

Leveraging Main Street as a Real Estate Amenity: Retail Corridor Revitalization and Residential Property Values

Andrew J. Van Leuven

The Ohio State University,

John Glenn College of Public Affairs

vanleuven.3@osu.edu

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Abstract

Downtown revitalization has become a nearly ubiquitous undertaking throughout the municipal landscape of the United States. In the hope of curtailing the effects of twentieth-century downtown disinvestment, suburbanization, and deindustrialization, local coalitions of public and private stakeholders have decided to reverse these trends and restore the vitality and character of their historic business districts. One such endeavor, the Main Street Program, equips smaller towns and cities with the resources and know-how to leverage their dense, walkable retail corridor(s) as an economic development asset. In this paper, I look at the relationship between active Main Street Programs in Ohio and the sale prices of nearby residential properties, specifically focusing on the property's distance to its respective downtown, or "Main Street" district. I find that home sale prices are higher for properties sold in a community that actively participates in the Main Street Program. Furthermore, I find that there is an additional premium in the sale price for properties that are located in close proximity to a downtown business district with an active Main Street Program.

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1. Introduction

The economic health of a given town or city depends on its ability to provide attractive spaces for an increasingly mobile workforce (Glaeser et al., 2001). Built and natural amenities, such as waterfronts or cultural landmarks, have become pivotal determinants of where households, and ultimately firms, locate (Carlino, 2005). In other words, places that meaningfully differentiate themselves as arenas for consumption can make themselves much more competitive as centers of production.

Surrounded by a landscape of ubiquitous suburban development—strip mall retail centers, big box stores, parking lots, and roads oriented toward motorists rather than pedestrians—many communities have turned to their historic town centers to provide a differentiated retail and entertainment space for residents and visitors. However, many such communities must confront the reality that their downtown business districts are outdated and uninviting, blighted by decades of disinvestment. In order to leverage downtown as an economic development asset and as a place of public expression (Rypkema, 2003), community members must work to restore its public spaces, nearby businesses, and reputation.

Downtown revitalization—the process of bringing blighted and underserved urban districts back into full use—often conjures an image of large, industrial or “rust belt” cities (McGahey and Vey, 2008). However, downtown revitalization has also become a common economic development approach in *non-metropolitan* areas (Faulk, 2006; Robertson, 1999), although much less is known about the extent to which such efforts are successful.

In this paper, I focus on the Main Street Program, which is one of the more common revitalization strategies found throughout smaller communities in the U.S. Its four “transformation strategies”—design, promotion, organization, and economic vitality—are each designed to help communities to revitalize their traditional and historic commercial districts. However, very little evidence has been found to determine whether the program has its intended ef-

fect. In order to evaluate the Main Street Program as an effective means of revitalization, I measure the influence of downtown¹ proximity on the sale price of nearby homes.

2. Background & Motivation

The Main Street Program (MSP) was launched in 1977 by the National Trust for Historic Preservation to assist communities in revitalizing their traditional and historic commercial districts. Its four “transformation strategies”—design, promotion, organization, and economic vitality—are each designed to help communities to revitalize or strengthen their commercial district’s economy (National Main Street Center, 2018) by capitalizing on the aesthetic and historical value of the buildings and civic spaces along the “Main” street² that comprises its central, pedestrian-oriented retail district. (Dono and Glisson, 2009). When a community has adopted the MSP, a full-time program director is hired to coordinate a mixture of public and private efforts to revive the look and feel of the downtown district (Seidman, 2004). These efforts may include holding large events such as festivals or farmers’ markets, guiding property owners through the process for securing historic preservation grants or tax credits, and providing technical assistance to business owners, helping them with marketing practices and acting as a facilitator within the larger local business networks (Loescher, 2009; Smith, 2009).

However, the actions and coordinated efforts undertaken by the MSP director and community volunteers are not a direct guarantee of successful revitalization. Of the four transformation strategies of the MSP (see Appendix A), design, promotion, and organization are each components that can be directly manipulated from within the partnership existing between community and its MSP. However, the remaining component of the program’s ap-

¹The geographic scope of this paper is limited to municipalities *outside* of larger metropolitan counties, many of which would not be colloquially described as *cities*, but rather as “small towns.” While the word “downtown” may only evoke the image of a large city’s central business district, I use the term throughout the paper to refer to a community’s historic business district, regardless of the size of that community.

²Many municipalities do not contain an actual thoroughfare called “Main Street.” In this paper I refer to any community’s primary retail corridor—such as Liberty Street in Wooster, OH or Washington Street in Tiffin, OH—as its *Main Street*.

proach, economic vitality, is something that fundamentally requires cooperation from outside actors—namely the private sector—to be successfully achieved.

In a study which surveyed communities to identify which of the four transformation strategies received the most attention, it was found that communities focused very little on economic vitality ([Robertson, 2004](#)). This is likely because design, promotion, and organization are all activities, while economic vitality is an *outcome*. Evaluating outcomes requires a research design that isolates the program’s contribution to the outcome, independent of other factors. This difficulty may explain why a majority of previous research on the MSP has focused on its much more measurable components. Additionally, of the studies which *have* attempted to measure the MSP’s impact on economic vitality, many have typically relied on data that come from the Main Street communities themselves and “thus are not able to be independently verified” ([Bradbury, 2011](#)).

