### The Brookings Institution

Metropolitan Policy Program Robert Puentes, Fellow



# Taking the High Road: A Metropolitan Agenda for Transportation Reform

Northwestern University Transportation Seminar April 28, 2005













### A Metropolitan Agenda for Transportation Reform

The Context for the Discussion of the Nation's Surface Transportation Policies



State and Metropolitan Responses to Federal Change



Getting Transportation Right for Metropolitan America



I

What is the context for the discussion of the nation's surface transportation policies?

Federal transportation policy is at a crossroads

Realities on the ground have changed dramatically

Significant transportation challenges still exist

Traditional finance structure is running out of gas



### Eisenhower-era policies had clear goals and intent.





"A network of modern roads is as necessary to defense as it is to our national economy and personal safety." – President Eisenhower (1952)





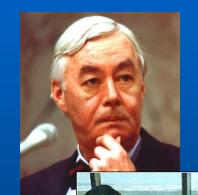


# Architects of 1991's Intermodal Surface Transportation Efficiency Act (ISTEA) offered a compelling new framework.

"It is the policy of the United states to develop a ... transportation system that is economically efficient and environmentally sound... Social benefits must be considered with particular attention to the external benefits of reduced air pollution, reduced traffic congestion and other aspects of the quality of life." – ISTEA Preamble









# The current debate about our nation's transportation laws is largely about money: how much and who gets it.

"It is the policy of the United states to develop a ... transportation system that is economically efficient and environmentally sound... Social benefits must be considered with particular attention to the external benefits of reduced air pollution, reduced traffic confestion and other aspects of the quality or ife." – ISTEA Preamble

dropped from TEA-21

"[T]he national transportation program is adrift and sinking under the weight of parochialism and greed."

 Thomas Downs, former associate administrator of FHWA, & executive director of FTA.

American Society of Civil Engineering, October 2004

"[T]he federal-aid highway program is ... functioning as a cash transfer, general purpose grant program..."

U.S. Government Accountability Office
 GAO-04-802, August 2004

"I see no broad agreement about the appropriate Federal transportation role."

Emil Frankel, assistant secretary for transportation policy, U.S. DOT
 Innovation Briefs, July 2004



I

What is the context for the discussion of the nation's surface transportation policies?

Federal transportation policy is at a crossroads

Realities on the ground have changed dramatically

Significant transportation challenges still exist

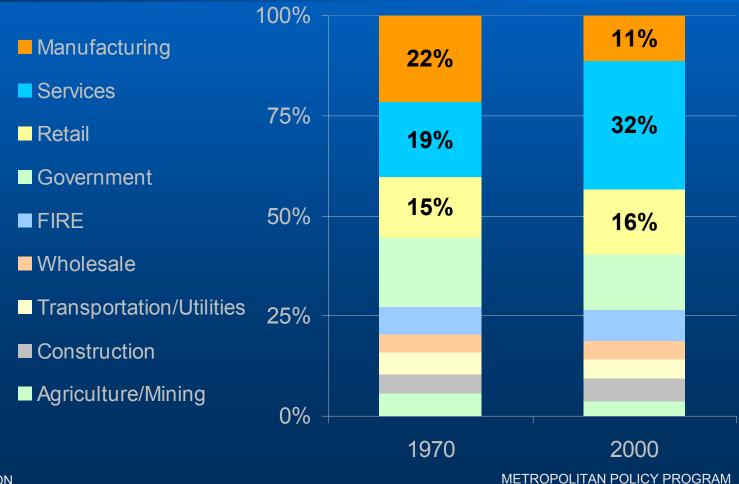
Traditional finance structure is running out of gas



# The nation's economy has shifted away from manufacturing and toward the service sector, resulting in a markedly different industry composition.

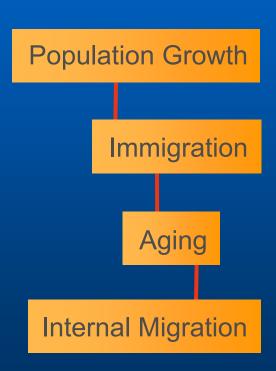
Employment by sector, US, 1970-2000

Source: Bureau of Economic Analysis





Major demographic forces are changing the United States

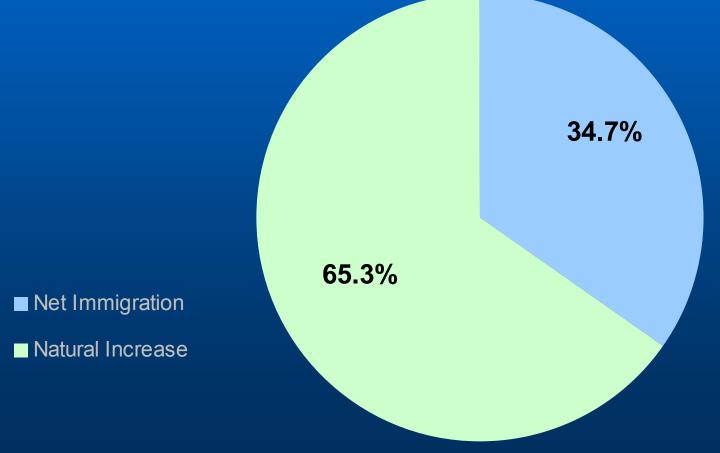




# The 1990s presented the strongest growth in four decades. More than 1/3 of this population growth was driven by immigration

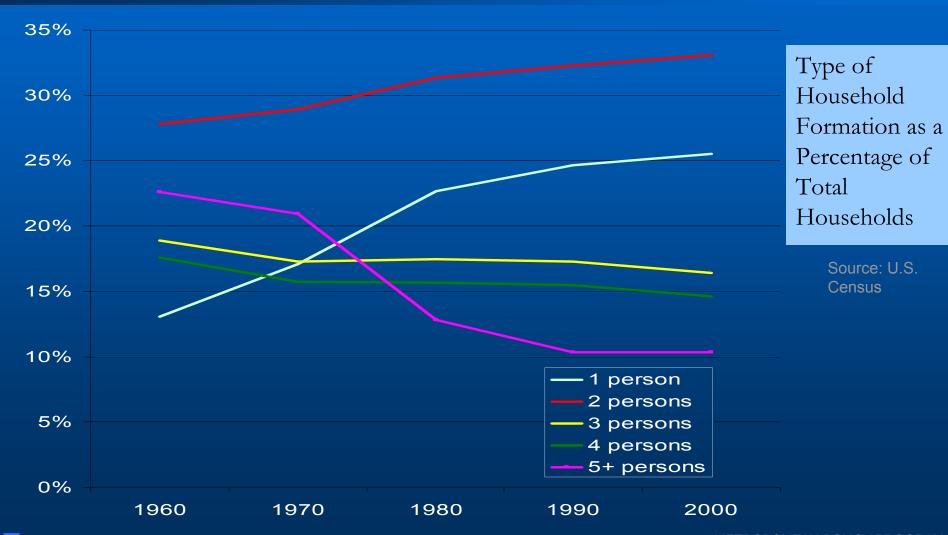
Components of population change, 1990-2000

Source: U.S. Census Bureau





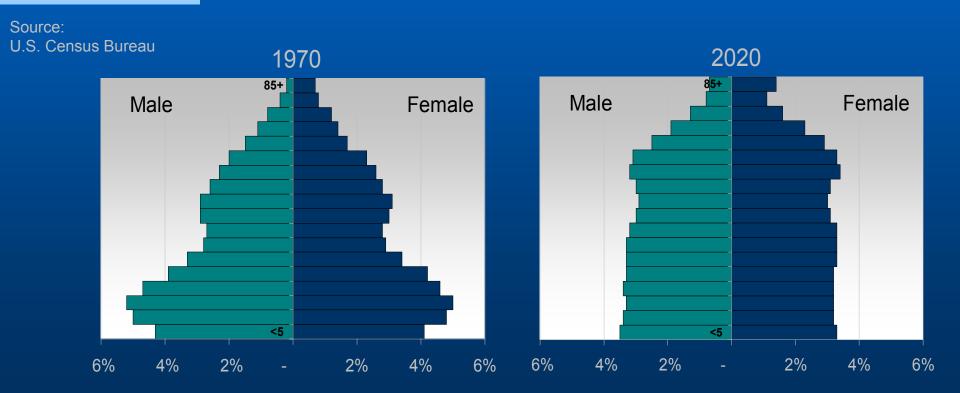
## Average U.S. household size has declined dramatically since 1970.





