the time of study of September 2015, and do not include changes that may be approved by taxing jurisdictions for succeeding fiscal years.
- The analysis assumes local point-of-sale on taxable equipment and construction materials. Where local point of sale may not be applicable because of the specialized nature of the purchases for the TC HSR system, use tax is applied using local tax rates for each applicable jurisdiction.
- Tax revenue impact does not include either federal income taxes or State franchise taxes the activities of the TC HSR or the businesses or tenants of the private development, which are often determined as a tax on annual net profits or book values.
- No tax deferrals such as incentives or abatements are included in these calculations.