3. Property Values and the Main Street Program

In this paper, I analyze how participation in the Main Street Program may contribute to a particular component of a community’s economic vitality: residential property values. I focus on property values in MSP-participating communities as an indicator of economic vitality for three reasons, described in the paragraphs below.

3.1 Main Street as a Differentiated Consumption Environment

A vibrant Main Street offers a differentiated shopping and entertainment experience for local residents and visitors. By organizing events and ensuring that the area is safe and clean, the MSP director and his or her volunteers can transform Main Street into a *destination* for families, tourists, and shoppers. As highlighted in the introduction to this paper, places that facilitate higher levels of interaction and consumption are more likely to thrive in the long term. The downtown business district is typically a city’s most dense location, in terms of both firms and individuals, and is an ideal location for consumer amenities ([Glaeser and](#)

Gottlieb, 2006). Housing prices often reflect the value of living withing close proximity of consumer amenities, especially in what Ahlfeldt and Maennig (2010) call “historic heritage sites.”

However, the settlement patterns of smaller, nonmetropolitan municipalities (a description true for most participants of the MSP) do not always mirror their larger urban counterparts: the town center remains a dense locale for buildings and businesses, but is usually not a highly-occupied residential area³ Howie et al. (2010). Nevertheless, this difference does not necessarily mean that small downtowns do not generate consumer amenities for nearby residents. Filion et al. (2004) note that—while a only a handful of smaller downtowns are “lucky” enough to draw success from assets such as a nearby university or steady state and county government employments—revitalization efforts can substantially improve a small community’s likelihood of leveraging its historic downtown district as an amenity for its residents.

In this paper, I look at the influence of downtown revitalization as a ‘place-making’ effort (Markusen and Gadwa, 2010; Glaeser and Gottlieb, 2008) on local economic vitality, operationalized in terms of home sale prices. If the Main Street Program succeeds in producing its intended effect, then downtown will become a stronger destination for shopping and entertainment: a vibrant place where visitors can spend their money and a “third place” (Oldenburg and Brissett, 1982) where residents can spend their *time* outside of their homes and workplaces. The success of this effort should thus be captured in the sale prices of nearby residential properties, with a premium being placed on a homeowner’s access to Main Street as a consumer amenity.

³While the outlying areas of a smaller, nonmetropolitan municipality are typically not referred to as “suburbs,” they still mirror the pattern of “sprawl” development (see Brueckner, 2000; Galster et al., 2001) in metropolitan suburbs. The process of “suburbanization”—the relocation of residential and commercial activity (in lock-step with consumer preferences) from the traditional downtown area toward the periphery—is what largely caused residential properties in downtown to be vacated in the latter half of the twentieth century Abbott (1993).

3.2 Main Street as a Historic Preservation Landmark

A pivotal component of the Main Street Program is its emphasis on historic preservation and design (Wells, 2016). As compared to the literature concerning Main Street as a consumption amenity, the link between property values and historic preservation has been much more extensively studied (see Ryberg-Webster and Kinahan, 2014). In a hedonic price analysis of several cities in Texas, Leichenko et al. (2001) found that historic designation was highly associated with higher home values. This finding has been confirmed or replicated in several studies (Noonan, 2007; Clark and Herrin, 1997; Ford, 1989), with a few key exceptions (Asabere et al., 1994; Been et al., 2016).

However, there are some deeper insights to be gleaned from studies about historic preservation, beyond the mere effect it has on property values. Coulson and Lahr (2005) looked at several historic neighborhoods in Memphis, some having official historical landmark designation, and others not. Overall, they found that homes in officially designated historic neighborhoods sold for higher than their non-designated equivalents, though the effect may be partially explained by the strict maintenance standards imposed by the designation agency. When studying the difference between national and local preservation agencies, Schaeffer and Millerick (1991) observed that designation at the national level had a positive impact. However, designation at the local level (in this case Chicago Historic Districts) had a negative impact, which the authors suggest may be due to the higher regulatory burden imposed by the local preservation agency. Finally, Listokin et al. (1998) point out that historic preservation, while an important contributor to housing and economic development, is only an effective tool in limited quantities. The ability of a historic district to improve neighborhood quality or to elevate property values is diluted when too much of the built environment is being preserved. Paradoxically, this means that some neighborhoods or properties should *not* be preserved; new development must occur if a local market is to remain healthy and dynamic.

In my analysis I do not utilize any specific variables to control for a property's historic designation or lack thereof. However, the relationship between historic preservation and property values (as found in the above-cited studies) does serve as a potential mechanism to explain why the Main Street Program may influence property values. The program prioritizes transforming *existing* assets rather than building and attracting new development (although the latter is an anticipated follow-on outcome of the program). The sale price of nearby houses should reflect the value of historic buildings and landmarks revitalized throughout the town center.