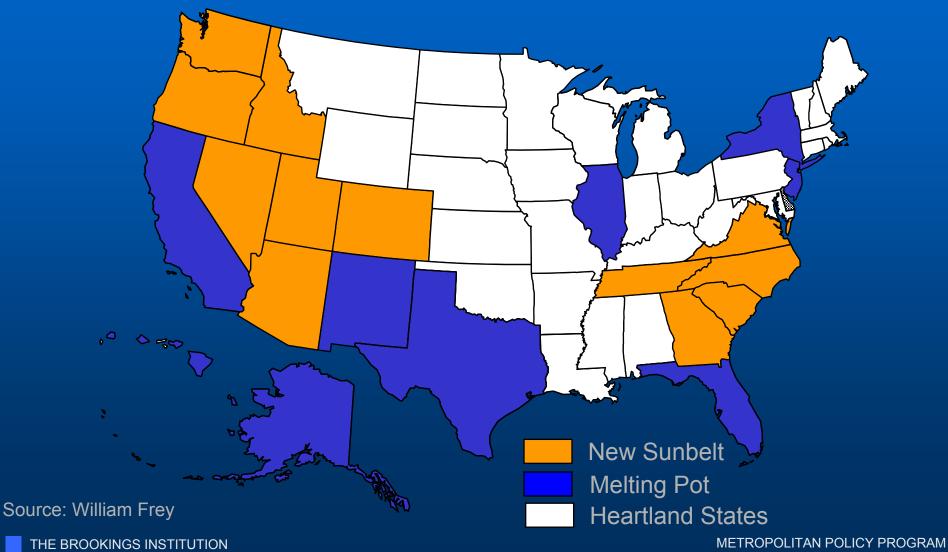
### At the same time, the US population is aging

