Research Into The Implications (Opportunity Cost) Of Minimum Parking Requirements For Both Housing Supply And Firm Productivity

A study focuses on minimum parking requirements and provides insight on how to reform land use and transportation.

WHAT IS THE NEED?

The debate about displacement and rail transit has become a first-order policy issue. In this project, the researchers will examine an overlooked question: “When households move away from rail transit neighborhoods, how does their job access change?”

Understanding how those households move away from rail transit neighborhoods for their jobs will importantly inform the concept of the social welfare implications; and the residential moving patterns relate to the overall effectiveness of the transportation system. The research team will measure how accessibility changes for households who move away from rail transit areas, to assess whether such moves result in a loss in transit access to potential employment opportunities.

Using an innovative dataset on households’ locations and incomes in Los Angeles County, the researchers will leverage a new tool to compute 30-and 60-minute transit travel sheds to jobs for both origin and destination neighborhoods. Furthermore, the research analysts will give specific attention to access changes across the income distribution, to understand the equity aspects of residential mobility. The research findings will be pivotal to current conversations about commuting, employment, housing, and transit investment in regions with large rail transit investments such as Los Angeles County.

The analysts will examine the opportunity costs of minimum parking requirements to both housing supply and firm productivity, using Silicon Valley as a case study.

WHAT ARE WE DOING?

The research team will conduct the following tasks:
Task 1: Review literature
It involves examining the relevant studies on parking requirements, agglomeration, and zoning stringency.

Task 2: Collect data
This task entails building the parking inventory and compiling the parking requirements for commercial and residential development in seven cities. Once these data are assembled, the researchers will assemble the housing data from the United States Census, and the wage data from the Bureau of Labor Statistics’ Zip Code Business Patterns dataset.

The research team will produce three deliverables:
1) Parking Inventory (map and/or data files),
2) A review of valley parking Requirements, and
3) A complete data set with tract-level housing, firm data, and firm productivity data.

Task 3: Develop counterfactual scenarios
This first portion of the analysis is descriptive and involves comparing the variance in parking requirements with the variance in wages and housing prices, which provides a foundation for the researchers to build counterfactual scenarios.

Task 4: Prepare Final report
Compile the results of Tasks 1-3 into a final report.

WHAT IS OUR GOAL?
The goal of this study is to specifically examines how minimum parking requirements:

1) Shape the locations and characteristics of new development,
2) Distort the location of firms and weaken agglomeration economies, and
3) Make driving less expensive.

The researchers will assess the political economy of parking regulatory reforms. The California policymakers should be interested in the research results to tackle the challenges of reforming land use law and moving toward more sustainable transportation options.

WHAT IS THE BENEFIT?
Caltrans is charged with, and has made significant investments in efforts to make California’s transportation system more efficient and more sustainable. If local parking regulations push firms and homes away and require more driving than would otherwise be the case, then the overall transportation system is less efficient and more environmentally burdensome. Understanding the source and scale of this problem will not only be useful to Caltrans, but also to other state agencies concerned with transportation reform. The hypothesis of this research implies that local regulations may cumulatively undermine Caltrans’ goals for the state of California.

WHAT IS THE PROGRESS TO DATE?
Project started in February 2019. Project Panel “kickoff” meeting occurred in March 2019.

IMAGES
Aerial views of the Cisco Systems properties in San Jose, which is some of the most valuable land. How might transportation and land use patterns in Silicon Valley be different if less land was devoted to parking?