3.3 Main Street as a ‘Walkable’ Alternative to Automobile-Oriented Living

Retail establishments and public spaces along Main Street offer a pedestrian-oriented, or “walkable” built environment for those who live nearby. Similar to its potential role as a differentiated retail and entertainment destination, walkability likewise involves pushing back against the status-quo of car-oriented development associated with suburban sprawl, what [Wassmer and Baass \(2006\)](#) refer to as the decentralization of an urban area’s spatial form. However, walkability in this context entails more than simply leveraging Main Street as a pedestrian-oriented shopping corridor. Instead, the walkability premium for properties close to Main Street involves the potential for homeowners to complete routine tasks—such as grocery shopping—without needing to use a personal vehicle or public transit.

As defined by [Pivo and Fisher \(2011\)](#), walkability is the degree to which “an area within walking distance of a property encourages walking for recreational or functional purposes.” [Song and Knaap \(2004\)](#) measured walkability in terms of residential proximity to both public parks and “neighborhood commercial land uses” in Portland, finding a positive relationship between house prices and walkability in predominately mixed-use neighborhoods. However, in majority single-family residential neighborhoods, no such walkability premium existed. A similar study by [Rauterkus and Miller \(2011\)](#) replicated this finding in Birmingham, adding that properties in car-dependent (i.e., low walkability) locations had higher values

as distance from downtown increased. [Li et al. \(2015\)](#) also found that improvements that increase walkability do not increase property values in car-dependent neighborhoods, but that they do positively influence values in already-walkable neighborhoods.

These studies suggest that Main Street's provision of a walkable residential environment is not an *absolute* benefit, but rather that it is contextual on the historical roots of the neighborhood's built environment. In other words, car-dependent suburban-style neighborhoods built post-1950 are unlikely to put a premium on walkable, mixed-use development. However, older parts of town—previously served by pedestrian-scale stores and restaurants prior to the advent of the car—may be very receptive to walkable development such as a newly-revitalized Main Street corridor.

Demand for walkability is also dependent on consumer preferences. Although a preference for decentralized, car-oriented development is the overwhelming norm in the United States ([Kolko, 2020](#)), there is still a strong demand for walkable neighborhoods among various segments of the population. A survey conducted by [Myers and Gearin \(2001\)](#) found that older home buyers prefer denser, more walkable housing options. This finding is especially salient, as members of the “baby boomer” generation are increasingly living without children in the home and need to downsize. Even when focusing only on suburban dwellers, there are still those who prefer the aesthetic and functional characteristics of walkable neighborhoods ([Tu and Eppli, 2001](#)).⁴

[Leinberger and Alfonzo \(2012\)](#) observe that walkable neighborhoods, while not a majority preference, are nonetheless *under-supplied* relative to demand. They suggest that the real estate industry has yet to embrace high-density, mixed-use, walkable development because of their higher risk and capital cost relative to the straightforward, lower risk process of developing a typical suburban subdivisions. Main Street revitalization provides an opportunity

⁴Walkable forms of suburban development are referred to by urban planners and landscape architects as “new urbanist” neighborhoods after the development style pioneered by [Duany et al. \(1991\)](#).

to increase property values of properties close to and within⁵ downtown without having to wait for residential developers to deem it cost-effective.

4. Data

To estimate the impact of the MSP on property values, I combine multiple data sources to create a pooled cross-section of yearly home sales that took place in non-metropolitan communities in Ohio from 2000 to 2019. Data regarding the property transaction date and price, geographic location, and structural characteristics come from [First American DataTree \(2020\)](#). Among the structural characteristics in the dataset are variables such as lot size, number of rooms, and the age of the structure. [Table 1](#) includes summary statistics for the variables used in the analysis.

To control for neighborhood characteristics, I use several variables from the US Census at the block group level. Because data at the block group level are only reliably available from the decennial census, each property was assigned neighborhood variables according to the decade in which the transaction took place.⁶

The final source of data was the year when each community joined the Main Street Program, taken either available from the state program's web page or received via email correspondence with the state MSP director. This variable was used to create a dummy variable indicating whether the municipality had adopted the MSP at the time of the sale (as well as a series of additional dummies to indicate whether the MSP had been adopted as of 1, 2, 3, and 5 years prior to the sale).

⁵A study prepared for the Iowa Economic Development Authority ([Lipsman et al., 2014](#)) found that upper-story housing in buildings located along commercial corridors are less than 25% occupied and represent a relatively cost-effective opportunity for future downtown housing development.

⁶While demographic variables were asked in both the 2000 and 2010 Census questionnaires, variables concerning education and employment/income were only available in the 2000 Census, relegated to the American Community Survey (ACS) rather than the 2010 Census. Use of the ACS for block-group education and employment data is not ideal but is the best available source of neighborhood-level characteristics in 2010.