US Age Distribution, 1970 vs. 2020



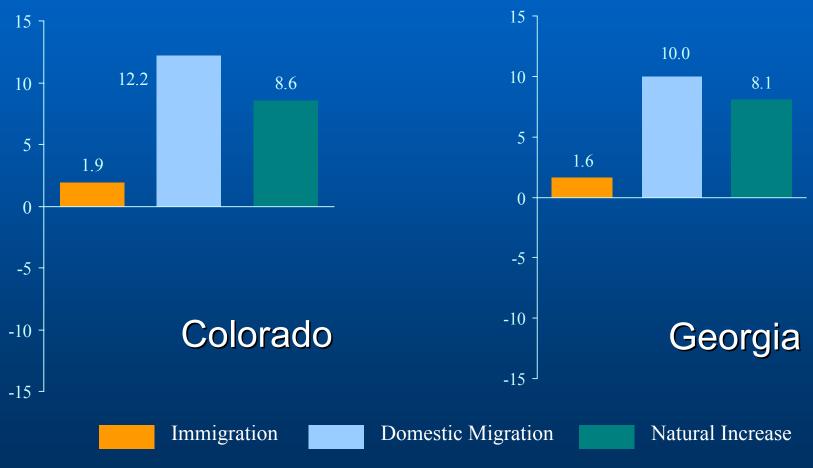


### America's New Demographic Regions





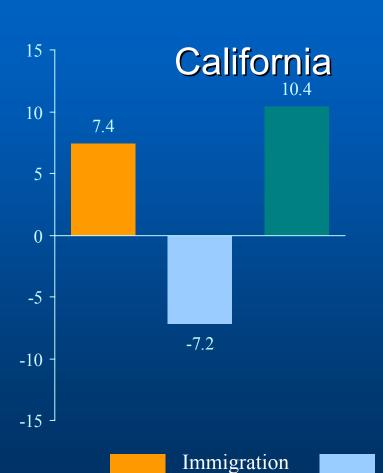
### New Sunbelt: Examples



Source: William Frey



### Melting Pot: Examples





**Domestic Migration** 

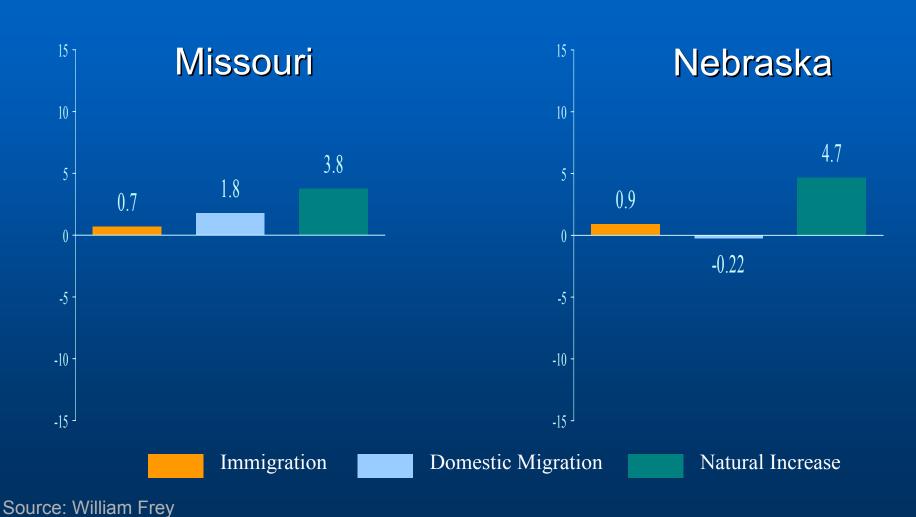
Source: William Frey

THE BROOKINGS INSTITUTION

Natural Increase

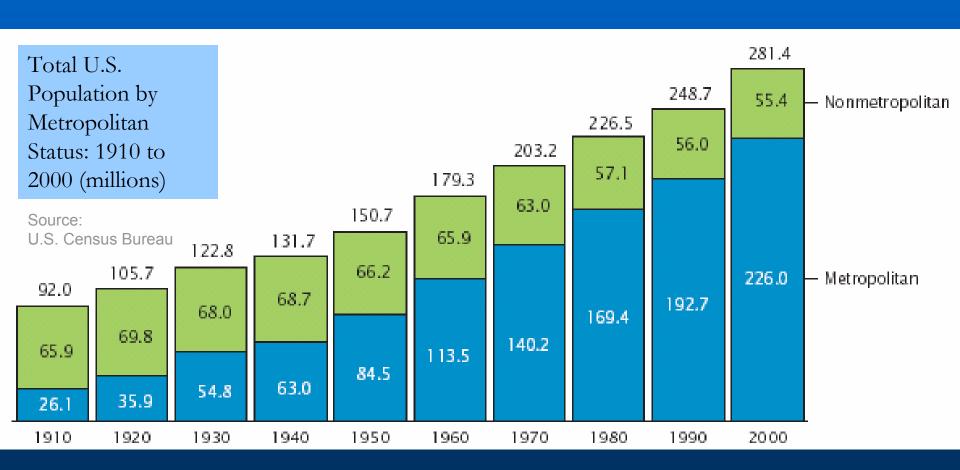


### Heartland: Examples



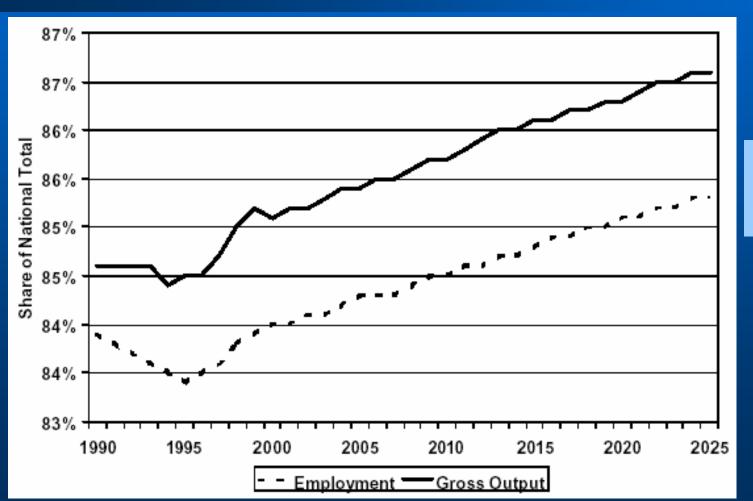


### Metropolitan areas are now where 80% of Americans live....





....where 84% of America's jobs are located and where 85% of America's national output is generated.



Metropolitan areas' contribution to the U.S. economy

Source: U.S. Conference of Mayors



Ī

What is the context for the discussion of the nation's surface transportation policies?

Federal transportation policy is at a crossroads

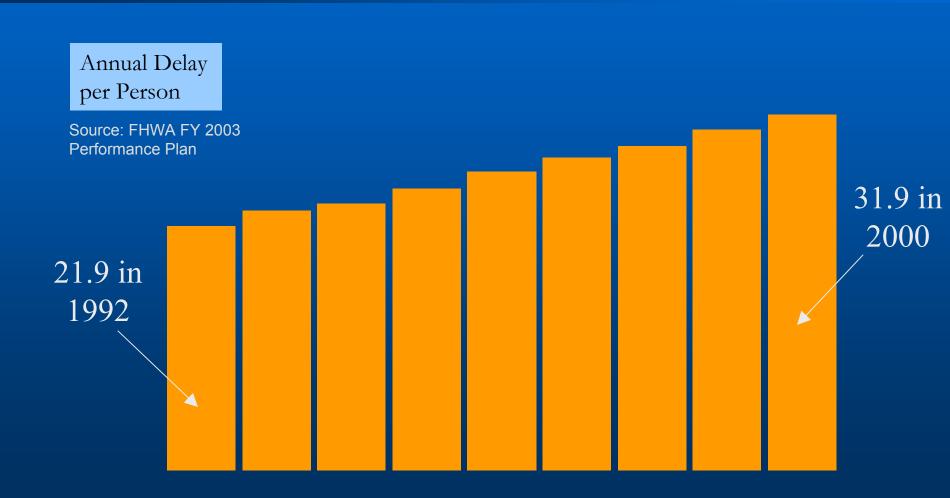
Realities on the ground have changed dramatically

Significant transportation challenges still exist

Traditional finance structure is running out of gas



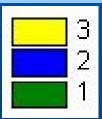
### A pervasive desire for congestion relief





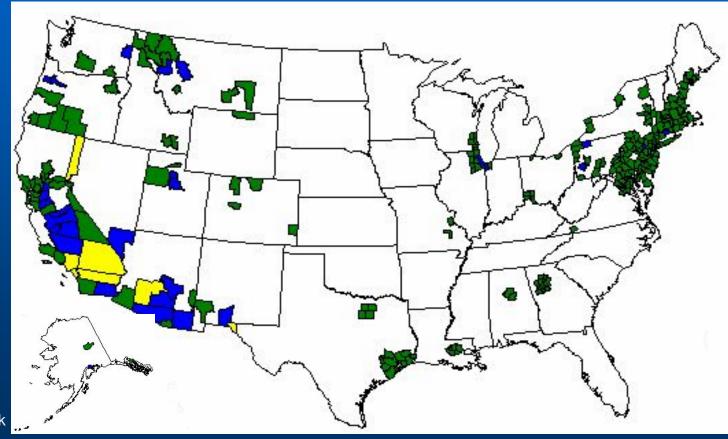
### Deteriorating metropolitan air quality

Number of pollutants by county designated non-attainment



Pollutants include: ozone, carbon monoxide, nitrogen dioxide, sulfur dioxide, particulate matter, lead

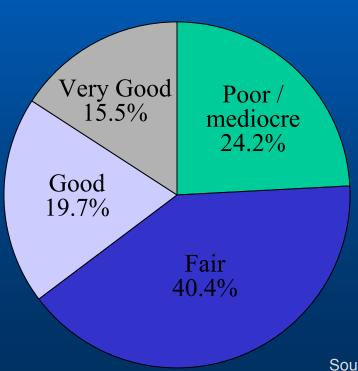
Source: U.S. EPA Green Book



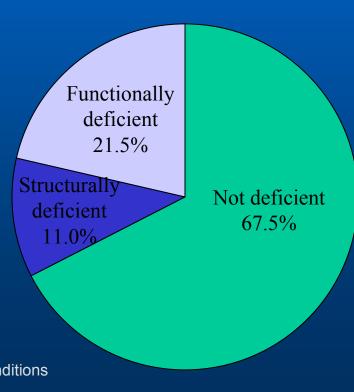


# Crumbling metropolitan infrastructure and functional obsolescence

#### **Urban Pavement Conditions**



#### **Urban Bridge Conditions**



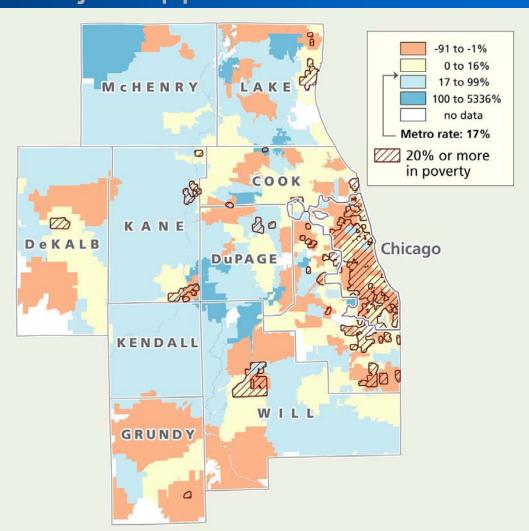
Source: FHWA 1999 Conditions and Performance Report



# Continued spatial mismatch between poor urban residents and suburban job opportunities

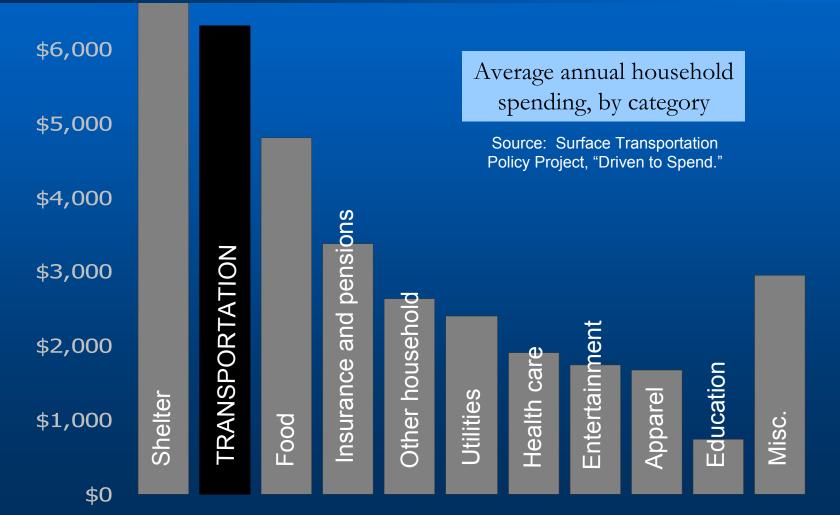
Percent growth in jobs 1994-2001, and poverty rates by census block group, 2000

