

Portland Streetcar Case Study

Case Selection

“The streetcar system in Portland is perhaps the exemplary case among the modern-era streetcar systems operating in the U.S. The Portland streetcar lines are frequently pointed out for their strong role in promoting adjacent urban development, their relatively high ridership, and their relatively strong service performance” (Brown, Nixon, & Ramos, 2015).

- high ridership, cost effectiveness, and successes in structuring and implementing productive public-private partnership and effective value capture strategies
- streetcar system that functions both as a transportation solution and as an economic and real estate development tool (McIntosh, 2015)

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History

- 1872 Portland Street Railway Company, a horse-drawn
- 1889 Willamette Bridge Railway, electric streetcar
- 1890 Portland Cable Railway Company, steam-powered cable car
- 1906 Portland Railway, Light and Power Company,
40 lines, 300 miles, 583 cars
- 1958 Portland Development Commission created to foster urban renewal.
- 1988 preliminary concept plan for Portland's contemporary streetcar system
- 1996 funding approved for first phase of a new streetcar system
- 1999 ground breaking
- 2001 service commences

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Summary

- first modern streetcar system in North America
- developed and expanded through public-private partnership
- highly effective value capture strategies
 - special assessments
 - tax increment financing (TIF)
 - assignment of parking revenues
- initial streetcar investment of \$103M (to \$251M through five phases) has induced billions of dollars of private investment and millions of square feet of residential, office, retail, hotel, and institutional development
- Between 1997 and 2006, 55% of all central business district development within Portland occurred within one-block of the streetcar, whereas development within this corridor accounted for 19% of CBD development activity prior to 1997 (Adams, 2008).

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Local Economic Conditions, Market Considerations, and Value Creation

Capacity, Organization, Coordination, and Partnership

Regulatory Considerations

Business Case

Credit Worthiness, Finance, and Funding

Additional Considerations

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Takeaways

Rigorous Planning:

cost discipline,
strategic public-private partnership,
high-quality TOD,
creative combination of value capture and other funding mechanisms

Early Engagement:

strategic partnership between public and private sector interests resulted in “alignment of policies” successful in achieving common goals and both public and private ends. Specific policies included:
TIF and SAD design and implementation;
land use regulation, zoning, and development standards;
fiscal incentives

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Takeaways

Private Involvement:

Private sector initiative and engagement crucial for success.

effective in achieving financial, political, and public support and credibility. ability to point to an agreement with joint obligations of the respective public and private partners carries substantial clout and provides dependability and flexibility that both parties can rely upon

(Adams, 2008).

Timing:

commencement of service required more than 10 years from initial planning even with extensive public and private support.