Table 1: Summary Statistics

Statistic	Mean	St. Dev.	Min	Max
MSP Adopted?	0.2	0.4	0	1
Downtown Distance	11.9	8.4	0.1	65.5
Proptery Located Downtown?	0.1	0.2	0	1
Square Footage	1,618.8	647.6	75	14,457
Lot Size (Acres)	0.5	0.9	0.001	10
Home Age	51.7	36.1	0	219
Bedrooms	3	0.7	1	20
Bathrooms	1.8	0.7	0.5	11.5
Total Rooms	5.9	2.2	0	53
Number of Stories	1.4	0.5	1	16
Has Deck	0.3	0.4	0	1
Has Garage	0.9	0.4	0	1
Has Pool	0.03	0.2	0	1
Has Basement	0.6	0.5	0	1
Sale Price (Real USD)	146,579.8	119,371.3	1,108	4,999,092
Neighborhood Median Age	39.3	6.3	19.6	76.5
Neighborhood Pct. Non-White	0.9	0.1	0.2	1
Neighborhood Pct. w/Bachelors+	0.2	0.1	0	0.9
Neighborhood Unemployment Rate	0.1	0.1	0	0.8

4.1 The Analytical Universe

Not all municipalities are comparable. Some municipalities were incorporated in the nineteenth century and contain a historic downtown, their streets lined with dense storefronts and historic architecture. Others were incorporated only in the last fifty years, home to only farmland or undeveloped forest prior to the automobile era. Thus, it is not appropriate to compare property transactions in older municipalities with those in new, more car-dependent townships. I used the following set of rules to build an analytical universe, containing only municipalities that are suitable to be compared to one another in a hedonic price analysis.

The analytical universe consists only of Ohio municipalities that:

- *Were located in a non-metropolitan county or were more than 15 miles away from a MSA's principal city.* The Main Street Program is primarily adopted by communities that already fit this description. However, the MSP has been adopted by some neighborhoods (such as "Historic King Drive" in Milwaukee or "Nob Hill" in Albuquerque) in larger urban areas. This rule prevents municipalities within commuting distance of a large urban agglomeration from being compared with those in rural areas and the urban periphery.
- *Had a 2010 population of between 750 and 75,000.* This ensures that comparisons are limited to the center of the population distribution, restricting very large cities and very small towns. Due to the above non-metropolitan rule, there are already very few municipalities in the universe larger than 35,000 residents. However, Ohio has several hundred municipalities of fewer than 750 residents, which are too small to make appropriate comparisons with property transactions in larger towns and cities.
- *Had a 1920, 1930, or 1940 population of at least 1,000.* This roughly establishes whether a community had established a downtown business district prior to the automobile era. Some present-day suburban municipalities are very old in terms of the year

they were incorporated but were largely undeveloped prior to the post-WWII housing boom.

These rules reduce the list of the over 1,200 Ohio municipalities down to a total of only 213. Transactions from the First American assessor records database were only kept if the corresponding property was located within two miles of the municipal boundaries of one of the 213 communities in the analytical universe.

4.2 Geographically Generated Variables

To my knowledge, no existing repository of data exists to delineate where a community's historical business district begins and ends. For towns that serve as a county seat, the business district is typically located near the county courthouse. However, not all the communities in the analytical universe are one of Ohio's 88 county seats. Thus, it was necessary to manually code for the geographic extent of all 213 downtown districts. This was done by carefully using aerial imagery to identify the rough cutoff at which the dense concentration of downtown buildings and sidewalks gives way to less-dense residential neighborhoods.⁷ While not perfect, these hand-coded downtown districts provide an adequate approximation of where a community's historic town center is located.

I used geographic information systems (GIS) methods to generate two additional variables. First, I calculated the distance between each property and the 'centroid' (i.e., the geometric center point) of the downtown district. This indicates each property's relative proximity to the the locus of downtown retail and entertainment activity. Second, I computed a geographic dummy variable to indicate whether a property was inside the downtown district. This allowed me to test whether there was a premium associated with both 1) being located close to downtown and 2) being located *inside*⁸ the downtown district. These two variables

⁷See [Appendix B](#) for a graphic example of a geocoded downtown district.

⁸It is possible that being located inside downtown is actually a *disamenity* due to the nature of downtown streets, which entail high traffic, pollution (both noise pollution and automobile exhaust), and a lack of convenient parking.

