Transit Stations Influence Residential Property Values

By improving accessibility, lessening congestion, and reducing household transportation costs, transit service adds value to residential locations. But what exactly is the relationship between property values and proximity to transit? For the Regional Transportation Authority, which is responsible for fiscal planning and oversight of public transportation in northeastern Illinois, Gruen Gruen + Associates (GG+A) conducted a study of the relationship between residential property values and distance to 96 Chicago-area Chicago Transit Authority (CTA) and Metra stations. GG+A used the econometric technique of hedonic modeling, supplemented by a literature review and interviews with realtors and other experts on local market conditions, to assess and quantify the value enhancement that residential properties derive from being located close to transit service.

The study confirmed that transportation is only one of many factors that influence property values. The perception of neighborhood desirability is a dominant influence on values and more important than the presence of a transit station per se. In all neighborhoods studied, however, property values were affected positively by the proximity of transit.

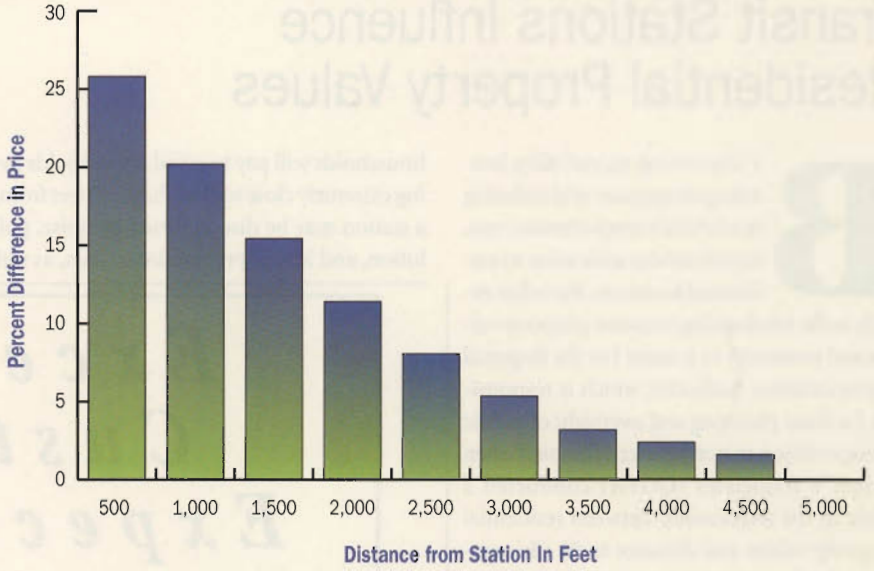
The presence of a nearby station can facilitate the enhancement of neighborhood desirability, especially for those homeowners and renters who place a premium on the value of time. Realtors in both the affluent suburban West Hinsdale station area and the gentrifying Logan Square area on the northwest side of the city of Chicago indicate that prices have been increasing and that a major change has occurred in the type of households moving into these areas. In each case, the locations increasingly appeal to younger, higher-income professionals, many of whom commute via CTA or Metra to downtown Chicago.

Impacts on Residences Extremely Close to Stations. Households adjacent to a station clearly can benefit from the accessibility that transit provides. Yet stations also can create negative environmental effects that some households will pay to avoid. Households living extremely close to (less than 300 feet from) a station may be discomforted by noise, pollution, and loss of privacy. Interviews, as well as a review of the relevant literature, suggest, however, that these potentially unpleasant effects—or disamenities—may be minimized by sensitive design and planning, including the use of noise-reduction materials and landscaping. Because stations can act as a value-reducing disamenity for their *immediate* residential neighbors, the proximity premium

estimated by GG+A's hedonic models does not begin simply at the stations but rather just outside the 300-foot "tight zone" around them.

Positive Impacts on the Value of Single-Family Houses. The study found that buyers of single-family houses located from 300 feet to about one mile from a station pay a premium of approximately 0.01 percent per linear foot for accessibility to stations. When all other factors are equal, prices decline as distance from a station increases. Holding all other value-influencing factors constant, values tend to increase about 1 percent every 100 feet closer to the station. Using the hedonic equation and mean value of each variable in the equation, for example, the price of a single-family house located 1,000 feet from a station is 20 percent higher than the same house located about a mile away.

FIGURE ESTIMATED EFFECT OF DISTANCE TO STATION ON HOUSING VALUE



The higher prices of homes located near CTA or Metra stations suggest that the enhanced accessibility and savings of future transportation costs from living near stations are capitalized into home prices. The estimated average premium for living within 500

feet to one-half mile from a CTA or Metra station can be as high as $36,000. With a discount rate of 8 percent and a term of 25 years, the estimated proximity premium translates into a capitalized annual cost of $3,400 to live in a neighborhood near transit service. Parking and annual automobile ownership costs are estimated at $6,100. Accordingly, the capitalized cost of living near a transit station plus the cost of commuting by train are less than the estimated annual parking and automobile ownership costs, which could be saved by using transit rather than driving.

Multifamily Land Uses Less Sensitive to Disamenity Effects. Close-in disamenity effects may apply more directly to single-family than to multifamily land uses. The construction and layout of apartment buildings typically better withstand the noise and intrusion on privacy that a station can create. Apartment dwellers are relatively more transient, and thus may be less troubled by these disamenities. Because renters are less sensitive than homeowners to factors influencing long-term values, property values for multifamily rental projects may be less adversely affected by station disamenity effects. Apartment dwellers also place a higher premium on transit access. Apartment projects located closer to train stations obtain higher rents and maintain higher occupancy rates than comparable apartments less conveniently located.

Policy Implications. By increasing residential property values, the presence of stations also encourages transit-oriented residential development around stations. Municipal policies that support transit-oriented development such as higher-density zoning around stations and redevelopment financing make sense. Higher-density, multifamily land uses adjacent to stations should be encouraged because such uses are less likely to be sensitive to station disamenity effects. High-density multifamily projects located near transit stations also can be expected to realize the full benefit offered by station proximity and enhance transit ridership.—**Aaron N. Gruen** and **Debra L. Jeans**

Aaron N. Gruen is the managing director and Debra L. Jeans is a senior economist of the Chicago office of San Francisco–headquartered Gruen Gruen + Associates.