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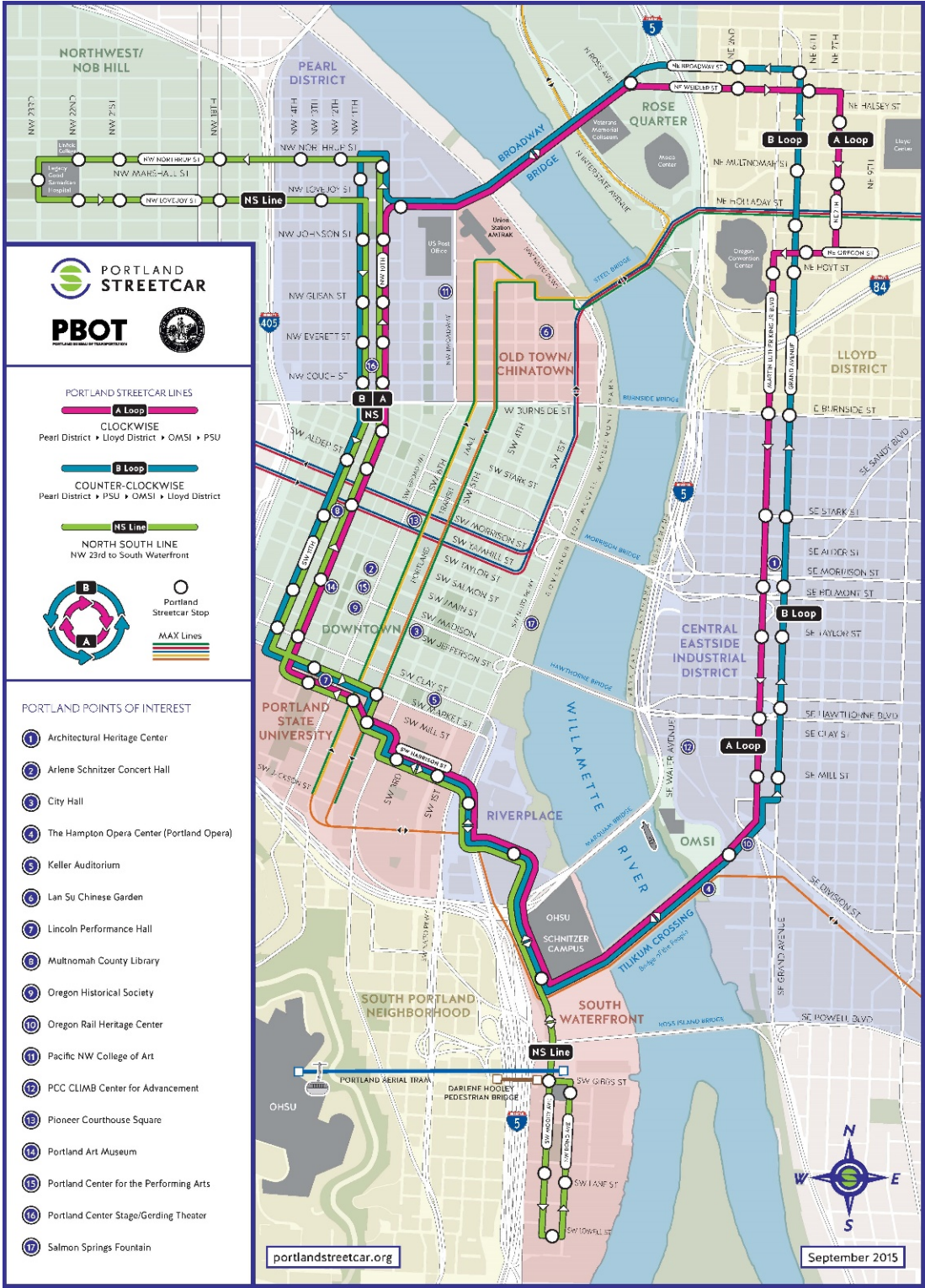
Takeaways

Value Capture Design Flexibility:

line/segment-specific flexibility in structuring TIF and special assessments optimized funding opportunities.

Even within contiguous TOD areas, value capture was not a one size fits all proposition.

Dan Bower
Executive Director
Portland Streetcar, Inc.



Service Plan Effective September 2015
North/South Line (6 streetcars)

A/B Loops (4 streetcars each)

Monday – Saturday
Every 15 minutes
10:00am – 7:00pm

Every 20 minutes
5:30am – 10:00am
7:00pm – 11:30pm

Sunday
Every 20 minutes
7:30am – 10:30pm

Weekday Ridership ~ 15,200/day

New Development in Corridor from 1998 to 2015



\$4.5 billion

- Since 1998, \$4.5 billion* in market value** has been developed in the corridor.
- New development comprises 28% of the total market value in the corridor.