Source: U.S. Census; County Business Patterns



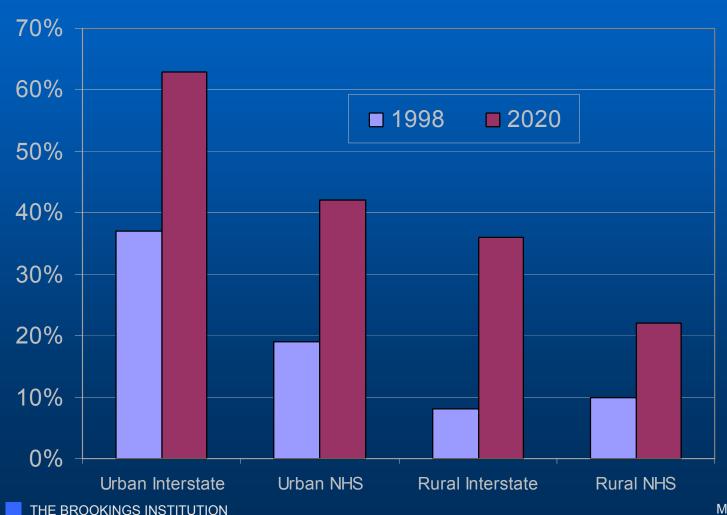


### The sticker shock of metropolitan auto-dependency





### Large increases in truck and commercial traffic



% of Highway Segments with over 10,000 Trucks Per Day

Source: Traffic Congestion and Reliability: Linking Solutions to Problems,

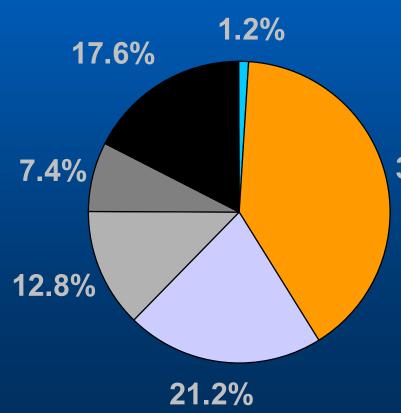
FHWA, 2004



# Even though 42% of terrorist attacks worldwide target rail systems or buses, surface transportation security is not a U.S. priority.



- **HHS**
- DoJ
- DoE
- All others



The federal government has invested \$9.16 per passenger in aviation security but less than one cent per transit rider.

39.8%

Federal Homeland Security Funding FY 2005 Request

Source:

Howitt and Makler, Brookings, 2005



I

What is the context for the discussion of the nation's surface transportation policies?

Federal transportation policy is at a crossroads

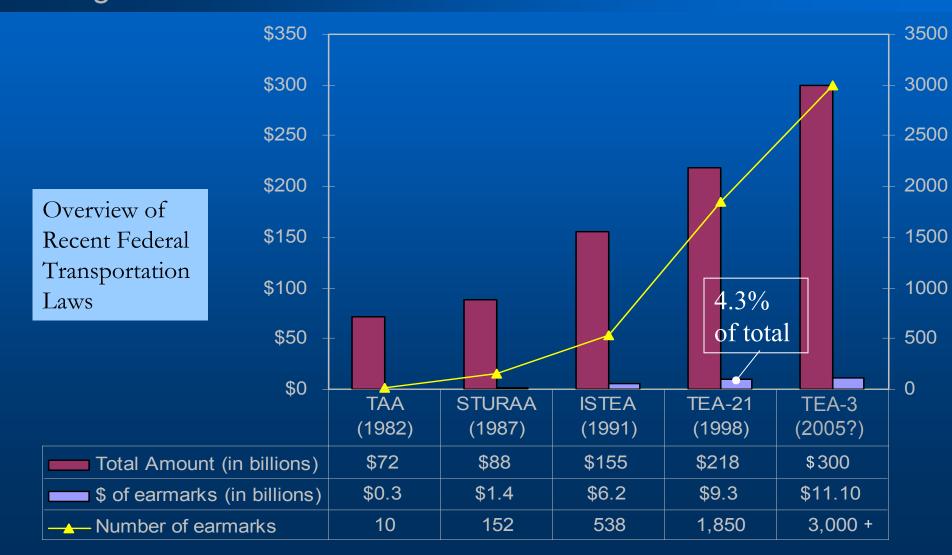
Realities on the ground have changed dramatically

Significant transportation challenges still exist

Traditional finance structure is running out of gas



## The federal law is characterized by regular, large increases in funding.



Proposed



### All three reauthorization plans propose significant spending increases.

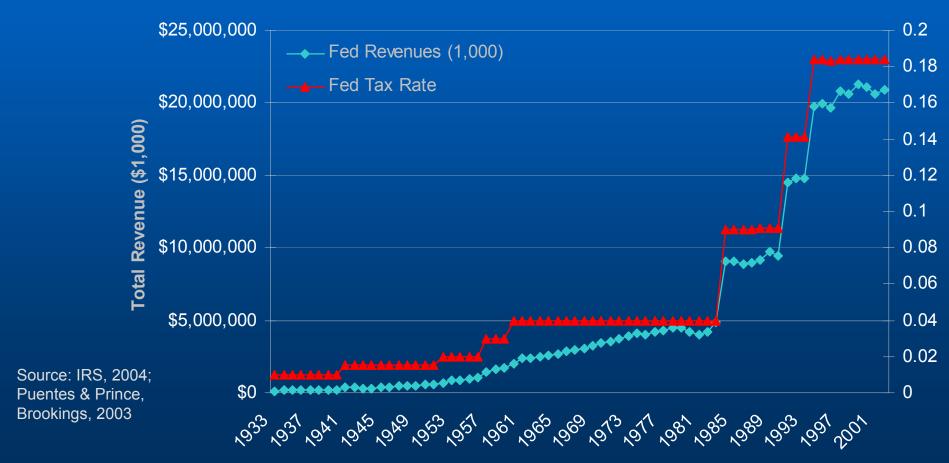
Overview of TEA-21 Reauthorization Proposals

TEA-21			Total	Previous		Priority Projects	
Reauthoriza- tion Proposals	Proposer	Date	Amount (in billions)	\$	%	Number	Total Amount (in billions)
SAFETEA	DOT	May-03	\$256	\$38	17.4%	-	-
SAFETEA	Senate	Feb-04	\$318	\$100	45.9%	-	_
TEA-LU	House	Apr-04	\$284	\$66	30.3%	2881+	\$11.10 +



# After years of steady growth, federal gas tax receipts have plateaued ....

#### Federal gas tax rate and revenues





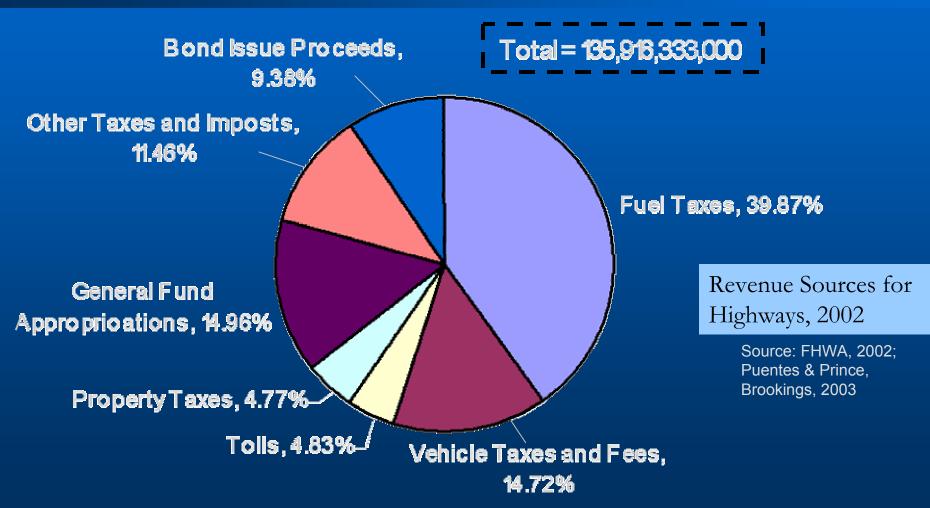
# .... And are beginning to decline when adjusted for inflation.

