

# CONGESTION PRICING FOR NEW YORK?

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# DISCUSSION POINTS

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- LONDON – NYC – DIFFERENCES
- CONGESTION PRICING OBJECTIVES
- CONGESTION PRICING – BENEFITS AND COSTS

# Why price streets

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- They have value!!
- Competition for curb space
- Competition for lane space
- WHY???
- Land/activities have value!!!

# Decrease congestion- increase value

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- Less traffic, accessibility increases
- Accessibility increases, land values increase

# Starting Thoughts

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- The core of Manhattan (south of 60<sup>th</sup> street) has one of the largest concentrations of workers in the City and the World
- 75% of the regional workforce **do not** work in the core

# The Core and Adjacent Areas



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## London – NY Differences

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- London core pop density 21,000 pers/sq.mi.
  - NYC core pop density – 53,000 pers/sq.mi.
  - Miles of highway/sq.mi.: London 2.05, NYC -9.4
  - London - central – worker density – 15,000 pers/sq.mi
  - NYC core – worker density – 74,000 pers/sq.mi (highest of all peer cities)\*
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- \*Ref: Paaswell,R. and J. Zupan, "Transportation Infrastructure Investments: New York and Its Global Peers" UTRC, 1999

# It's about

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- Competition
- Agglomeration



# MANHATTAN IMPORTS WORKERS

ORIGIN COUNTY	% OF WORK TRIPS FROM ORIGIN COUNTY TO MANHATTAN
MANHATTAN	85
QUEENS	52
BRONX	40
BROOKLYN	46
STATEN ISLAND	28
NASSAU, LI	23
WESTCHESTER	23
HUDSON, NJ	29
SOURCE: Travel in NY-NJ Met area: NYMTC 2000 October 2007	

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# New York City – the Core

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- The Core – NYC below 60<sup>th</sup> St
- 3.5 million weekday entries
- 1.8 million jobs
- 2 million enter by subway
- 180,000 enter by commuter rail
- 260,000 enter by bus
- 1.1 million enter by motor vehicle
- 800,000 motor vehicles

## Thoughts on Mode Split

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- 1.1 million by mv – 800,000 mv, or 1.375/mv
- If divert 20% by pricing
- 160,000 mv or 220,000 persons
- If 50 % diverted to rail, at 100/car – peak, need 1100 cars
- At 10cars/train, need additional 110 trains
- If high tech subway mod proceeds, 110 additional trains over a 2 hour peak period, among at least 13 subway routes are manageable.

# Why congestion pricing in NYC

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- Multiple objectives – what are the weights
  - Pure congestion relief, to be realized by higher LOS, or greater average speeds
  - Air quality
  - Energy savings
  - Improved access for higher priority vehicles – (goods)
  - Improved amenities for non motorized means of transport
  - Income from pricing

# Congestion pricing – what comes before

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- Enforcement of current laws, ordinances
- Consider E River Bridge Tolls, VNB tolls
- Define objectives – and measures of success
- Develop candidate zones
- Define appropriate technologies
- Define pricing strategies
- Determine impacts- in zone, regionally
- ***AND – WHO IS IN CHARGE??***

# Benefits and costs

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- Each trip represents an economic transaction – with an applied value
- The value of the trip is linked to the importance of the activity and the utility of the mode used to complete the trip
- Congestion pricing will impact both the ability to realize the activity and the utility of the mode

# Benefits and Costs

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- Value of meeting objectives
- Change in economic output
- Relocations: within, outside, outside region
- Relative change in regional attractiveness, and costs of travel
- Redistribution of activities
- Funds generated

# Impacts

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- Redistribution

- Individuals and firms may be unwilling to pay the charge. They may relocate job location, firms may relocate or individuals may relocate residences. Data suggest that the congestion zone will gain economically; this presents an opportunity in the 5 boroughs to examine outer borough economic development strategy.



## Impacts - other

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- Air quality – is this enough
  - Concurrent reinforcing policies, e.g., electric delivery vehicles
- Energy – or, in particular use of oil
- Equity – is this the right forum?
- QOL – is there a net gain; does NYC remain NYC