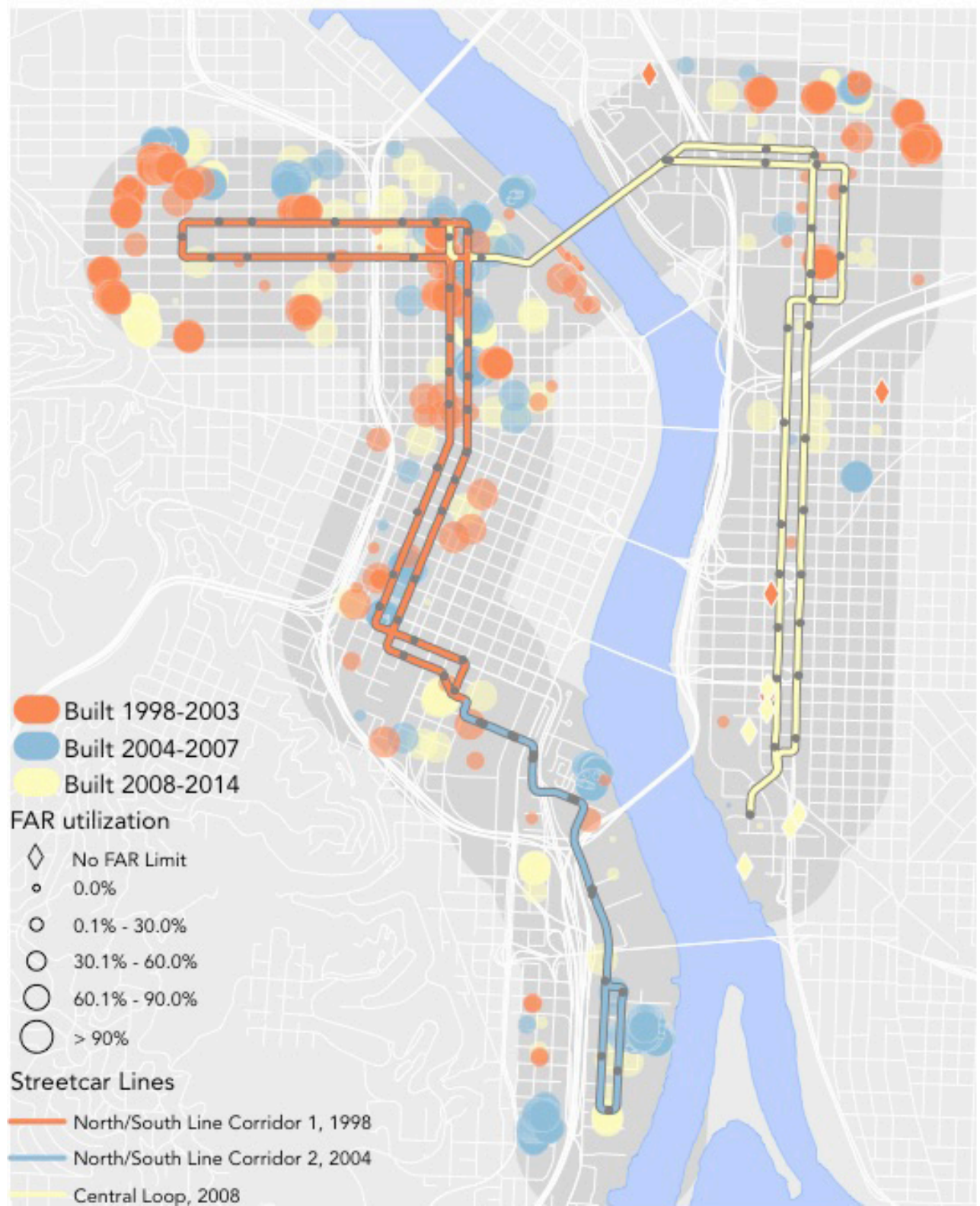
