PURDUE UNIVERSITY

AMERICAN STRUCTUREPOINT INC.

Built to Last: Funding Our Nation's Highways

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2016 PURDUE ROAD SCHOOL

Questions for the Crowd.....

Do current gas taxes pay for all ongoing and future expenses?

How will funding shortfalls be made up?

How much do you pay due to the conditions of the roads?

Should all users pay for assets they use?

Are you willing to pay a premium for less congestion?

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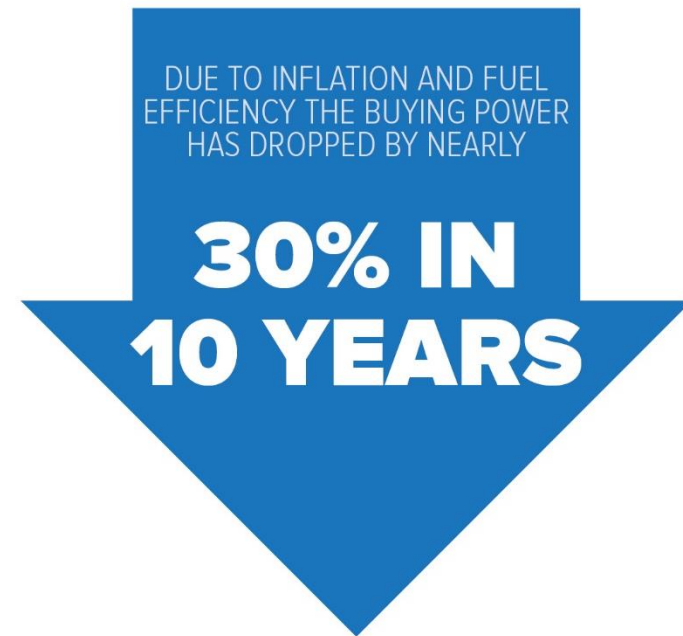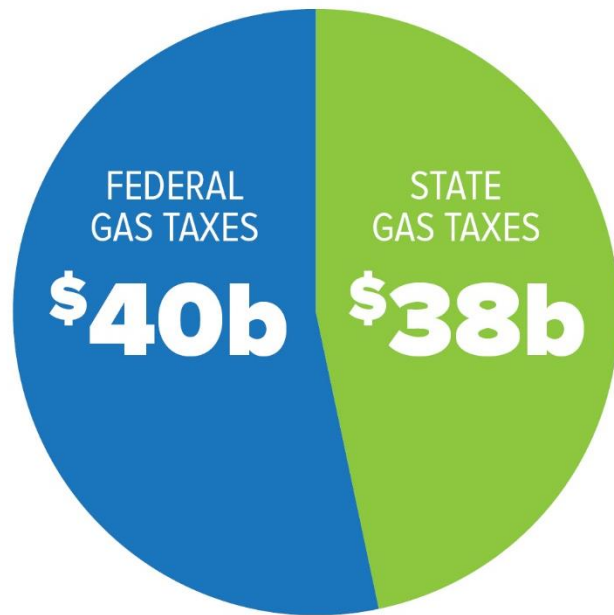# Our Infrastructure Needs a Funding Infusion!