### Adjusted federal gas tax rate and revenues





The majority of highway funds on all levels continues to be generated by gasoline and other fuel taxes.





# Political debates about "donor" and "donee" states dominate the national legislative discussion

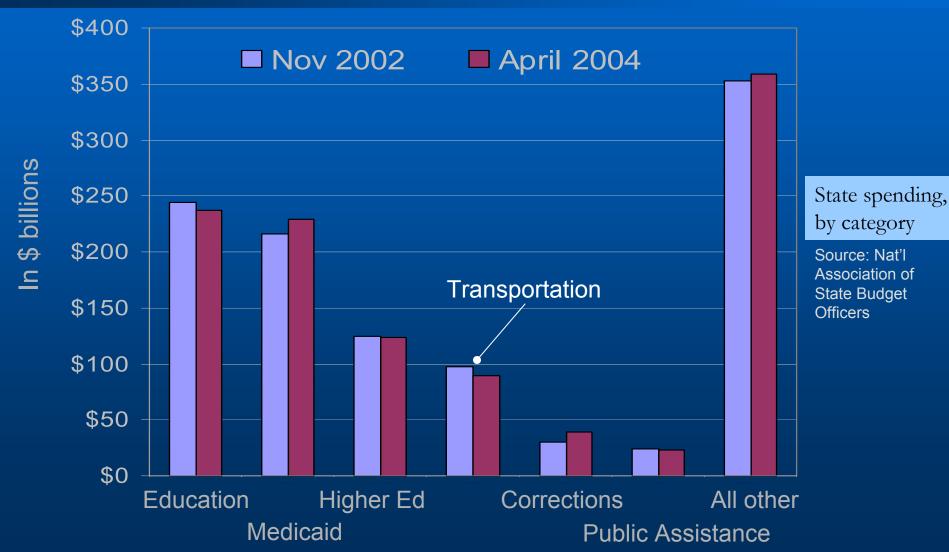
dominate the national legislative discussion									
	• •	oortionments to nts 1998-2003	Cumulated % since July 1956	Rank, Population change 90-00					
Top 5 states	Alaska	640.0%	667.3%	17					
	South Dakota	236.8%	208.7%	44					
	Rhode Island	232.0%	224.1%	47					
	Montana	230.9%	236.3%	42					
	North Dakota	227.8%	205.5%	50					
states	New Jersey	91.6%	98.7%	14					
Bottom 5 sta	Arizona	91.1%	108.6%	5					
	Florida	90.1%	89.6%	3					
	Georgia	90.1%	91.8%	4					
Bo	Texas	89.5% <sub>Source:</sub>	FHWA, 86.3%	2					

2002; Wachs, 2003

THE BROOKINGS INSTITUTION



## Spending on the state level is declining. Since 2002, state spending on transportation decreased by nearly \$9 billion.



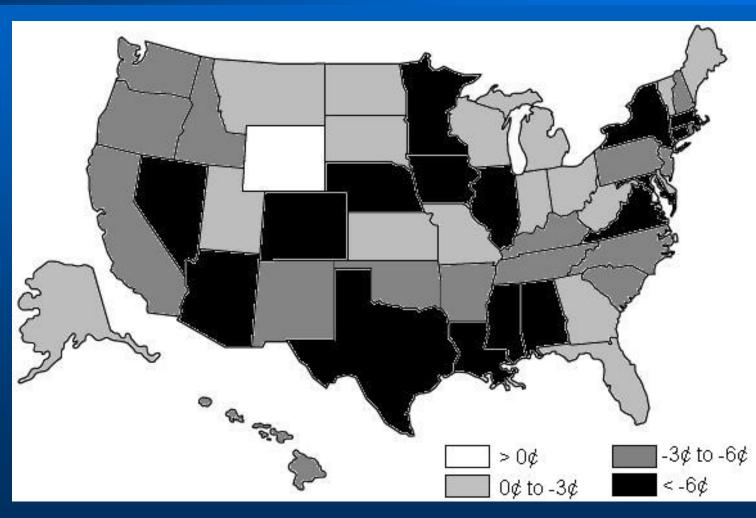


# Of the 32 states that have increased their gas tax since 1991, only one\* raised it as fast or faster than inflation

Inflation adjusted tax rate change, 1992-2004

Source: Puentes & Prince, Brookings, 2005

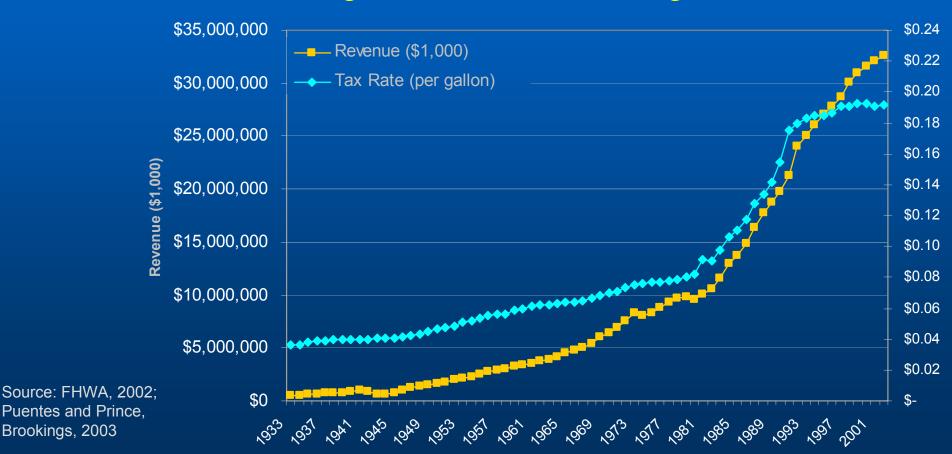
\* Wyoming, which started out with the 3rd lowest rate





# State gas tax revenues are slowing down as the average tax rate remains stagnant

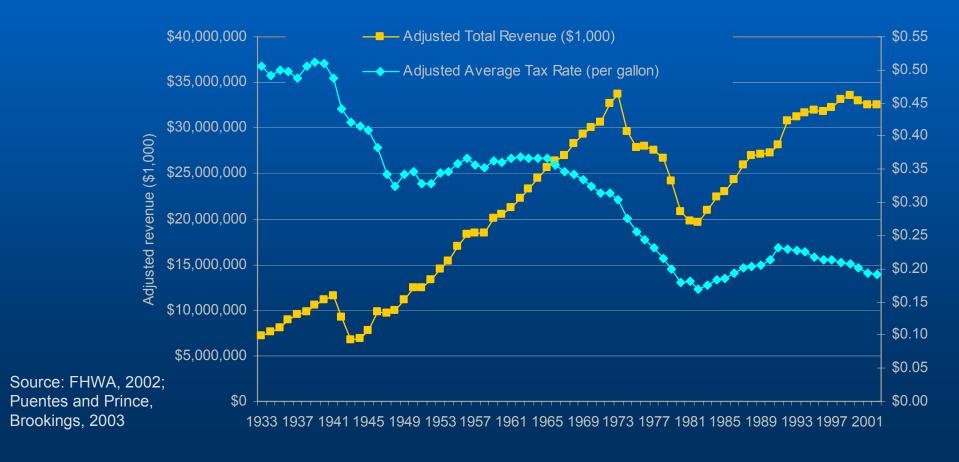
#### Average state revenues and gas tax rate