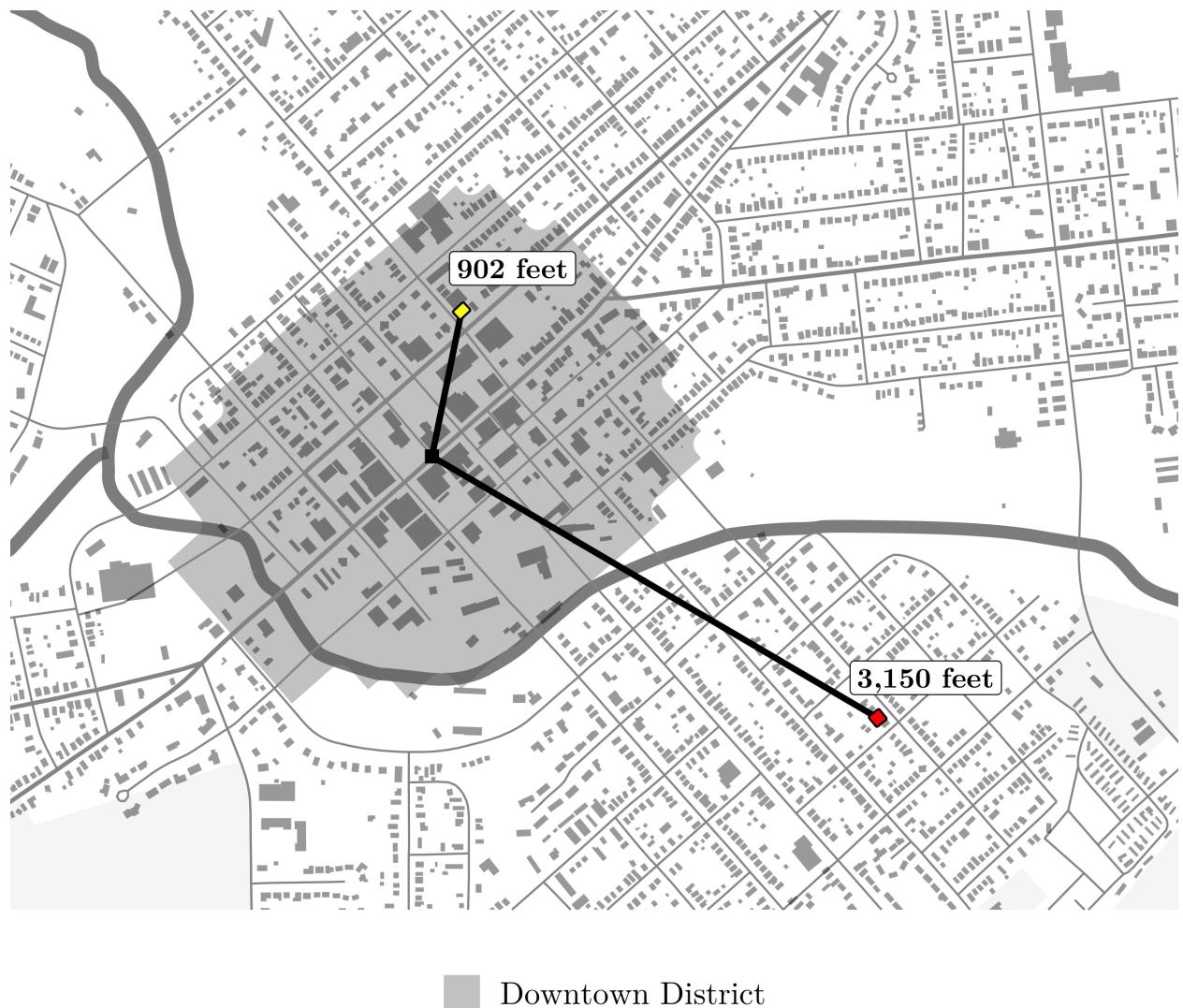


Figure 1: Illustration of Distance Variable, Inside and Outside Downtown District

are illustrated in [Figure 1](#), which shows the distance between two different houses and the centroid of the downtown district in Washington Court House, OH. The yellow house is both closer to downtown and is located *inside* the downtown district; the red house is located outside of downtown and is further away.

5. Empirical Strategy

To estimate the influence of the MSP on nearby property values, I employ a hedonic price model which—aside from controlling for relevant property and neighborhood characteristics—will allow me to identify the association between a given house’s distance from Main Street and its market price ([Rosen, 1974](#)).

I use the following equation:

$$Y_{itj} = f(\alpha X_{itj} + \alpha N_{itj} + \beta D_{ij} + \gamma MSP_{itj} + \delta D * MSP_{itj} + \epsilon_{itj})$$

where Y is the sale price for home i in year t and community j , X is a vector of property characteristics, N is a vector of neighborhood characteristics, D is the distance⁹ from the property to the center of the downtown district, and MSP is a dummy which indicates whether a house was located in a community that was a participating member of the MSP in year t . My parameter of interest, δ , is an interaction between distance and MSP status, and estimate the relationship between a home’s sale price and its proximity to a downtown with an actively-participating Main Street Program.

[Redfearn \(2009\)](#) raises an issue with hedonic price models used to measure the extent to which local amenities are capitalized into property prices. He describes how unstable such a model can be, as it may be highly sensitive to both sample construction and specification choices. My analysis aims to overcome this weakness by focusing on transactions from over

⁹In this paper, distance is only specified in linear terms. However, future versions of the analysis will control for additional functional forms—such as a quadratic or logarithmic relationship—as suggested by [Milon et al. \(1984\)](#).

200 municipalities (compared to the single city of Los Angeles offered as an example by Redfearn) and by using all possible property transactions in the assessor dataset rather than only a sample.

6. Results

The main results for my analysis are displayed in [Table 2](#). Each successive model (differentiated by column) adds a new vector of data, concluding with Model 5, which contained the full hedonic price model:

- Model 1 only includes the two distance variables (note that distance is modeled as a natural logarithm).
- Model 2 added the vector of structural characteristics
- Model 3 added the vector of neighborhood characteristics
- Model 4 added the variable indicating whether a Main Street Program had been adopted two years¹⁰ prior to the transaction date.
- Finally, Model 5 added an interaction term between distance to downtown and MSP participation status.