Meeting Today's Changing and Challenging Economic Times

REDUCED GAS TAX REVENUE

ECONOMIC IMPACTS

AGING INFRASTRUCTURE

LIMITING LONG-TERM FUNDING SOLUTIONS
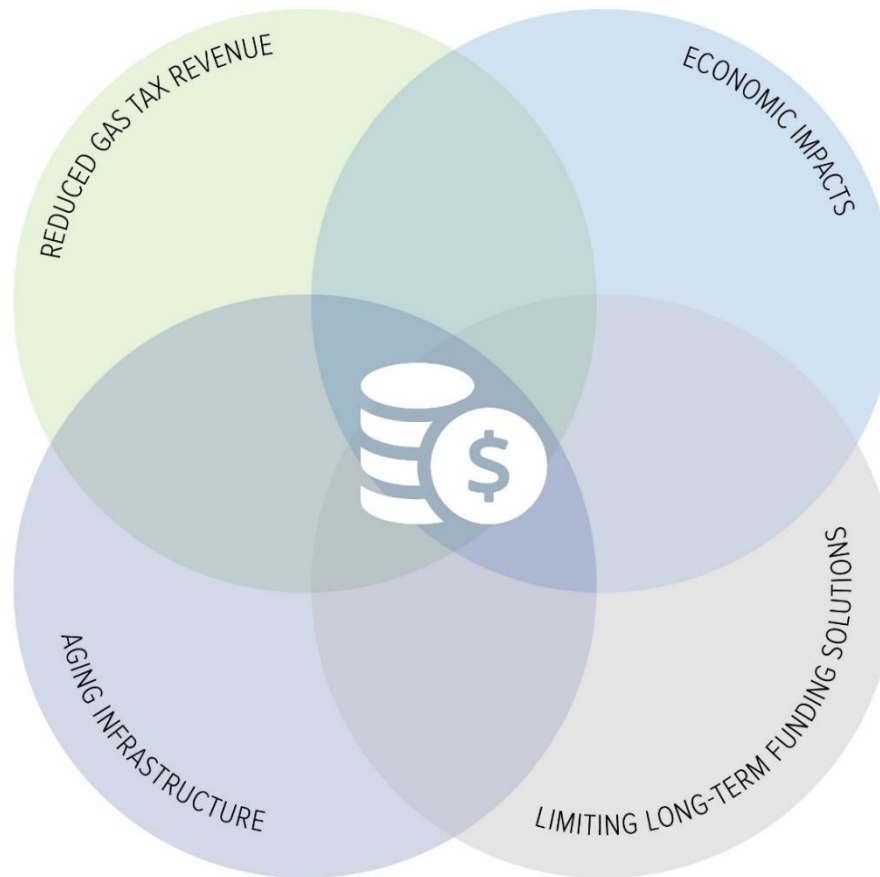
How do states meet transportation needs with limited funding?

What are the Main Revenue Sources?

Year	1932	1956	1993	2016	2025
Gas Tax	$0.01	$0.03	$0.184	$0.184	$0.184?
MPG	9	14	28	36	55+
1-Mile Cost	NA	$650k	$4m	$8m	$$$$

FEDERAL GAS TAXES $40b

STATE GAS TAXES $38b

DUE TO INFLATION AND FUEL EFFICIENCY THE BUYING POWER HAS DROPPED BY NEARLY

30% IN 10 YEARS

Currently, over $47b is being spent annually, $7b over revenue generated!

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Indiana Revenue Sources?

INDIANA HIGHWAY TRANSPORTATION REVENUE - CURRENT

FY2014 $1,186.2

Total state revenues. Does not include federal funds. In FY2014 fuel tax revenues will total $811.8M.

MISC.*
$103.2

REGISTRATION FEES
$271.2

GASOLINE
$534.3

DIESEL/SURTAX
$277.5
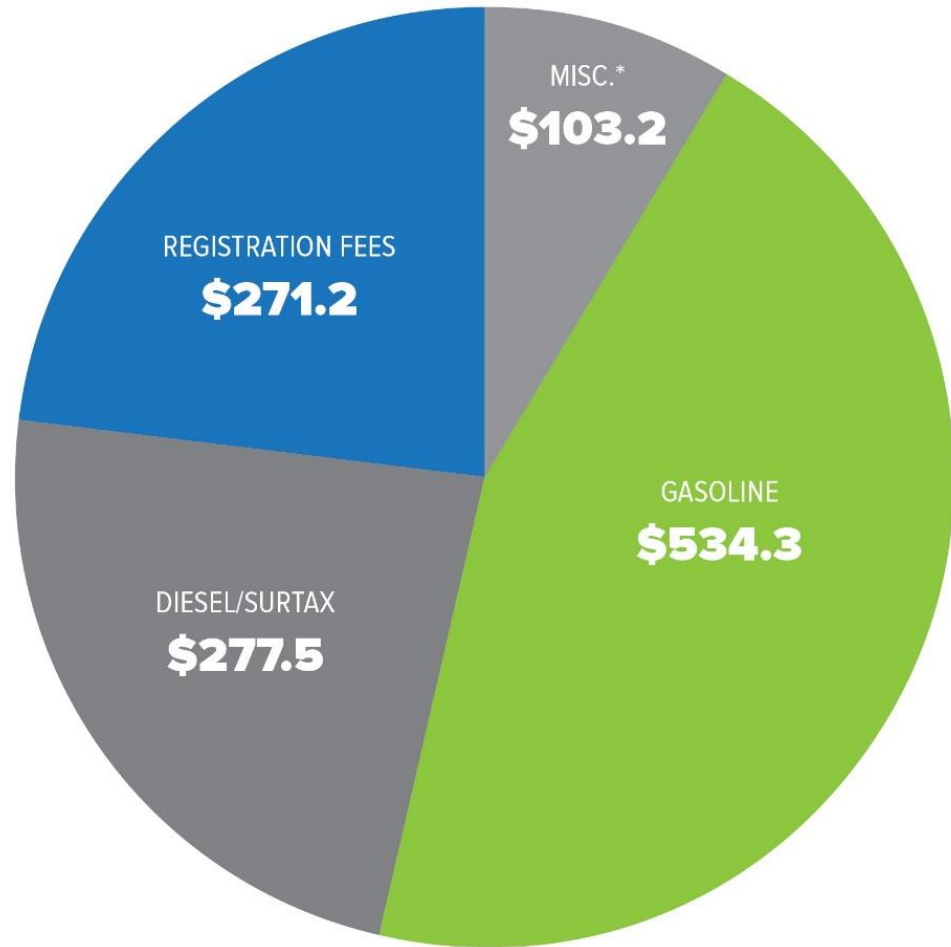
*Includes 1% of Sales Tax Revenue

Indiana Revenue Sources?

Year	1963	1969	1980-1982	1988	2002	2016
Gas Tax	0.03	0.08	0.12	0.14	0.18	0.18
1-Mile Cost	$750k	$2m	$2.5m	$3.0m	$6m	$8m

IN FEDERAL GAS TAXES $920m

IN STATE GAS TAXES $811m

SINCE 1973 FUEL EFFICIENCY HAS INCREASED 66% AND CONSTRUCTION COSTS HAVE INCREASED BY OVER 300%
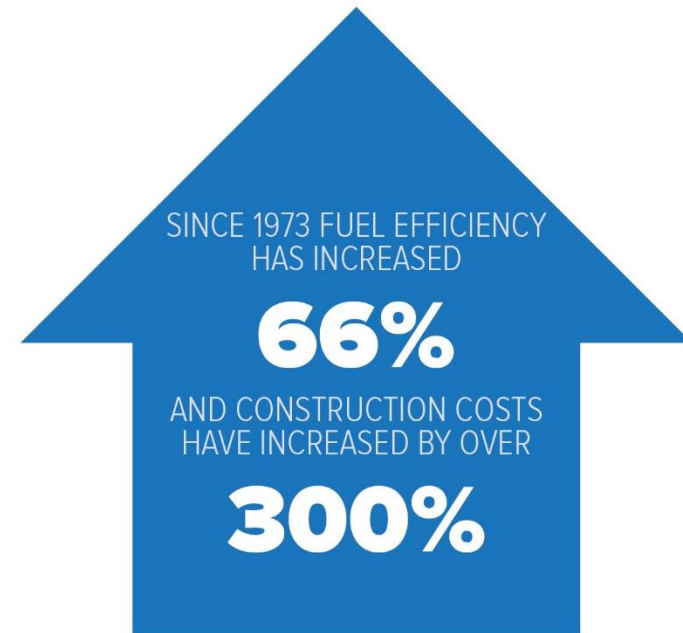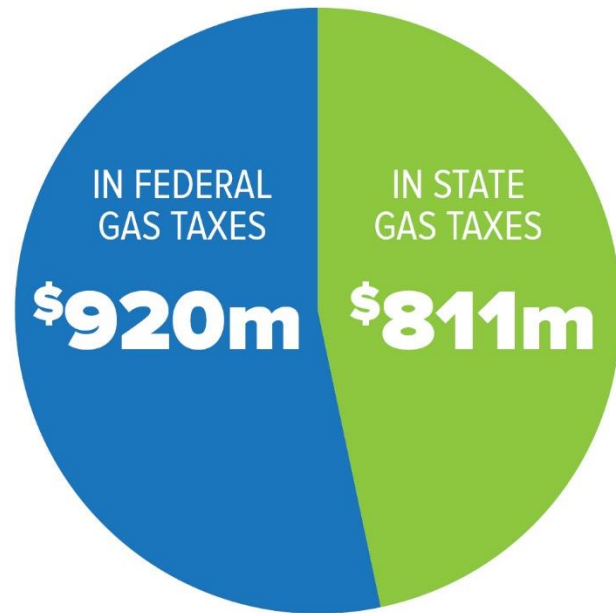
What is the Cost to Reconstruct our Aging System?

Current interstate system is over 50 years old…..well past its design life

Key facts:

- Over 47,000 miles of interstate (built over 25 years) - $130 billion

- Only 3,000 miles current tolled

- Cost to rebuild and maintain the current system is over $500 billion

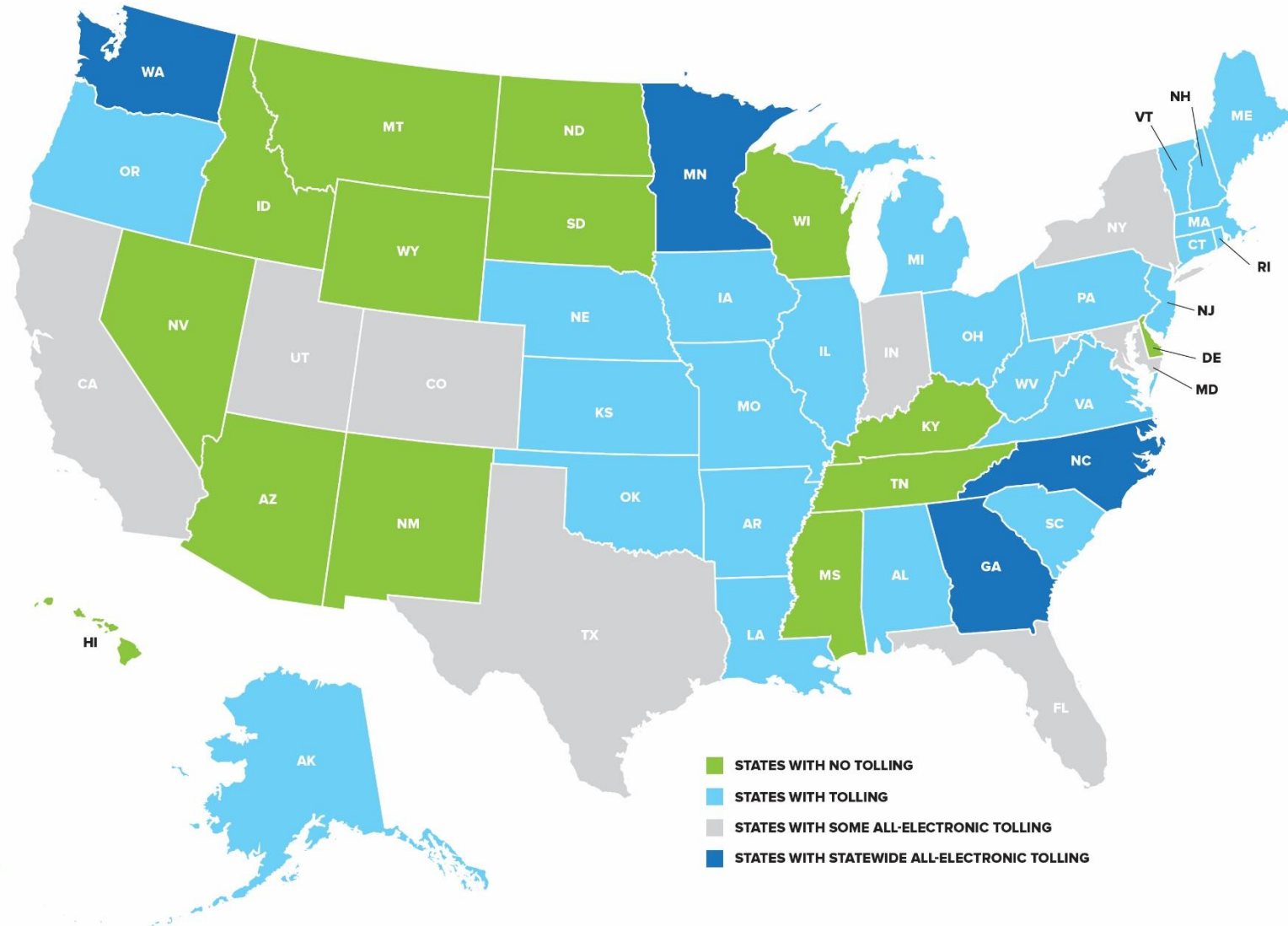- Cost to expand and upgrade could cost as much as $2 trillion

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How does IN compare?

Same story for Indiana highways.....well past their design life

Key facts:

- IN has over 1,300 miles of interstate

- Only 157 miles are tolled

- The cost to rebuild IN's interstate would be in excess of $10b without adding the necessary future capacity needed.

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Why Not Tolling…..Where is it used

Legend:
- **STATES WITH NO TOLLING**
- **STATES WITH TOLLING**
- **STATES WITH SOME ALL-ELECTRONIC TOLLING**
- **STATES WITH STATEWIDE ALL-ELECTRONIC TOLLING**

What is the Value of Tolling?

The users of the facilities pay…

Estimated Toll Revenues (2012 National Traffic Data)				
Vehicle Class	Rural Interstate Miles	Urban Interstate Miles	Toll Rate	Estimated Toll Revenue
Passenger Cars	185,000	430,000	$0.05	$30,750,000,000
Trucks	60,000	50,000	$0.15	$16,500,000,000
Totals	245,000	480,000		$47,250,000,000
FHWA Office of Highway Policy Information				

- **Same result would need at least a $0.26 increase in the Federal gas tax.**

- **Indiana would see roughly $1b in tolling revenue annually, requiring a $0.32 increase in the state gas tax for the same result.**

What is the True Cost to the Drivers?

User Costs Comparison (Yearly)
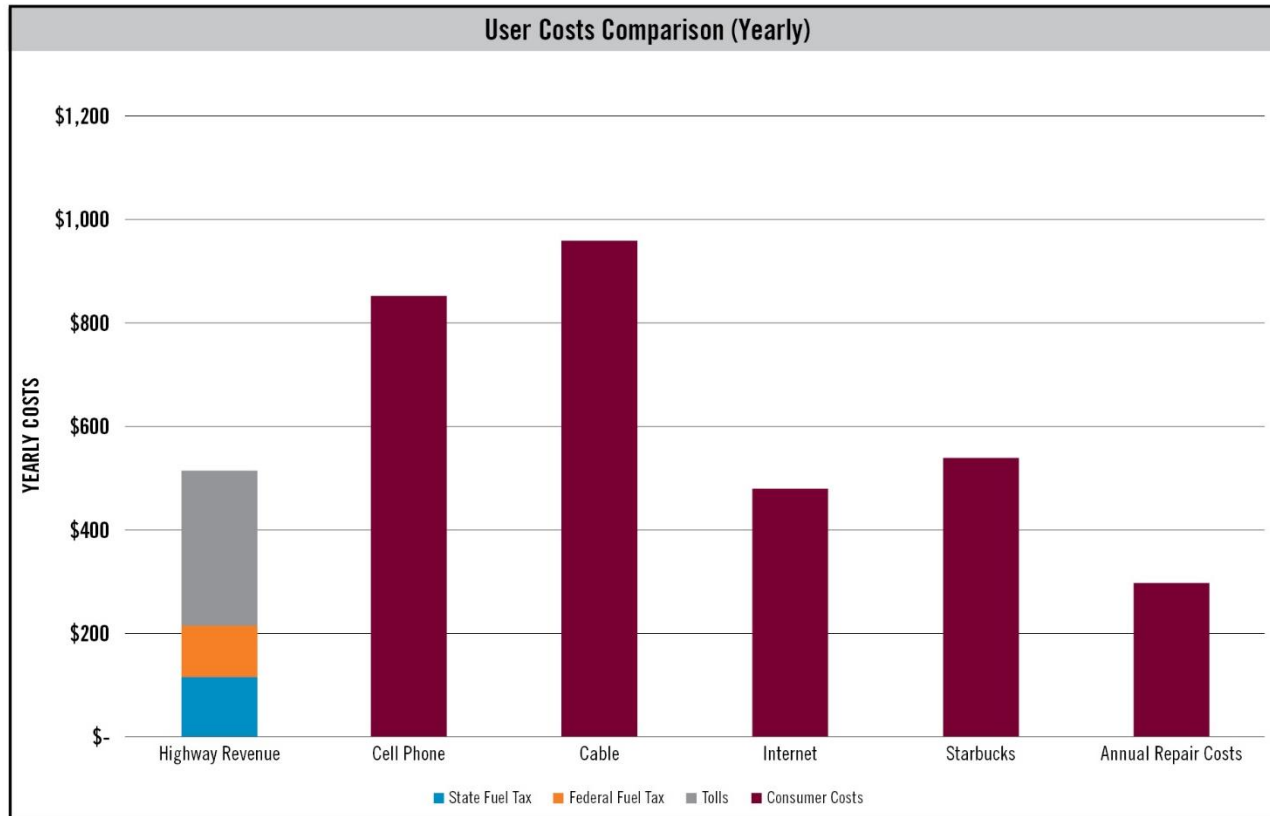
- **The average Hoosier pays between $300-$400 for automotive repairs due to the condition of the roadways.**
- **Average person pays approximately $200/year in fuel taxes and would pay approximately $300 in tolls**

Are There Exceptions?

Users of the system would pay, but….

- Tax rebate for low-income users

- Discount rates with transponders, rather than pay by plate

- Additional revenue can help pay for parallel route upgrades

- Provides additional revenue for local agencies….provides for an improved total transportation network

Are there other benefits?

- Freed-up federal transportation dollars can be used to maintain and expand US routes

- Freed-up state transportation dollars can be used on the local road network, helping local governments fund transportation improvements and help with economic growth

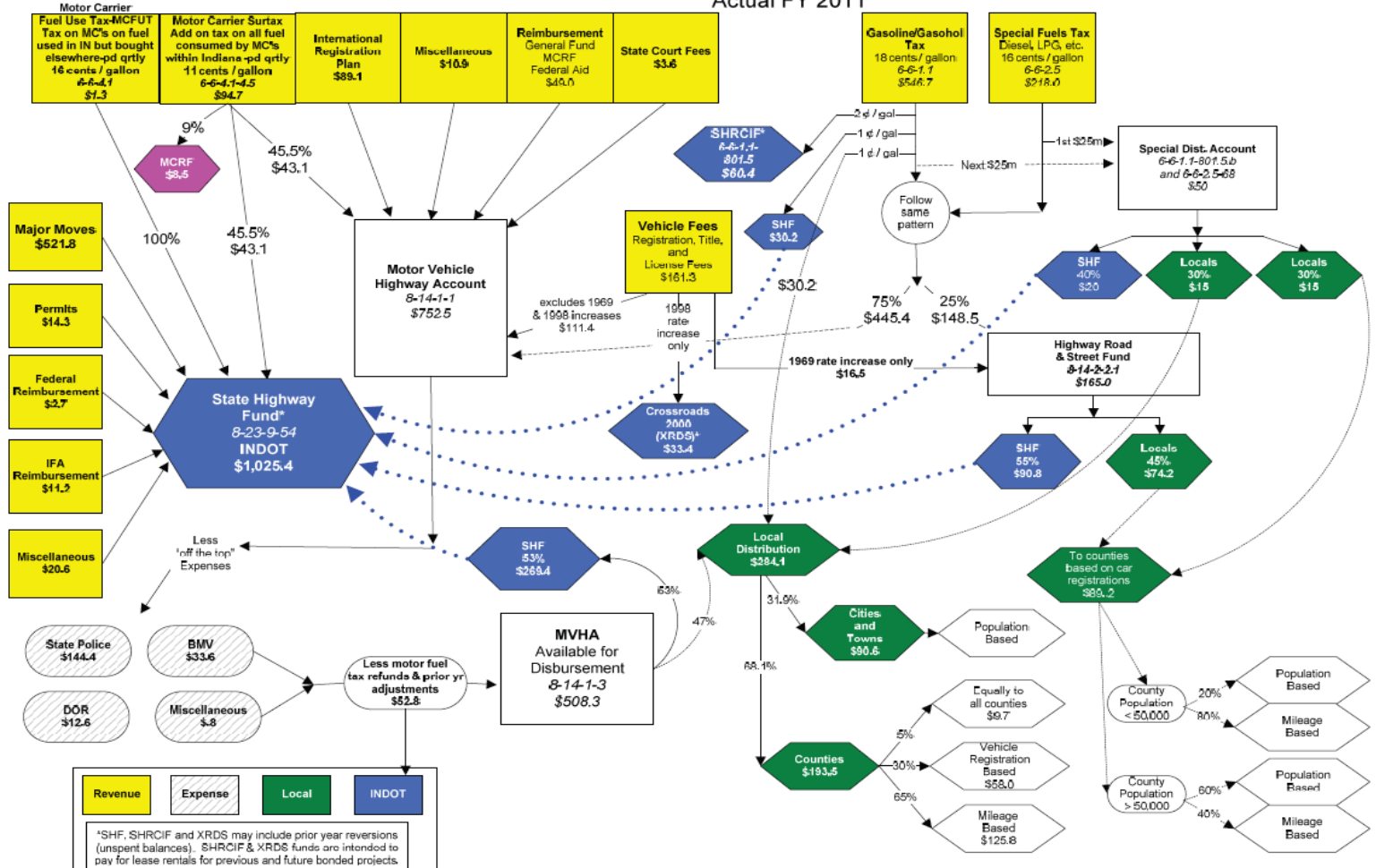# Money can flow to other routes
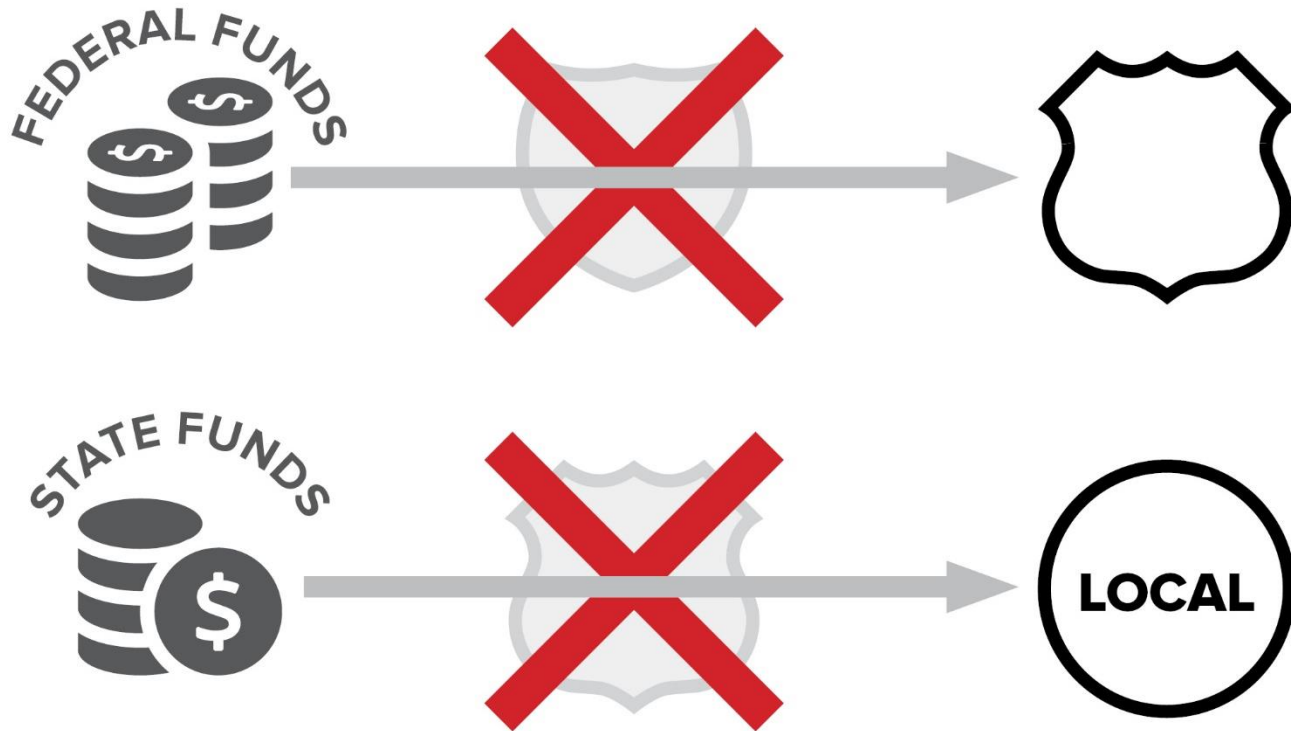
How does the money flow?

Indiana Transportation Funding
(all $ in Millions)
Actual FY 2011

Why Not Toll Our Existing Infrastructure?

BARRIERS TO IMPLEMENTATION

FEDERAL LEGISLATION

STATE LEGISLATION

TOLL

What are the IRP program Parameters?

3 Spots – Currently all occupied

Key facts (Interstate Reconstruction Pilot Program):

- 1998 TEA-21

- I-70 (MO), I-95 (VA), and I-95 (NC)

- No progress has been made in application process

- New rules – must act in 1 year or lose slot

- New states would likely need to show state legislation in place

Summary

USER PAYS PHILOSPHY

PUSH LEGISLATIVE ACTIONS

LOOKING TO THE FUTURE

QUESTIONS?