# After a precipitous decline in the 1970's and 1980's, "real" state gas tax receipts are again leveling off.

#### Inflation-adjusted state revenues and gas tax rate



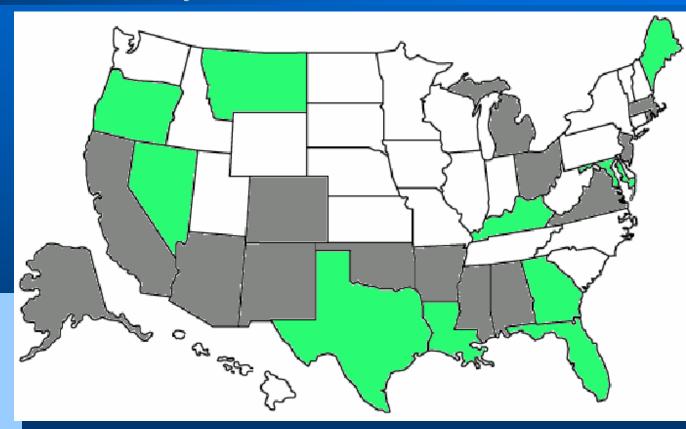


## GARVEE-style bond issuances are concentrated in the southern half of the country.

States GARVEE and Related Bonds Issuances

Source: Puentes & Warren, Brookings, 2005

In 2003, 9 states principal source of highway revenue was from bond proceeds. By contrast, only 3 states principal source was the state gas tax

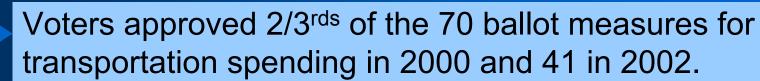


State has issued GARVEEs (plus PR and VI)

State has authority to issue GARVEEs



## Local governments are taking up the slack left by the stagnation of fuel tax revenues on the state and federal level



Myers and Puentes, 2001 and STPP, 2002

In 2004, voters approved 23 of 31 ballot measures to launch or expand bus and rail lines in 11 states worth more than \$40 billion.

Center for Transportation Excellence, 2004

In 2004, voters also approved 19 of 24 other tax or bond measures for roads and bridges.

El Nasser, 2004



# Local roads compose the vast majority of the nation's transportation system.

Hation's transportation system.				
	Miles %	% of total		
Rural Roads Counties Towns, Townships, Municipalities	1,628,510 ( 606,398 (	41.1%	Ownership of American Roads, 2002	
States Federal Other Jurisdictions	662,855 117,751 56,254	16.7% 3.0% 1.4%	Source: FHWA, 2002; Wachs, 2003	
Urban Roads Counties Towns, Townships, Municipalities	144,615 (624,163 (	3.6% 15.7%	75.7% of	
States Federal Other Jurisdictions	110,434 2,819 12,695	2.8% .1% .3%	national total	
TOTAL	3,966,494	100.0%		



## The share of user fees as a percent of transportation revenues is either declining or growing very slowly

ľ	revenues is either declining or growing very slowly					
			<b>√</b> 95-98	△ 00-03	△ 95-03	
	Federal	Highway Trust Fund	79.6%	-14.4%	53.7%	
	State	Fuel & vehicle taxes	18.0%	3.5%	22.0%	
		Tolls	24.2%	15.7%	43.7%	
		General funds	37.4%	54.2%	111.8%	
		Bonds	92.2%	14.8%	120.7%	
	Local	Fuel & vehicle taxes	13.8%	35.7%	54.5%	
	Changes in	Tolls	11.2%	91.0%	112.4%	
	transportation revenue	General funds	14.1%	39.0%	58.6%	
	Source: Federal	Bonds	20.1%	15.0%	38.2%	
	Highway Statistics	Property taxes	-6.3%	63.9%	53.6%	



## A Metropolitan Agenda for Transportation Reform



The Context for the Discussion of the Nation's Surface Transportation Policies



State and Metropolitan Responses to Federal Change



Getting Transportation Right for Metropolitan America



ISTEA and TEA-21 marked a seachange in federal transportation policy

As a framework the laws are sound.



#### The laws enacted eight major changes:

- 1. Metropolitan devolution
- 2. Reliable funding
- 3. System preservation and maintenance
- 4. Funding flexibility
- 5. Special challenges
- 6. Beyond transportation
- 7. Citizen participation
- 8. Open government

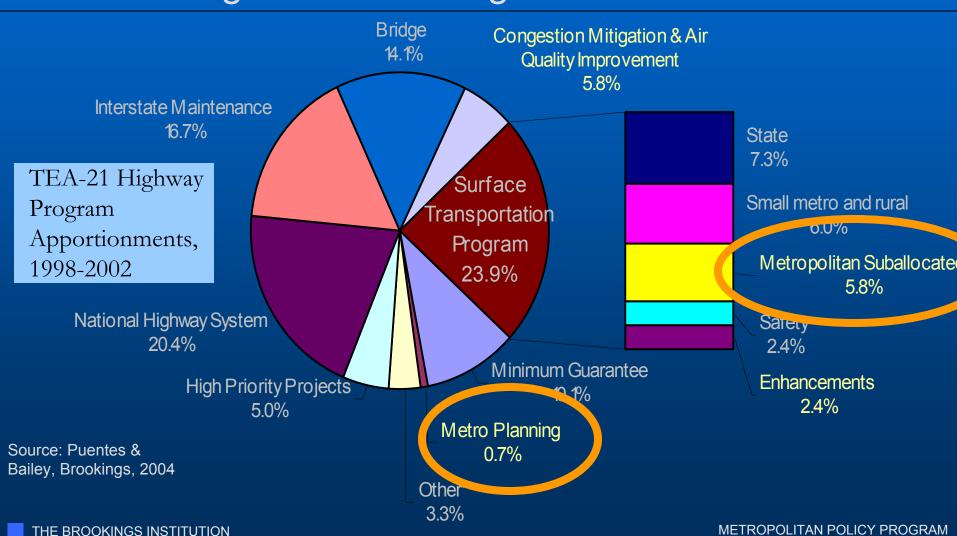


### Metropolitan focused programs

- Suballocated Surface Transportation Program (STP)
- Congestion Mitigation and Air Quality (CMAQ)
  Program
- Planning (PL Funds)
- Transportation Enhancements

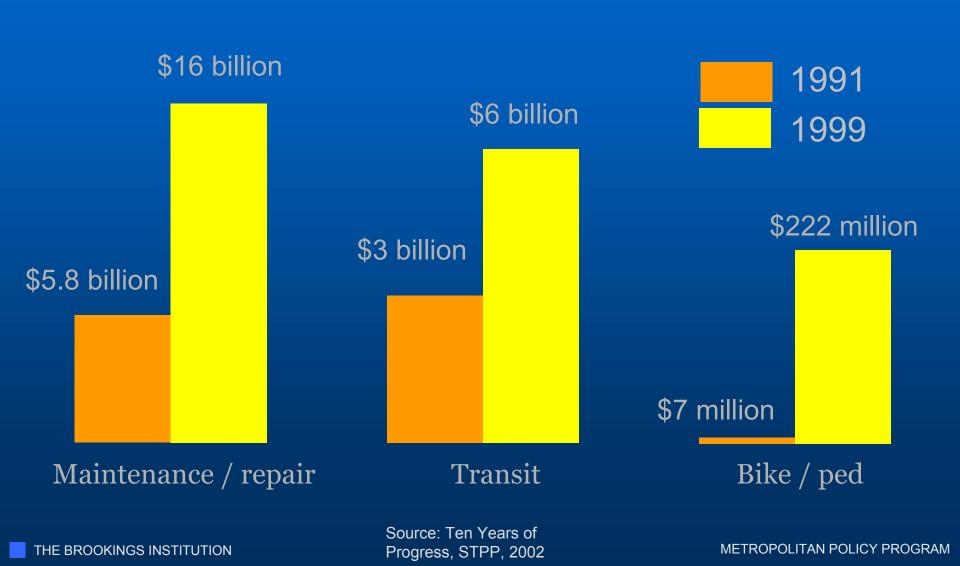


# The vast majority of federal transportation funds do not go to local or regional entities.





## In some key areas, federal spending has shifted





#### Travel habits are changing

- For the first time since World War II, growth in transit ridership has outpaced the growth in driving for five straight years
- Transit ridership is at its highest levels since 1960
- Bicycle commuting grew by nearly 9% during the 1990s
- Clearly, automobile travel still dominates, but VMT is leveling off.