Model 4 indicates that homes sold in a community with an active MSP received a slight bump in their sale price. Additionally, the positive coefficient of the downtown distance variable indicates that being located *further away* from downtown was associated with an additional increase in the sale price. However, Model 5 tells a more complete story by interacting the two variables—downtown distance and MSP participation status—with one another. While the distance variable remains constant, the MSP coefficient more than quintuples.

¹⁰A 2-year lag is an appropriate operationalization of this variable, as home buyers are unlikely to factor MSP adoption into their decision until the program has had time to register in the social and cultural consciousness of the community.

More importantly, the interaction between the two is negative, indicating that being located *closer* to downtown was associated with a higher sale price.

On the surface, this finding seems to confirm the hypothesis underlying the entire study, namely that the Main Street Program increases the value of downtown as a consumer amenity, thereby increasing the capitalized value of properties closer to downtown. To ensure that this is a robust finding, I tested a variety of alternate specifications, described in the paragraphs below.

First, I adjusted the MSP status variable to determine the importance of how long the program had been in place during the time of the property transaction. [Table 3](#) shows four additional specifications, each with a different operationalization of the MSP status variable. In Model 1, the variable is coded as a binary indicating whether the MSP had been adopted as of January 1 in the calendar year when the transaction took place. In Models 2, 3, 4 and 5 the respective MSP variables are coded as binaries indicating whether the MSP had been adopted at least one, two, three, or five years prior to the the transaction date. The results table shows a longer-established MSP at the time of sale is associated with a higher premium for both distance to downtown and MSP membership itself.

Second, I restricted the observations in the analysis according to the property's proximity to its corresponding town center. In line with the empirical findings cited in [Section 3.3](#), a more walkable residential environment is likely to be more appealing only to a particular segment of home buyers. By restricting the spatial extent of the properties in the analysis (see [Figure 2](#)) the hedonic model is less likely to compare transaction decisions between home buyers with different tastes for automobile- and pedestrian-oriented environments. [Table 4](#) contains two alternate model specifications, restricting the data to only those properties within 1 mile or 1.5 miles from the downtown district. The results indicate that a smaller, more downtown-proximate sample of transactions only serves to strengthen the previously-estimated coefficients for downtown distance and MSP status.

Table 2: Coefficient estimates for various specifications of hedonic price model

	Dependent variable:				
	Natural Log of Property Sale Price (real USD)				
	(1)	(2)	(3)	(4)	(5)
Downtown Distance (log)	0.31*** (0.002)	0.08*** (0.002)	0.06*** (0.002)	0.06*** (0.002)	0.06*** (0.002)
Property Located Downtown?	0.18*** (0.01)	0.05*** (0.01)	0.02*** (0.01)	0.01** (0.01)	0.02*** (0.01)
Lot Size (log)		0.05*** (0.002)	0.03*** (0.002)	0.03*** (0.002)	0.03*** (0.002)
Square Footage (log)		0.75*** (0.005)	0.60*** (0.005)	0.59*** (0.005)	0.59*** (0.005)
Home Age		-0.01*** (0.0000)	-0.005*** (0.0000)	-0.005*** (0.0000)	-0.005*** (0.0000)
Total Rooms		-0.002*** (0.001)	0.002*** (0.001)	0.003*** (0.001)	0.002*** (0.001)
Stories		0.01* (0.003)	-0.02*** (0.003)	-0.03*** (0.003)	-0.03*** (0.003)
Neighborhood Median Age			-0.002*** (0.0002)	-0.002*** (0.0002)	-0.002*** (0.0002)
Neighborhood Pct. Non-White			1.49*** (0.02)	1.49*** (0.02)	1.50*** (0.02)
Neighborhood Pct. w/Bachelors+			1.18*** (0.01)	1.12*** (0.01)	1.13*** (0.01)
Neighborhood Unemployment Rate			-1.11*** (0.02)	-1.11*** (0.02)	-1.12*** (0.02)
MSP Adopted?				0.04*** (0.004)	0.21*** (0.01)
Distance*MSP interaction					-0.07*** (0.01)
Additional Structure Characteristics?	No	No	No	Yes	Yes
Observations	222,902	222,902	222,902	222,902	222,902
R ²	0.08	0.32	0.40	0.40	0.40

Note:

*p<0.1; **p<0.05; ***p<0.01

Table 3: Estimated coefficients for Distance & MSP variables, by time of adoption

	Dependent variable: Natural Log of Property Sale Price (real USD)				
	MSP Program Adopted ___ Years Before Sale				
	Time of Sale	1-Year	2-Years	3-Years	5 Years
	(1)	(2)	(3)	(4)	(5)
Downtown Distance (log)	0.07*** (0.002)	0.07*** (0.002)	0.07*** (0.002)	0.07*** (0.002)	0.06*** (0.002)
Property Located Downtown?	0.02*** (0.01)	0.02*** (0.01)	0.02*** (0.01)	0.02*** (0.01)	0.02*** (0.01)
Active MSP Program?	0.21*** (0.01)	0.22*** (0.01)	0.22*** (0.01)	0.23*** (0.01)	0.26*** (0.02)
Distance*MSP Interaction	-0.07*** (0.01)	-0.08*** (0.01)	-0.08*** (0.01)	-0.08*** (0.01)	-0.09*** (0.01)
Structure Characteristics?	Yes	Yes	Yes	Yes	Yes
Neighborhood Characteristics?	Yes	Yes	Yes	Yes	Yes
Observations	222,902	222,902	222,902	222,902	222,902
R ²	0.40	0.40	0.40	0.40	0.40

Note:

*p<0.1; **p<0.05; ***p<0.01

Table 4: Estimated coefficients for Distance & MSP variables, by downtown proximity

	Dependent variable: Natural Log of Property Sale Price (real USD)		
	Properties within ____ Radius from Downtown		
	Entire Municipality	Within 1.5 Miles	Within a Mile
	(1)	(2)	(3)
Downtown Distance (log)	0.07*** (0.002)	0.06*** (0.004)	0.05*** (0.01)
Property Located Downtown?	0.02*** (0.01)	0.02*** (0.01)	0.01* (0.01)
Active MSP Program?	0.23*** (0.01)	0.26*** (0.02)	0.29*** (0.03)
Distance*MSP Interaction	-0.08*** (0.01)	-0.10*** (0.01)	-0.12*** (0.02)
Structure Characteristics?	Yes	Yes	Yes
Neighborhood Characteristics?	Yes	Yes	Yes
Observations	222,902	132,241	90,169
R ²	0.40	0.36	0.32

Note:

*p<0.1; **p<0.05; ***p<0.01

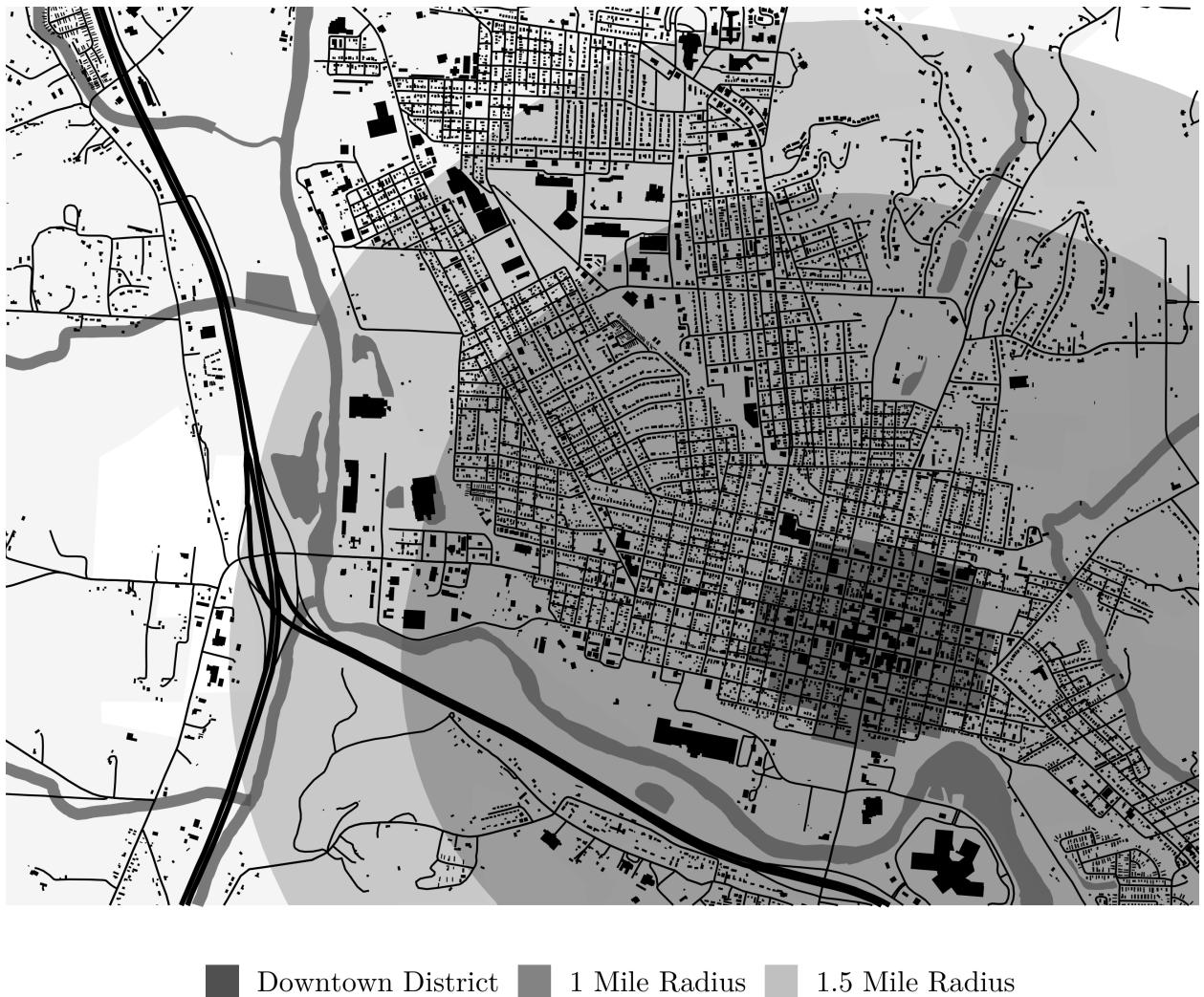


Figure 2: Example of Distance Buffers Surrounding Downtown District

7. Discussion & Conclusion

The analysis in this paper strongly indicates that Ohio home buyers placed a premium on houses located in close proximity to a participating Main Street Program. On average, the price of a home sold in a municipality where the MSP had been adopted at least 2 years prior was about 4 percent higher. Furthermore, in communities with an active MSP a one percent decrease in the property's proximity to downtown (i.e., one percent *closer* to downtown) was associated with a 7 percent higher sale price.