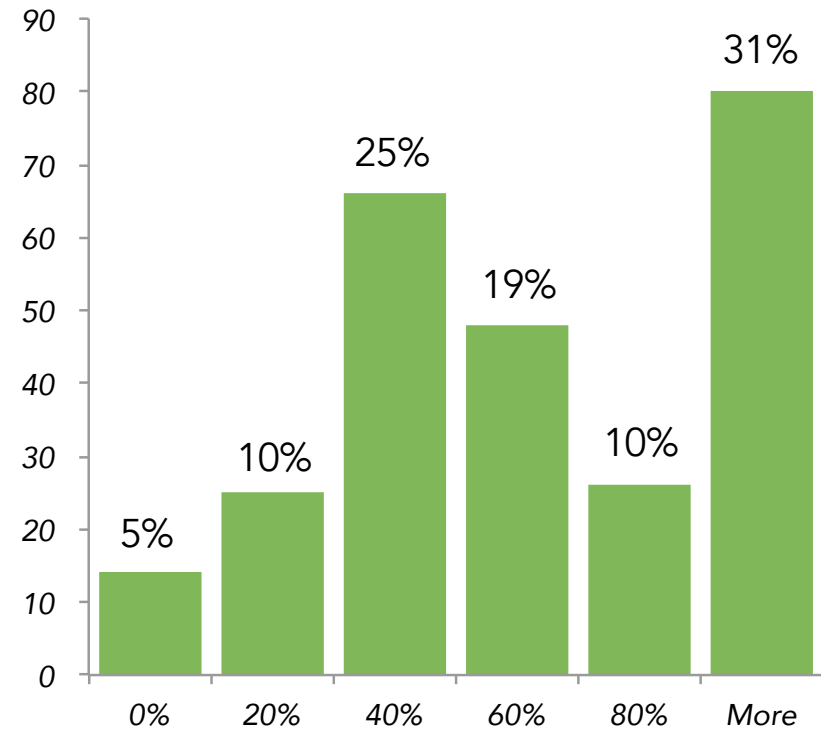
22.9 Million Total Square Feet

7.7 Million Commercial SF

17,900 Units of Residential

Real Market Value (RMV) is "the amount in cash that could reasonably be expected to be paid by an informed buyer to an informed seller"

FAR Utilization of New Development 1998 to 2015



Source: Metro RLIS, City of Portland

Corridor Percentage of City RMV has increased by 6%



\$11.63 billion

- The corridor has increased in market value by \$11.63 billion since 1998.
- The corridor comprised 11% of citywide market value in 1998. Post-Streetcar, it increased to 17% of total market value in the city by 2015.

11% of PDX
in 1998



17% of PDX
in 2015

Multifamily Units Developed Since 1998 in Corridor



25%

- 25% of all apartments developed in the corridor from 1998 to 2015 were subsidized affordable housing units.

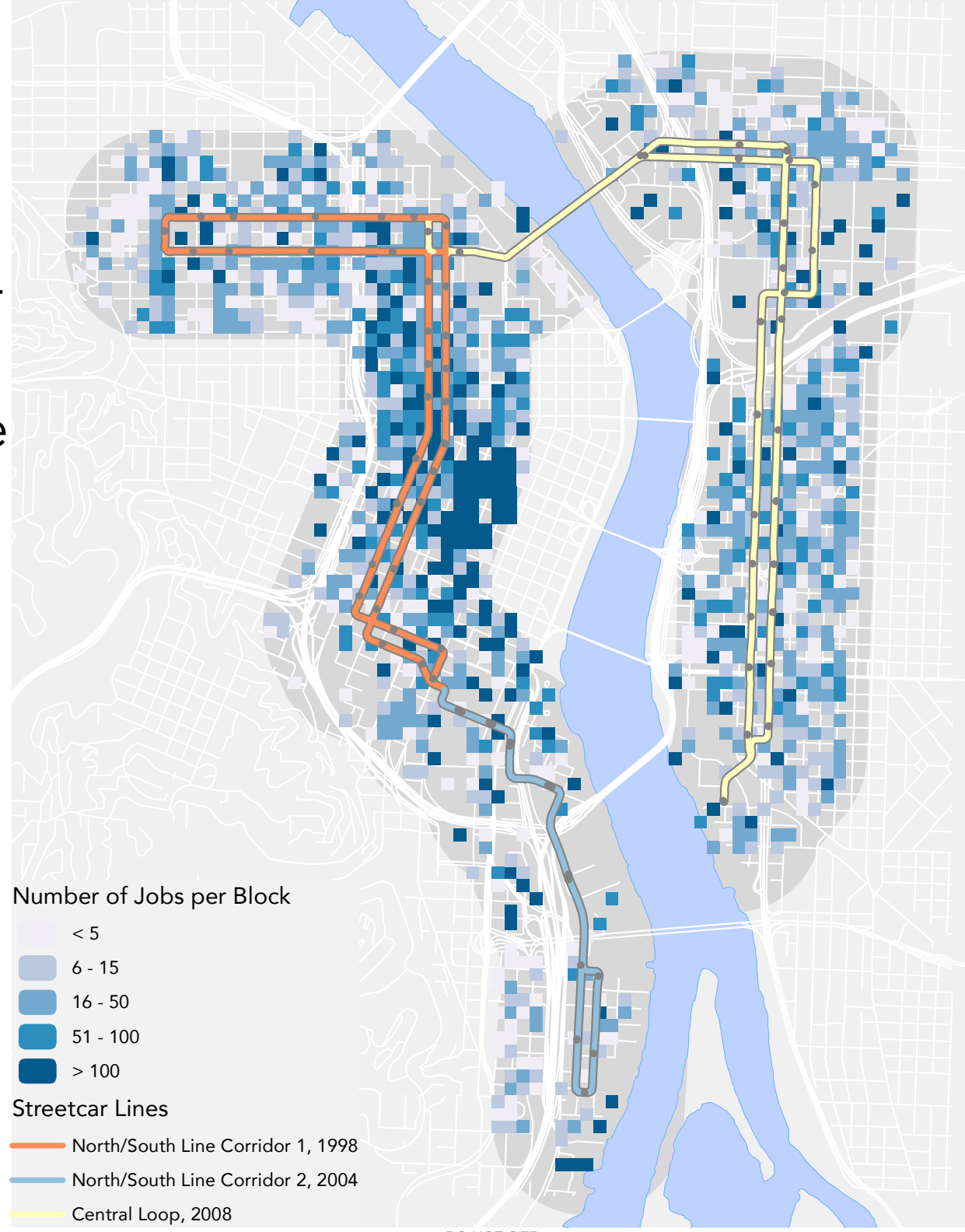


Type	Buildings	Units
Apartment	71	8,635
Affordable	26	2,911
Condominium	41	4,230
Hotel	6	1,315
Institutional	3	797
Grand Total	147	17,888

Job Density 2013

- 109,181 Jobs in Corridor
- \$6.7 Billion in income
- \$61,400 Average Income

Streetcar Corridor
Accounts for 32.7%
of Jobs in the City
in 2013



Variables included in the price (hedonic) model*



size of unit



bedrooms



bathrooms



age of
building



garage



fireplace



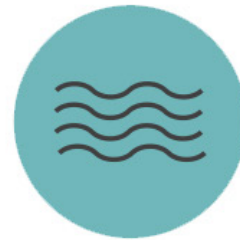
air
conditioning



condo
floor



top
floor



waterfront



river
distance

Model explains 89% of the variance in condo prices from 1998 to 2014

*Standard errors were clustered based upon census tract geography and fixed effects were included over time and by geography

Building Types



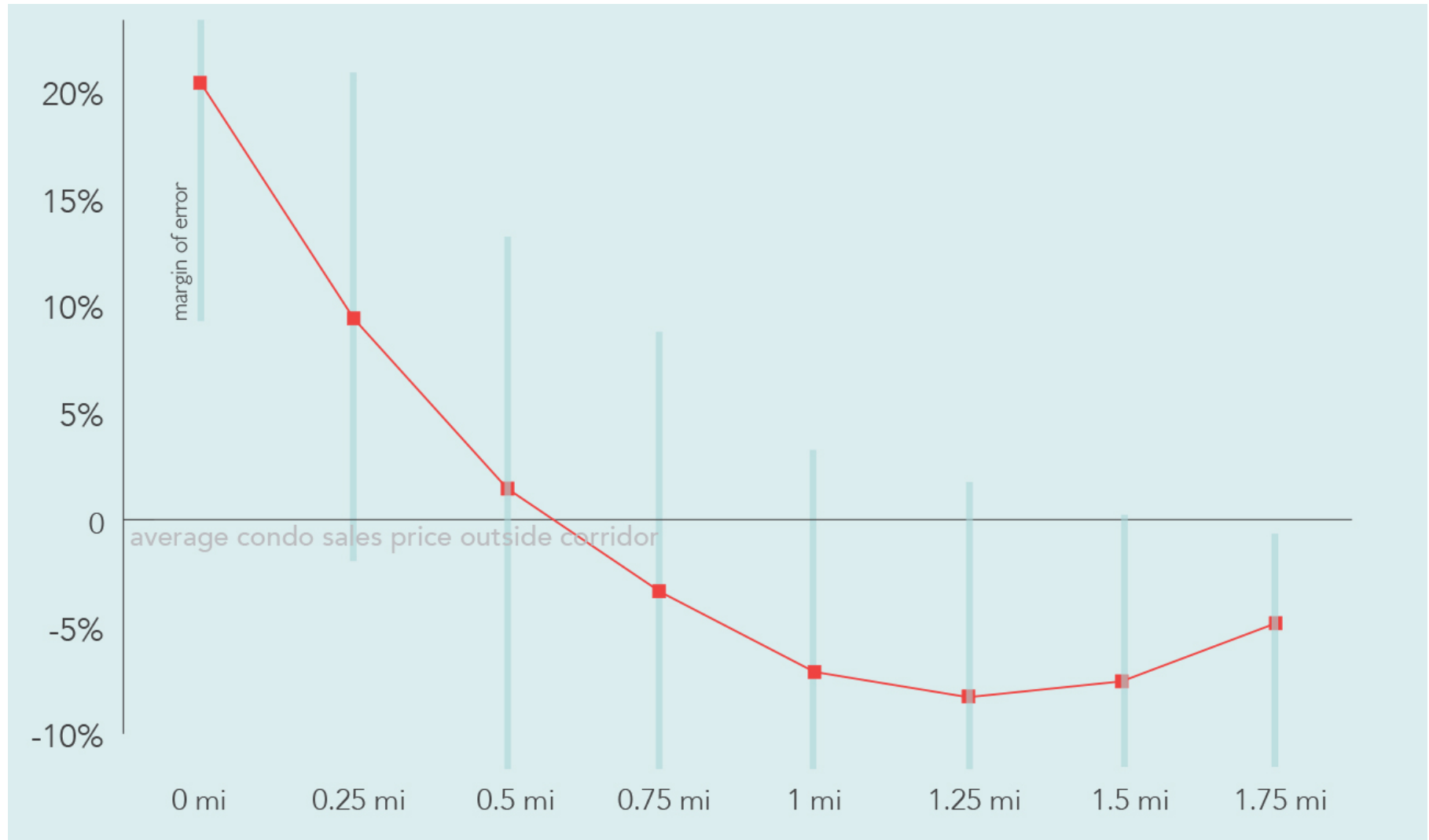
60 -100 Units/Acre



250 Units/Acre

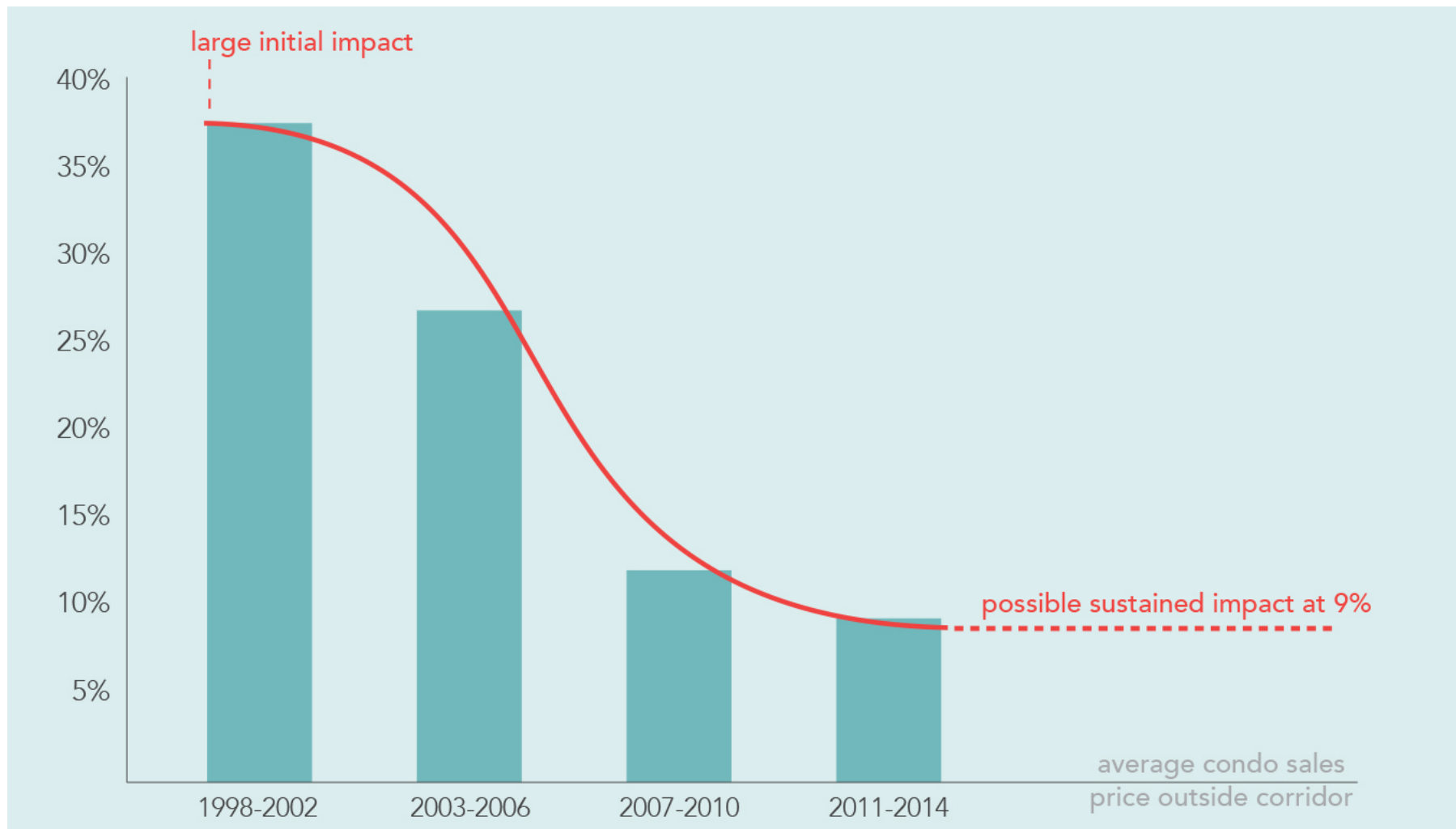


Price effect by distance from corridor in 2014



- Price effect of 9% at ¼ mile from corridor in 2014
- Price Effect decreases to 0 after 0.5 miles away from corridor

Price effect over time at ¼ mile from corridor



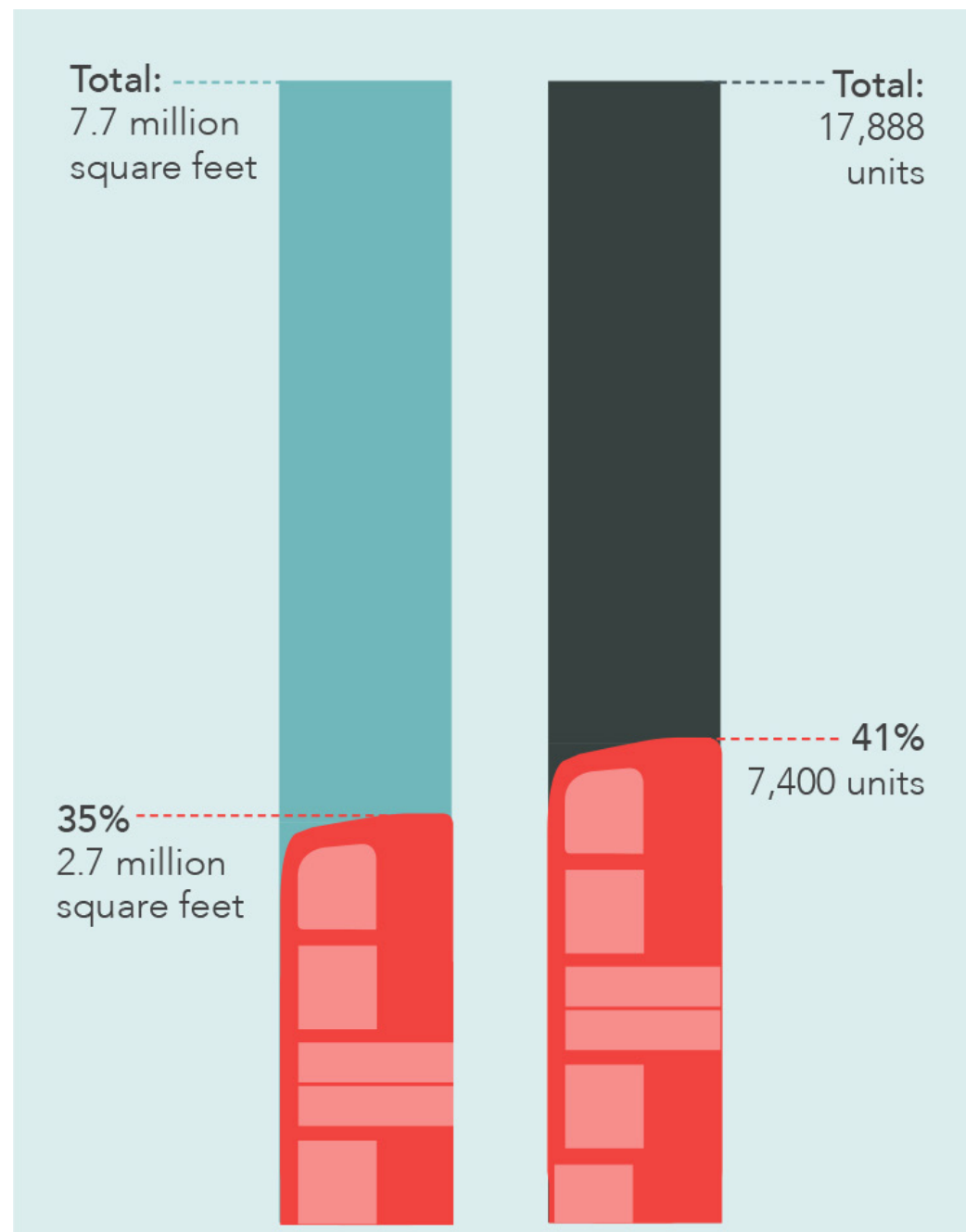
- Large initial impact – Catalytic effect of zoning changes + public investments
- Price effect decreases over time and appears to stabilize at 9% after 15 years
- Sustained impact due to permanence from streetcar and other investments

Counterfactual – Alternative Development Scenario

Based on Model Price Impact Findings



Calculated development scenario without streetcar



Before 2002 the City earned \$0 from on-street parking meter revenue from land north of Burnside: Since 2003, the City has earned \$81 million in on-street parking meter revenue from the same land.

Annual On-Street Parking Meter Revenue in the Pearl District: 1850 - Present Source: PBOT