Average yearly increase in VMT:

2000-2004: 2.0%

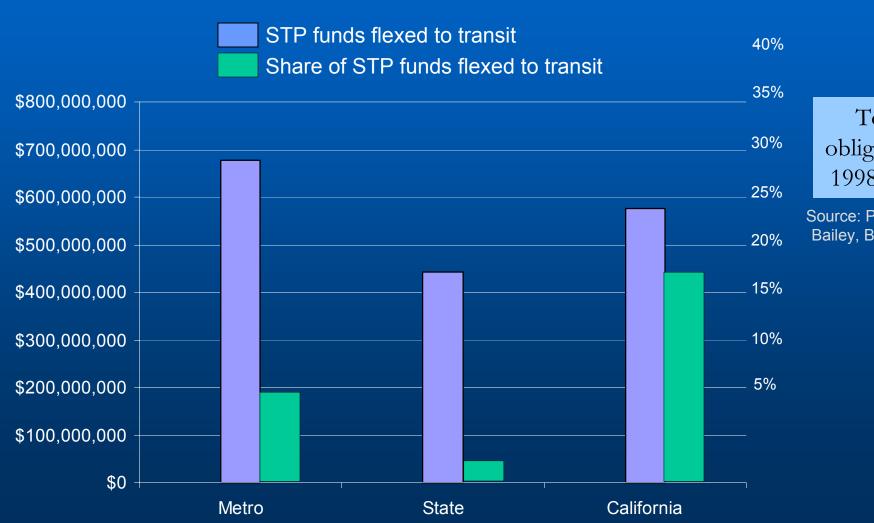
1990-1999: 2.5%

1980-1989: 3.2%

1970-1979: 3.7%



## STP Funds Spent on Transit by Metro vs. State



Total obligations: 1998-2002

Source: Puentes & Bailey, Brookings, 2004

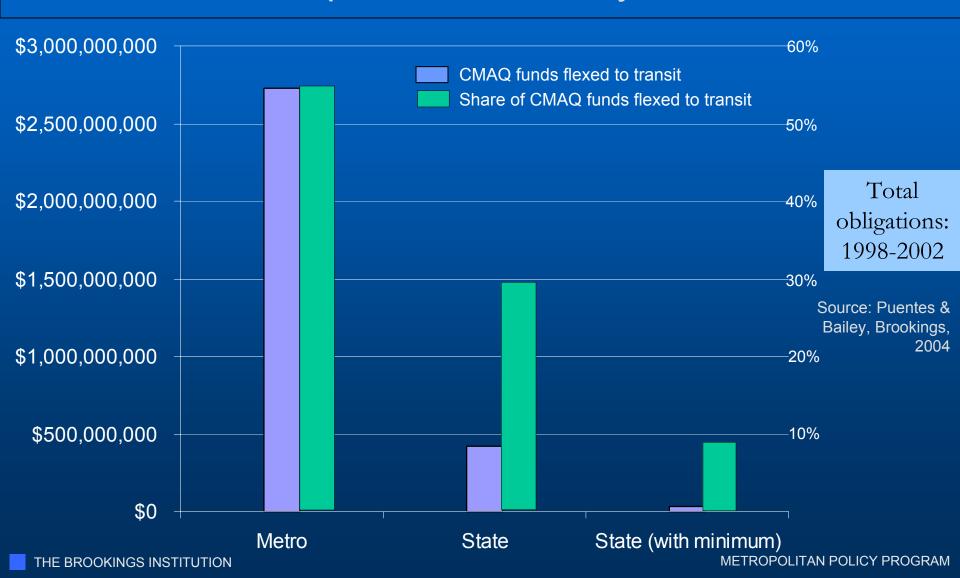


## STP Funds Spent on Transit by MSA/CMSA

NAOTEO A EOO	uballocated STP Spen Transit, 1998-2002	N // a ± 10 a A 10 a a	Suballocated STF on Transit, 1998-2	
Portland, OR	57%	Chattanooga	, TN 14%	
San Francisco	o, CA 47%	Minneapolis,	MN 13%	
Seattle, WA	40%	Raleigh, NC	13%	
Atlanta, GA	40%	Richmond, V	A 13%	
Norfolk, VA	37%	Daytona Bea	ch, FL 12%	
Los Angeles,	CA 22%	Sacramento,	CA 12%	
Boston, MA	20%	New York, N'	Y 11%	
Orlando, FL	19%	Lexington, K	Y 10%	
Birmingham, A	AL 19%	Allentown, PA	9%	
Denver, CO	17%	Des Moines,	IA 9%	
Knoxville, TN	16%	Tampa, FL	9%	
Fort Myers, F	L 15%	St. Louis, MC	9%	



## CMAQ Funds Spent on Transit by Metro vs. State





Clearly, the reforms have made a difference

But the impact has been both profound and disappointing.



Implementation has been seriously flawed - and in basic ways unresponsive to metropolitan needs



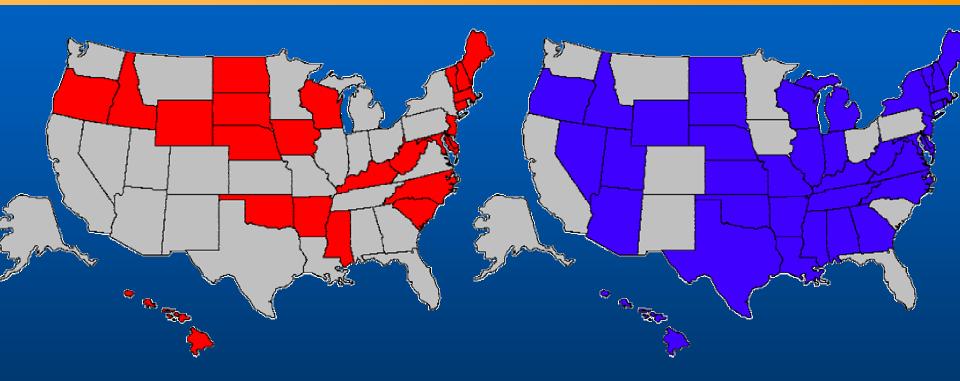
# Sufficient powers have not been devolved to metropolitan areas

- Many state DOTs continue to wield formal and informal power and retain authority over funds
- Governors and state DOTs have veto authority and political leverage over metro areas
- MPOs in some large metro areas (New York, Boston, Chicago) remain state agencies

Such arrangements subvert federal intent with respect to devolution



#### States still retain control over metropolitan-focused programs



States that do NOT suballocate CMAQ (in red)

States that do NOT suballocate TE (in blue)



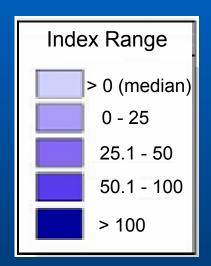
# Metropolitan areas are penalized in the allocation of transportation money