These findings are not predictive of the *causal* link between MSP adoption and property values, and may not be generalizable outside of the context of nonmetropolitan municipalities in Ohio. Nevertheless, they provide promising evidence that the Main Street Program is an effective means of generating economic vitality of in the community.

An important caveat with to mention is that the MSP is a small-scale revitalization program. Its intention is to improve the economic vitality of a localized retail corridor rather than the entire local economy. Thus, the findings of this study do not suggest that MSP adoption brings about an absolute boost to the entire regional market, but rather, that the MSP can help a community to reposition the value of its local housing market relative to other similarly-sized communities within the larger regional market.¹¹

7.1 Future Directions

This study provides an encouraging start toward a comprehensive empirical evaluation of the Main Street Program's impact on local economic vitality. There two main directions by which this study can be extended.

¹¹Because commute distances are typically much longer in less dense environments (Aldrich et al., 1997), a nonmetropolitan (or rural) housing market may include several municipal town centers. This is different from metropolitan areas, where the regional economy is a thorough integration of housing and labor markets, tied together by the spatial extent of the commute shed.

First, this study—which operationalizes economic vitality in terms of property values—can be improved upon by employing causal inference techniques. This study used a pooled cross-section dataset to measure the relationship between property characteristics and transaction prices. A causal model would restrict the data to those properties that sold more than once (i.e., a repeat-sales regression), with the first sale taking place before MSP adoption and the second sale taking place after. The analysis would be able to identify the causal effect of adopting the MSP on a community’s local housing sub-market.

Second, future studies can use an analytical framework similar to the one used in this paper but may use alternative operationalizations for the construct of economic vitality. These include employment (the number of jobs), property or sales tax totals, median income, productivity, commercial property values, and even population growth (via in-migration). Measuring economic vitality in a variety of ways would allow for a more holistic triangulation of the Main Street Program’s overall economic impact.

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Appendix A: Main Street Transformation Strategies

Table 5: MSP Transformation Strategies, as described by the National Main Street Center

Strategy	Description
Economic Vitality	Focuses on capital, incentives, and other economic and financial tools to assist new and existing businesses, catalyze property development, and create a supportive environment for entrepreneurs and innovators that drive local economies
Design	Supports a community's transformation by enhancing the physical and visual assets that set the commercial district apart.
Promotion	Positions the downtown or commercial district as the center of the community and hub of economic activity, while creating a positive image that showcases a community's unique characteristics.
Organization	Involves creating a strong foundation for a sustainable revitalization effort, including cultivating partnerships, community involvement, and resources for the district.



Figure 3: Graphic from NMSC Website: Main Street Transformation Strategies

Appendix B: Downtown District Geocoding Process

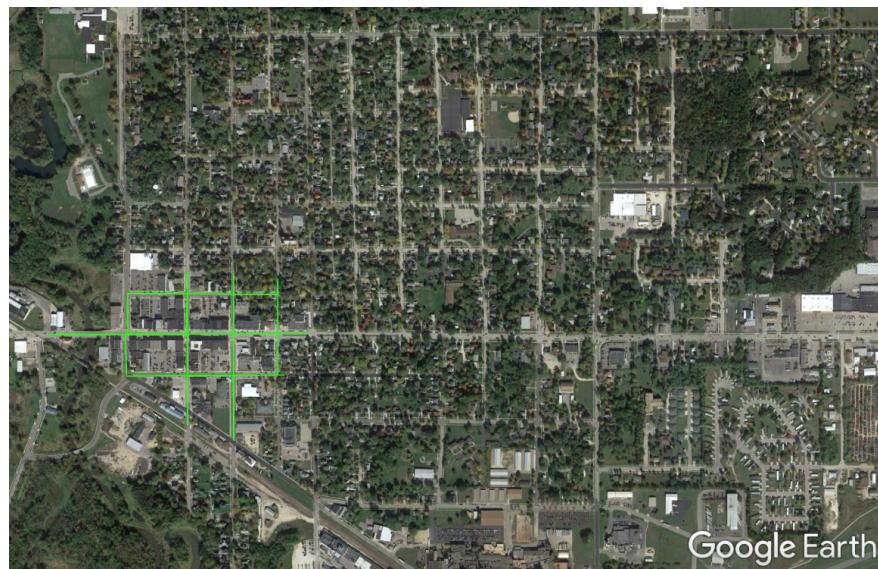


Figure 4: Example of a geo-coded linestring (in green) corresponding with the downtown district of East Liverpool, OH