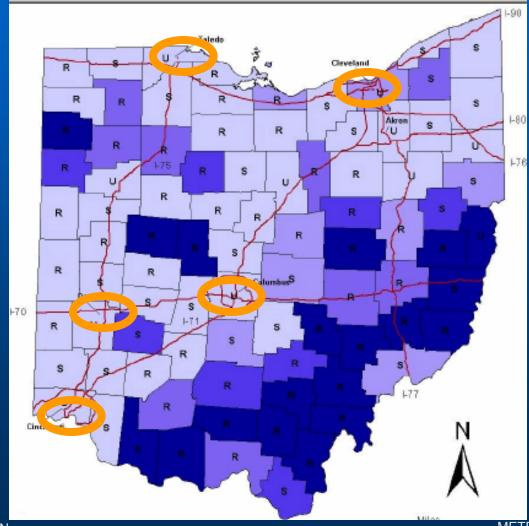
- Most money flows to states
- Metro areas make decisions on 10¢ on every dollar they generate
- Some states distribute money evenly regardless of need

In the donor / donee debate, metro areas are often the doners



## In the donor / donee debate within states, metro areas are often the donors.





Total Spending by ODOT (1980-1988) per Average Dollar of Gas Sales: Ohio Counties (1982, 1987, 1992, 1997)

> Source: Hill et al, Brookings, 2003



## Highways and transit operate on an unlevel playing field

- Uneven federal / state match (e.g., 80/20 vs. 50/50)
- Uneven project justification requirements
- Restricted use of state gas taxes



30 states (in red)
restrict gas tax
spending for highwayonly purposes



## Many transit agencies, like Washington's, are not able to rely on dedicated funds ..... for capital expenses:

Туре	Source	WMATA	Agencies with over 1 million	National total
Directly Generated Funds	Dedicated Sources	0%	29.68%	27.68%
State Funds	General Revenue	12.11%	2.80%	3.10%
	Dedicated Sources	0%	8.89%	8.54%
Local Funds	General Revenue	20.63%	4.79%	4.83%
	Dedicated Sources	0%	14.53%	15.27%
Federal	Formulas	67.26%	39.31%	40.58%

Sources for Capital Funds Applied

Total from Dedicated Sources	0%	53.10%	51.49%
------------------------------	----	--------	--------

Source: Puentes, Brookings, 2004

and FTA NTD, 2002.



## Many transit agencies, like Washington's, are not able to rely on dedicated funds ..... for operating expenses:

Туре	Source	WMATA	Agencies with over 1 million	National total
Directly Generated Funds	Fare revenue and other	61.45%	42.97%	46.15%
	Dedicated Sources	0%	7.85%	3.09%
State Funds	General Revenue	20.32%	6.54%	7.18%
	Dedicated Sources	0%	19.22%	18.10%
Local Funds	General Revenue	14.61%	7.63%	8.46%
Local Fullus	Dedicated Sources	1.98%	11.53%	11.64%
Federal	Formulas	1.64%	4.26%	5.38%

Sources for Operating Funds Applied

Total from Dedicated Sources 1.98% 38.60% 32.83%

Source: Puentes, Brookings, 2004

and FTA NTD, 2002.



#### Metropolitan and state capacity is uneven

- Some states and metro areas have focused on transportation-only solutions ....
- Little emphasis on issues such as urban planning, environmental management, housing, economic development.
- And although MPOs in some metro areas do well, many struggle to fulfil their statutory responsibilities.



# Citizens are still not actively engaged in transportation decision making

- Most states do not involve citizens in and "early and continuing" fashion.
- Citizens rarely have access to reliable, transparent data / information



# TEA-21 failed to improve accountability and performance

#### Despite:

- Congress' strict standards for welfare and education reforms
- Government Performance Results Act
- and a 40 percent spending increase......

States are not held accountable for meeting standards for accessibility, economic development, efficiency, environment, mobility, safety, or system preservation.



## A Metropolitan Agenda for Transportation Reform



The Context for the Discussion of the Nation's Surface Transportation Policies



State and Metropolitan Responses to Federal Change



Getting Transportation Right for Metropolitan America



The first order of business should be to retain the ISTEA and TEA-21 reforms



## But Congress needs to go beyond past reforms

- Reform governance to reflect metropolitan challenges
- Provide enhanced tools and policies to respond to metropolitan challenges
- Enforce and augment requirements for accountability and reward performance



## Reform governance to reflect metropolitan challenges

- Expand the responsibility and capacity of MPOs
  - → e.g., increase planning set-aside, strengthen performance and accountability requirements
- Ensure state decisions reflect metropolitan realities
  - → e.g., representation, spending.
- Connect air, rail and surface transportation
  - → e.g., integrate aviation with rail and intercity bus



## Reform governance to reflect metropolitan challenges

- Encourage states and metro areas to work together on major economic corridors or large regions
  - → e.g., pilot program to support corridor planning, support for multi-state MPOs
- Build a field of 21<sup>st</sup> century transportation professionals
  - → e.g., augment Metropolitan Capacity Building Program



# Provide enhanced tools and policies to respond to metropolitan challenges

- Increase the funding that flows directly to MPOs
  - → e.g., greater direct suballocation (STP, CMAQ)
- Level the playing field between highways and transit
  - → e.g., Retain 80/20 transit match, require long range financial requirements for road projects, provide incentives for removing restrictions on state gas taxes



# Provide enhanced tools and policies to respond to metropolitan challenges

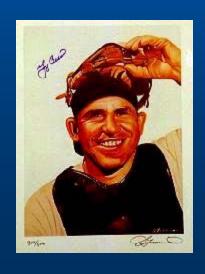
- Facilitate transit-oriented development
  - → e.g., key criteria for transit funding should be supportive land uses
- Use the market to mitigate congestion
  - → e.g., augment road pricing programs, fully deploy electronic toll collection technologies



# Enforce and augment requirements for accountability and reward performance

- Establish a new federal framework for accountability and performance
  - → e.g., disclose program and spending decisions, measure progress on indicators of national significance, establish consequences for excellent and poor performance
- Increase opportunities for citizen participation
  - → e.g., provide incentives for using advanced technologies

# "If you keep doing what you always did, you'll always get what you always got."



## www.brookings.edu/metro



#### METROPOLITAN POLICY PROGRAM

September 15, 2004

Home

News & Events

Scholars

Research Topics

#### Programs

- · Economic Studies
- · Foreign Policy Studies
- · Governance Studies
- Metropolitan Policy
- Policy Centers
- Projects

Publications

Bookstore

**Executive Education** 

**About Brookings** 

Redefining the challenges facing metropolitan America and promoting innovative solutions to help communities grow in more inclusive, competitive, and sustainable ways.

REGIONAL ANALYSIS

Brookings > Metropolitan Policy

#### Losing Ground: Income and Poverty in Upstate New York

In recent decades Upstate New York has transitioned from a stable middle-income region to one with serious income and economic problems. This paper, the fourth in a Metropolitan Policy Program series on the region, examines these trends in detail and proposes a number of policy responses.

- read the paper
- Special Series on the Health of Upstate New York

#### METROVIEW

**Battleground State** Demographics Diverge, by William Frey

POSITION AVAILABLE External Affairs/Budget Coordinator

News Index

#### SEARCH BROOKINGS

GO

Advanced Search

#### Metro Program

- Research by Topic
- Publications
- MetroViews
- Presentations and Events
- About Us

#### Metropolitan

Policy Program

Greater Washington Research Program

Urban Markets Initiative

#### ANALYSIS & COMMENTARY

#### West Michigan: Building a Competitive Future

This powerpoint by Robert Puentes was presented at a summit in Grand Rapids, MI focusing on how that region can meet the economic development goals of West Michigan by fostering regional cooperation, collaboration, and communication.

COMMUNITY AND NEIGHBORHOOD DEVELOPMENT

#### SUBSCRIBE TO:

#### Metro Program Listserv

Stay on top of the latest releases. events, and web features.

First name:

Last name: