

LOCATION PREFERENCES OF MULTIFAMILY HOUSING RESIDENTS

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Abstract

Choosing the location of one's home is an important decision not only for homeowners but for renters as well. The purpose of this study was to identify demographic and lifestyle influences on location preferences of multifamily housing residents. Two research hypotheses were tested using a modified model of influences on housing choice: (a) there are relationships between demographic and lifestyle characteristics and preferences for an ideal apartment home location, and (b) there are relationships between the location preference and specific apartment home and community feature preferences. Mail surveys were conducted with residents of high-end multifamily housing communities in Charlotte, North Carolina, and data from 202 usable responses were analyzed. As a result, both research hypotheses were supported. Major findings were as follows: (a) some individual demographic and lifestyle characteristics or combinations of these were found to have influences on location preferences; (b) when lifestyle characteristics were combined with demographic characteristics, location preferences were best explained; and (c) location preference had significant relationships with preferences for some specific parking, security, and exercise features, and the relationships were consistent with common expectations of the locations. Apartment developers, owners, and managers have identified lifestyle factors as important to attracting residents. This research provided empirical validity to that practice.

Introduction

As reflected in a famous phrase, "Location, location, location," choosing where to live is one of the most important housing decisions a household needs to make. Morris and Winter (1975, 1978) identified neighborhood/location as one of the six American housing norms. Further, they (1975) stated that a home's location

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and the surrounding environment influence the household members' achievement of their life goals including their social and economic security. Glink (1996) also noted that a home's location could affect a household "both financially and emotionally" (p.122).

Location choice is important not only to homeowners but also to renters. Duobinis (2002) indicated that cost and location are the major reasons that multifamily housing renters have chosen their current apartment homes. Kelley (2004) also stated that it is important to understand current and prospective renters' location choices in order to develop successful marketing strategies. Kelley explained that the most common consideration when a household makes a location choice is to pursue a "quality of lifestyle" (p.183).

The term "home location" includes diverse aspects. These could be urbanity; distance to workplace, school, or shopping; physical conditions of the environment including density, pollution, and neighborhood conditions; the quality and accessibility to community facilities and services; financial values of the neighborhood; as well as social aspects, such as socioeconomic or ethnic characteristics of the neighbors (Kelley, 2003; Morris & Winter, 1975; Myers & Gearin, 2001). Usually, urban or downtown locations are associated with proximity to public amenities including transportation, work, and shopping that reduce the need for automobiles, while suburban or rural locations provide lower density, spaciousness, and more exposure to the natural environment (Myers & Gearin, 2001).

Attainment of a person's housing preferences is related to his/her perception of quality of life (Dillman, Tremblay, & Dillman, 1979). Morris and Winter (1975, 1978) theorized that a family is continuously evaluating and changing its housing situation to improve housing satisfaction. In the case of homeowners, this change includes replacing old components and altering the house, such as remodeling. However, most rental housing residents are not allowed to significantly alter their dwelling. They may move into another multifamily unit within the same market if they are looking for a better housing environment (Kelley, 2004), and this may increase turnover. As indicated by multifamily housing marketers (McKenna-Harmon & Harmon, 1993), it is not always easy to predict and prepare for prospective residents because of the more frequent turnover among multifamily housing renters. However, by understanding characteristics of residents in the current multifamily housing market, it will be easier to determine the characteristics of future residents, and thus attract them and keep them for longer periods of time.

Location Preferences

In previous research studies, the location of one's current house has been used as a housing characteristic variable to explain behaviors or decision making (e.g., Cook, Yearn, & Martin, 2005; James, 2006; Weiss, 2000). Some studies explored location choice from a socioeconomic or ethnic segregation perspective (e.g., Clark, 1992).

Research studies have also attempted to determine residents' preferences for central city locations. Myers and Gearin (2001) investigated preferences for denser residential environments using survey data that were collected in 1999 by the National Association of Home Builders (NAHB) and found that households older than 45 years of age preferred denser development in more central locations. Bayho, Irwin, and Haab (2006) examined the influence of local public goods and services in central city locations on homeowners' preference to buy a home in these locations by surveying households in an Ohio county. They concluded that school quality is the most influential factor in choosing a new home location.

Duobinis (2002) provided an overview of housing preferences and choices among current multifamily housing renters. As mentioned earlier, Duobinis indicated that cost and location were the major reasons for renters to choose a multifamily home location, and nice surroundings and convenience were the most important features. Duobinis also stated that 54% of the multifamily housing renters preferred a suburban location.

Walker and Li (2007) adopted a lifestyle concept to explore its impact on location decisions of 611 individuals in Portland, Oregon. They found that lifestyle played a key role in residential location. However, they reported that the lifestyle groups showed an interesting mix of preferences for both suburban and urban neighborhood features. For example, one lifestyle group showed preferences for large homes and automobile-dependency, which could be linked to a suburban neighborhood, and for high-end local shopping, which could be linked to a mixed-use urban neighborhood.

Lee, Goss, and Beamish (2007) identified four underlying dimensions of multifamily housing residents' lifestyle using cluster analysis techniques and examined the relationship between the lifestyle clusters and residents' housing preferences, including location preference for an ideal apartment home. Lee et al. found that households in a lifestyle cluster that placed greater value on social connection and prestige preferred their ideal apartment home to be in a downtown location, while households in a lifestyle cluster that placed greater values on larger residential spaces and mental and physical well-being preferred a non-downtown or suburban location. While this study presented good information on the lifestyle clusters, it did not present specific information about the direct influence of demographics or lifestyle factors on location and their relation to feature preferences.

Research Purpose and Hypotheses

This study focuses on multifamily housing residents' location preferences and their relation to feature preferences to suggest practical implications for future apartment developments and marketing strategies. The purpose of this study is to identify specific demographic and lifestyle influences on location preferences of multifamily housing residents. There are two research hypotheses: (a) there are relationships between demographic and lifestyle characteristics and preferences for an ideal apartment home location, and (b) there are relationships between the location preference and specific apartment home and community feature preferences.

Theoretical Framework

The model of influences on housing choice (Beamish, Goss, & Emmel, 2001) is the theoretical framework of this study. In a previous study by the researchers (Lee et al., 2007), a modified model of influences on housing choice was tested. In the modified model, influences of demographic characteristics on lifestyles, and influence of lifestyles on apartment home and community features including location were examined. However, characteristics of lifestyle clusters that were produced from lifestyle factors were used as lifestyle variables and direct influences of lifestyle factors were not examined. Also, the direct influence of demographic characteristics on location preference was not tested. In the current study, a simplified model of influences of housing choices was examined (Figure 1) focusing on more direct influences of demographic and lifestyle characteristics on location preference. This simplified model reflects the two research hypotheses of the study.

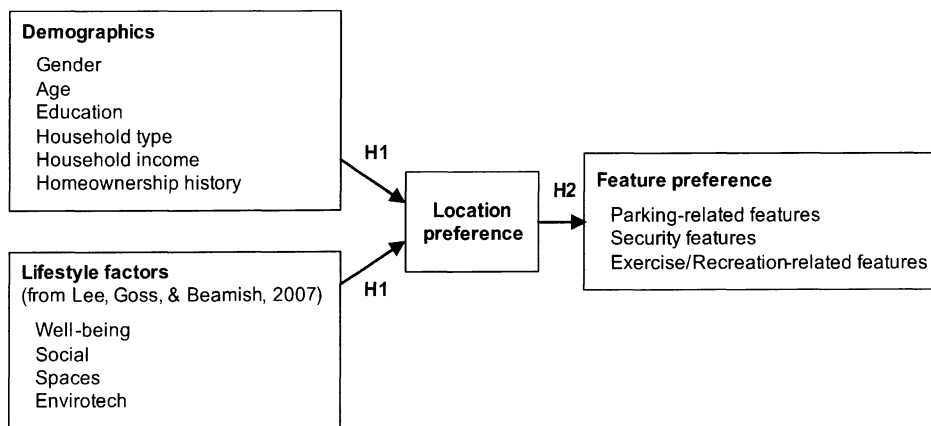


Figure 1. Modified Model of Influences on Housing Choice for the Study

In this study's model, gender, age, education, household type, household income, and homeownership history were included as demographic variables, and four lifestyle factors that were created by Lee et al. (2007) were adopted as lifestyle variables. The four lifestyle factors were created based on factor analysis of attitude and opinion items on a survey. The Well-being factor included seven items that were mainly related to mental and physical health, safety, and security. The Social factor included five items that were related to social prestige and community. The Spaces factor included four items that shared an underlying meaning of larger residential spaces. The Envirotech factor included five items that were related to the environment and technology.

Data Collection

This was a quantitative research study using the same dataset as the previous study (Lee et al., 2007). A total of 211 responses were collected from nine selected high-end rental apartment communities (4 downtown and 5 non-downtown communities) in the Charlotte, North Carolina metropolitan area, through two phases of mail surveys between March 1 and July 5, 2005. Among those responses, 202 were found usable and were included in the data analyses.

In the survey, participants were asked to rate their expectations and preferences on 50 specific apartment home and community features regarding in-home amenities including laundry, interior design features, parking, security, recreation and exercise facilities, and residents services. Among the 50 features, it was assumed that location preferences would be more related to preferences of features that were related to parking, security, and exercise or recreation. Thus, relationships between location preference and preferences for six parking-related features, four security features, and 12 exercise or recreation-related features were examined.

Results

Overview of Respondents

Among the respondents, 96 (48%) lived in four downtown communities and 106 (53%) lived in five non-downtown communities. Fifty percent of the respondents lived alone and 26% were couple-only households. Eighty-seven were less than 45 years of age. Sixty-four percent of the respondents had a household income of \$50,000 or more and 86% had a college degree or higher. Fifty-seven percent of the respondents had lived in their rental apartment home for less than a year at the time of the survey and 26% had previously owned a home or currently owned a home at the time of the survey. When choosing an ideal apartment community, location of the apartment community was the most important consideration, and proximity to work or school was the most

important consideration in choosing the location. For an ideal apartment location, a downtown location was the most preferred (43%) followed by suburban areas (33%), urban areas (21%), and rural areas (2%).

Location Preference and Demographic and Lifestyle Characteristics

The relationships between demographic and lifestyle characteristics were examined in two steps. In the first step, relationships between six individual demographic and four lifestyle factors were examined using chi-square tests of independence and independent sample *t*-tests. In the second step, the relationship between location preference and a linear combination of demographic and lifestyle characteristics were examined using discriminant analyses.

Table 1. Contingency Table: Location Preference and Demographic Characteristics

| Demographic Characteristic | Location Preference | | Total |
|-----------------------------------|---------------------|----------------|-------|
| | Downtown/Urban | Suburban/Rural | |
| Gender^A | | | |
| Male | | | |
| Observed <i>n</i> | 53 | 17 | 70 |
| [Expected <i>n</i>] | [46] | [24] | |
| (Valid %) | (41) | (24) | (35) |
| Female | | | |
| Observed <i>n</i> | 78 | 53 | 131 |
| [Expected <i>n</i>] | [85] | [46] | |
| (Valid %) | (60) | (76) | (65) |
| Total | 131 | 70 | 201 |
| Household type^B | | | |
| Single-only household | | | |
| Observed <i>n</i> | 76 | 25 | 101 |
| [Expected <i>n</i>] | [66] | [35] | |
| (Valid %) | (59) | (37) | (51) |
| Couple-only household | | | |
| Observed <i>n</i> | 24 | 28 | 52 |
| [Expected <i>n</i>] | [34] | [18] | |
| (Valid %) | (19) | (41) | (26) |
| Other | | | |
| Observed <i>n</i> | 29 | 15 | 44 |
| [Expected <i>n</i>] | [29] | [15] | |
| (Valid %) | (23) | (22) | (22) |
| Total | 129 | 68 | 197 |

^A $\chi^2 (1, N = 201) = 5.257, p = .022$

^B $\chi^2 (2, N = 197) = 12.859, p = .002$

Note: Only demographic variables that showed significant chi-square values with location preference are presented. Percents are valid percents of observed frequencies within each preferred location. Total of percents may not be 100 due to rounding.

The four original categories of preference of an ideal apartment home location (downtown, urban, suburban, and rural) were combined into two new categories: downtown/urban and suburban/rural.

Step 1. To examine relationships between location preference and individual demographic characteristics and lifestyle factors, six categorical demographic characteristics were compared with preferences for two locations using chi-square tests of independence, and lifestyle factors were compared across the location preferences using independent sample *t*-tests. From chi-square test results, only gender and household type showed significant relationships with location preference (Table 1). To compare observed counts and expected counts in the contingency table, it was found that more male respondents preferred downtown/urban locations and more female respondents preferred suburban/rural locations than expected, if gender and location preferences were independent of each other. Also, more single-person households preferred a downtown/urban location and more couple-only households preferred suburban/rural locations than expected if the household type and location preference were independent of each other.

Comparison of lifestyle factors across location preferences revealed that all four lifestyle factors were found to be significantly different across two locations (Table 2). Respondents who preferred downtown or urban locations showed significantly higher scores on the Social factor, while those who preferred suburban or rural locations showed significantly higher scores of Well-being, Spaces, and Envirotech factors. That is, a household that more highly values social prestige and connections tended to prefer a downtown or urban location, while a household that more highly values physical and mental health, security, safety, spaciousness, environment, and technology tended to prefer a suburban or rural location.

Table 2. Independent Sample *t*-test: Location Preference and Lifestyle Factors

| Lifestyle factor | Location Preference | |
|-------------------------|---------------------|----------------|
| | Downtown/Urban | Suburban/Rural |
| Well-being ^A | 2.28 | 2.32 |
| Social ^B | 1.96 | 1.72 |
| Spaces ^C | 2.02 | 2.15 |
| Envirotech ^D | 2.26 | 2.32 |

^A $t(200) = -2.131, p = .034$

^B $t(120.457) = 6.235, p = .000$

^C $t(200) = -3.758, p = .000$

^D $t(200) = -2.351, p = .020$

Note: Lifestyle variables used are mean scores of transformed values of items in each factor. Judgments of the original items were made on a 6-point scale (1 = strongly disagree, 2 = disagree, 3 = somewhat disagree, 4 = somewhat agree, 5 = agree, and 6 = strongly agree).

Step 2. To explore the relationship between location preference and combinations of demographic and lifestyle characteristics, a series of discriminant analyses were used. Discriminant analysis is a useful statistical technique in understanding group differences or in predicting membership of two or more groups (Hair, Anderson, Tatham, & Black, 1998). When there are more than two groups in the dependent variable, it is called multiple discriminant analysis.

To predict the group membership, discriminant function that is similar to a logistic regression equation is tested. The value that is calculated for each case by discriminant function is called a discriminant Z score and group centroid is a mean score of the discriminant Z scores in a particular group. Cutting score is a criterion to predict group membership of each case in two group discriminant analyses. In predicting group membership of a case, a discriminant Z score of the case is compared with the cutting score. If the discriminant Z score of a case is above the cutting score, the case is classified as a member of group with greater centroid. And, if a discriminant Z score of a case is below the cutting score, the case is predicted as a member of group with a smaller centroid.

To measure the classificatory power of the discriminant function, hit ratio and Press's Q are used. A hit ratio is a percentage of cases whose membership is correctly predicted by the discriminant function. When the Press's Q of a discriminant function is significant, the discriminant function is considered having significant classification power.

In this study, location preference was a dependent variable with two groups, and six demographic variables and four lifestyle factors were independent variables. Independent variables of discriminant analysis need to be continuous variables, and 10 dichotomous dummy variables of the six categorical demographic variables were generated and used. To compare the influence of demographic characteristics and lifestyle characteristics in predicting location preference, three models of discriminant analyses were tested: (a) a model with only demographic dummy variables as independent variables, (b) a model with only lifestyle factors as independent variables, and (c) a model that included all demographic dummy variables and lifestyle factors as independent variables. For each model of the discriminant analysis, stepwise method with Mahalanobis distance measure was used (Hair et al., 1998) (See Table 3 for the summary of three discriminant analysis models). Each model met the equal covariance matrix assumption and showed significant classification power.

Table 3. Summary of Discriminant Analyses

| | Discriminant Analysis | | |
|--|-------------------------|----------------------|--|
| | Model 1 Demographics | Model 2 Lifestyle | Model 3 Demographics and Lifestyle |
| Wilk's Lambda | .904** | .723** | .683** |
| Discriminant function coefficient ^a | | | |
| Constant | -1.149 | 2.474 | 0.805 |
| Household type: Couple-only ^b | 2.346 | — | 0.641 |
| Income: Less than \$50,000 ^c | 1.219 | — | |
| Gender: Female ^d | | — | 0.614 |
| Well-being factor ^e | — | -2.497 | |
| Social factor ^e | — | 3.822 | -3.198 |
| Spaces factor ^e | — | -1.886 | 2.244 |
| Canonical correlation (<i>r</i>) | .310 | .526 | .563 |
| <i>r</i> ² | .096 | .277 | .317 |
| Group centroid | | | |
| Downtown/Urban (Z_{DU}) | -0.227 | 0.453 | -0.475 |
| Suburban/Rural (Z_{SR}) | 0.463 | -0.836 | 0.967 |
| Cutting score (Z_{CU}) ^f | 0.220 | -0.382 | 0.460 |
| Hit ratio ^g | | | |
| Downtown/Urban | 81.7% | 87.8% | 87.8% |
| Suburban/Rural | 39.4% | 57.7% | 53.5% |
| Total | 66.8% | 77.2% | 75.7% |
| Press's <i>Q</i> ^h | 22.89** | 53.54* | 53.54* |

* $p < .05$, ** $p < .001$

^a Only discriminant function coefficients of variables in final stepwise model of each discriminant analysis model are presented. "—" means the variable was not included in the model, and a blank means the variable was included in the model but was not significant.

^b Dummy variable whose value is 1 for a couple-only household and 0 for other.

^c Dummy variable whose value is 1 for a household with a income less than \$50,000 and 0 for other.

^d Dummy variable whose value is 1 for female and 0 for other.

^e Composite variables that have mean scores of transformed values of items in each lifestyle. Judgments of the original items were made on a 6-point scale (1 = strongly disagree, 2 = disagree, 3 = somewhat disagree, 4 = somewhat agree, 5 = agree, and 6 = strongly agree).

^f $Z_{CU} = (N_{DU}Z_{SR} + N_{SR}Z_{DU}) / (N_{DU} + N_{SR})$

where N_{DU} is number of respondents who preferred downtown/urban location and N_{SR} is number of respondents who preferred suburban/rural location (Hair et al., 1998, p. 265). N_{DU} was 131 and N_{SR} was 71.

^g Hit ratios of cross-validated models are presented.

^h Press's $Q = [N - (nK)]^2 / N(K - 1)$

where N is total sample size, n is number of observations correctly classified, and K is number of groups (Hair et al., 1998, p. 270). Press's Q s of cross-validated models are presented.

Model 1: Only with demographic dummy variables. As a result of the first model of discriminant analysis, it was found that a linear combination of being a couple-only household and having a household income less than \$50,000 significantly contributed to classification of two location preference groups. To see r^2 of the discriminant model, a linear combination of these two dummy variables explained about 9.6% of the variance in the location preference. Also, with this discrimination function, 66.8% of the households' location preferences were successfully predicted. Considering a group that preferred suburban or rural location showed a higher group centroid than a group that preferred a downtown or urban location and that discriminant function coefficients of the two dummy variables were positive, a couple-only household or a household that had a household income less than \$50,000 has a higher tendency to prefer suburban or rural locations for an ideal apartment home.

Model 2: Only with lifestyle factors. As a result of the second discriminant analysis model, it was found that a linear combination of Well-being, Social, and Spaces factors significantly contributed to classification of two location preference groups. The linear combination of these three variables explained about 28% of the variance on the location preference, which means that the linear combination of these lifestyle factors were more effective in explaining the variance in the location preference than the linear combination of demographic variables in Model 1. With this linear combination of three lifestyle factors, 77.2% of respondents' location preferences were successfully predicted.

To see the group centroids, a group that preferred downtown or urban locations showed a higher group centroid than a group that preferred suburban or rural locations. And, the discriminant function coefficient of the Social factor was positive, while coefficients of Well-being and Spaces factors were negative. These indicate that a household with higher values of Social factor or lower values of Well-being and Spaces factors has a higher tendency to prefer downtown or urban locations for an ideal apartment home.

Model 3: With demographic dummy variables and lifestyle factors. The last model of discriminant analysis, which included all demographic dummy variables and lifestyle factors, found that a linear combination of being a couple-only household, being a female, having higher Social factor scores and Spaces factor scores significantly contributed to a classification of two groups with different location preferences. The linear combination of these four variables explained about 31.7% of the variance in the location preference, which means that a linear combination of these two demographic dummy variables and two lifestyle factors were more effective in explaining variance in the location preference than the linear combination of two demographic variables or the linear combination of three lifestyle factors. With this linear combination of two demographic

variables and two lifestyle factors, 75.7% of respondents' location preferences were successfully predicted.

A group that preferred suburban or rural locations showed a higher group centroid than a group that preferred a downtown or urban location. And, discriminant function coefficients of being a couple-only household, being a female, and the Spaces factor were positive, while the coefficient of Social factor was negative. That is, a couple-only household, a female, or a household with higher values on the Spaces factor has a higher tendency to prefer a suburban or rural location for an ideal apartment home. On the other hand, a household who has higher values on the Social factor has a tendency to prefer a downtown or urban location.

Summary. It was found that some individual demographic and lifestyle characteristics or combinations of these had an influence on location preferences. Thus, the first research hypothesis was supported. When comparing hit ratios of three discriminant models, the last model that included two demographic variables (gender and household type) and two lifestyle factors (Social and Spaces) was found to be the most effective to explain variance in the location preference compared with models only with demographic variables or with lifestyle factors. The overall hit ratio of the last model (75.7%) was somewhat lower than the second model (77.2%). However, considering the significant Press's Q and larger r^2 , the hit ratio difference was small enough to be neglected.

Interestingly, all three models were powerful in predicting preference for downtown or urban locations (hit ratios ranging from 81.7% to 87.8%), while none of the models were quite as successful in predicting preference for suburban and rural locations (hit ratios ranging from 39.4% to 57.7%). That is, more features that were not included in this study model need to be explored to enhance the explanation of suburban or rural location preferences.

Location Preference and Apartment Community Feature Preferences

Preferences for six parking features, four security features, and 12 exercise and recreation-related features were compared across the preference of two locations using chi-square tests of independence. Six features related to parking were outdoor parking spaces in front of the building, parking garage for the apartment community, attached garage with direct access to unit, garage/carport detached from unit, guest parking, and reserved parking. Four security features were monitored intrusion alarm, gated entrance to community, controlled access to buildings, and gated parking garage. Twelve exercise or recreation-related features were space to exercise in apartment home, fitness center in apartment community, walking trail, tennis court, playground, indoor basketball court, outdoor basketball court, racquetball court, volleyball court, pool, Jacuzzi or hot tub, and outdoor

park. These feature preferences were coded as dichotomous variables (“prefer” and “do not prefer”).

Table 4. Contingency Table: Location Preference and Preferences for Parking-Related Features

| Feature | Location Preference | | Total |
|--|---------------------|----------------|-------|
| | Downtown/Urban | Suburban/Rural | |
| Outdoor parking spaces in front of building ^A | | | |
| Prefer | | | |
| Observed <i>n</i> | 53 | 60 | 113 |
| [Expected <i>n</i>] | [73] | [40] | |
| (Valid %) | (41) | (84) | (56) |
| Do not prefer | | | |
| Observed <i>n</i> | 77 | 11 | 88 |
| [Expected <i>n</i>] | [57] | [31] | |
| (Valid %) | (59) | (16) | (44) |
| Total | 130 | 71 | 201 |
| Parking garage for the apartment community ^B | | | |
| Prefer | | | |
| Observed <i>n</i> | 93 | 29 | 122 |
| [Expected <i>n</i>] | [79] | [43] | |
| (Valid %) | (72) | (41) | (61) |
| Do not prefer | | | |
| Observed <i>n</i> | 37 | 41 | 78 |
| [Expected <i>n</i>] | [51] | [27] | |
| (Valid %) | (29) | (59) | (39) |
| Total | 130 | 70 | 200 |

^A $\chi^2 (1, N = 201) = 25.690, p = .000$

^B $\chi^2 (1, N = 200) = 17.253, p = .000$

Note: Only variables with significant Pearson chi-square at $p < .05$ are presented. Percents are valid percents of observed frequencies within each preferred location.

Table 5. Contingency Table: Location Preference and Preferences for Security Features

| Feature | Location Preference | | Total |
|--|---------------------|----------------|-------|
| | Downtown/Urban | Suburban/Rural | |
| Gated entrance to community^A | | | |
| Prefer | | | |
| Observed <i>n</i> | 89 | 38 | 127 |
| [Expected <i>n</i>] | [82] | [45] | |
| (Valid %) | (68) | (54) | (63) |
| Do not prefer | | | |
| Observed <i>n</i> | 42 | 33 | 75 |
| [Expected <i>n</i>] | [49] | [26] | |
| (Valid %) | (32) | (47) | (37) |
| Total | 131 | 71 | 202 |
| Gated parking garage^B | | | |
| Prefer | | | |
| Observed <i>n</i> | 95 | 26 | 120 |
| [Expected <i>n</i>] | [78] | [42] | |
| (Valid %) | (72) | (37) | (60) |
| Do not prefer | | | |
| Observed <i>n</i> | 36 | 45 | 80 |
| [Expected <i>n</i>] | [52] | [29] | |
| (Valid %) | (28) | (63) | (40) |
| Total | 130 | 71 | 201 |

^A $\chi^2(1, N = 202) = 4.100, p = .043$

^B $\chi^2(1, N = 201) = 24.309, p = .000$

Note: Only variables with significant Pearson chi-square at $p < .05$ are presented. Percents are valid percents of observed frequencies within each preferred location.

Table 6. Contingency Table: Location Preference and Preferences for Exercise/Recreation Features

| Feature | Location Preference | | Total |
|----------------------------|---------------------|----------------|-------|
| | Downtown/Urban | Suburban/Rural | |
| Walking trail ^A | | | |
| Prefer | | | |
| Observed <i>n</i> | 62 | 44 | 106 |
| [Expected <i>n</i>] | [69] | [37] | |
| (Valid %) | (47) | (62) | (53) |
| Do not prefer | | | |
| Observed <i>n</i> | 69 | 27 | 96 |
| [Expected <i>n</i>] | [62] | [34] | |
| (Valid %) | (53) | (38) | (48) |
| Total | 130 | 71 | 202 |
| Tennis court ^B | | | |
| Prefer | | | |
| Observed <i>n</i> | 35 | 29 | 64 |
| [Expected <i>n</i>] | [42] | [23] | |
| (Valid %) | (27) | (41) | (32) |
| Do not prefer | | | |
| Observed <i>n</i> | 96 | 42 | 138 |
| [Expected <i>n</i>] | [90] | [49] | |
| (Valid %) | (73) | (59) | (68) |
| Total | 131 | 71 | 202 |

^A $\chi^2 (1, N = 202) = 3.959, p = .047$

^B $\chi^2 (1, N = 202) = 4.246, p = .039$

Note. Only variables with significant Pearson chi-square at $p < .05$ are presented. Percents are valid percents of observed frequencies within each preferred location.

As a result, it was found that location preferences were significantly related to preferences of two parking-related features (outdoor parking spaces in front of the building and a parking garage for the apartment community), two security features (gated entrance to community and gated parking garage), and two exercise or recreation-related features (walking trail and tennis court). More households that preferred downtown or urban locations preferred to have parking garages for the apartment community, a gated entrance to the community and a gated parking garage than expected when location preference and preferences of those variables were independent of each other. On the other hand, households that preferred suburban or rural locations preferred to have outdoor parking spaces in front of the building, a walking trail, and tennis courts. Please see Table 4 for comparisons

of location preference and preferences of the two parking-related features, Table 5 for comparisons of location preference and the two security feature preferences, and Table 6 for comparisons of location preference and the two features that were related to exercise or recreation.

Summary. It was found that location preference had significant relationships with preferences for some specific parking, security, and exercise features. Thus, the second research hypothesis was also supported.

Limitations

Limitations of this study are mainly associated with the sample framework. The sample for this study was residents of recently built, high-end apartment communities in the Charlotte, North Carolina metropolitan area. The respondents had a high education attainment and high incomes. Thus, it is not appropriate to generalize the findings to all multifamily housing renters in this country. However, the respondents of the study were represented by young single-person or couple-only households, which is similar to the age and the household types of the U.S. multifamily housing residents identified by the NAHB (2004).

Design and Managerial Implications

Apartment developers, owners, and managers have identified lifestyle factors as important to attracting residents. This research gives empirical validity to that practice. Findings from this research strongly suggests that multifamily developers and owners need to include parking garages and security features when developing new apartment communities or when upgrading existing communities that they have purchased in downtown or urban locations. Planning on-site amenities with restricted access, such as roof gardens and cyber cafes, may improve the sense of security for a downtown property. As for suburban or rural apartment communities, this research does not support the need for parking garages, but does support the need for including outdoor activity features, such as walking trails and pet parks. Community outdoor living areas have often been tied to a pool, but other social areas featuring an outdoor kitchen or fire pit could also highlight the ties to the natural environment.

Marketing specialists can use information from this study when developing the marketing plan for specific communities. The advertising should emphasize values, features, amenities, and services that are attractive to those choosing specific locations. It was found that respondents who preferred downtown or urban locations highly valued social prestige and connections. When developing marketing plans for apartment communities in downtown or urban locations, it would be more effective to use themes reflecting those values together with physical amenities to attract people who prefer these locations. For instance, a community may want to hire an event planner to organize innovative activities

and parties that are targeted to the age groups they hope to attract. An event, such as an academy awards black-tie party residents can invite their friends to, could boost their social standing and encourage others to rent in the community. On the other hand, it would be more effective to use themes emphasizing physical and mental well-being, sufficient space, and proximity to the natural environment in marketing plans for apartment communities in suburban or rural locations to be responsive for values of people who preferred these locations.

Conclusion

This study examined demographic and lifestyle influences on location preferences of multifamily housing residents. Also, the relationships between the location preferences and preferences for specific apartment community features were investigated. These relationships were hypothesized using a modified model of influences on housing choice. Based on findings of the study, the modified model was supported.

Lifestyle is a popular concept that is used to understand and predict consumer behaviors where demographic characteristics are not sufficient (Plummer, 1974; Wells, 1975). Findings from this study support this idea by showing how lifestyle concepts have improved the explanation of location preference. Also, the lifestyle characteristics were consistent with the common expectations of each location. Downtown or urban locations are associated with proximity to public amenities while suburban or rural locations are associated with spaciousness and more exposure to the natural environment.

From an examination of the relationships between individual and combinations of demographic and lifestyle characteristics, it was found that single-person households and males tended to prefer downtown or urban locations to suburban or rural locations. Also, households who preferred downtown or urban locations tended to place greater values on social prestige and community than those who preferred suburban or rural locations. On the other hand, couple-only households or females preferred suburban or rural locations. Households who preferred suburban or rural locations tended to value mental and physical health, safety and security, spaciousness, the environment, and technology.

In terms of feature preferences, households who preferred downtown or urban locations showed strong preferences for a parking garage for the apartment community and security features such as a gated entrance to the community and a gated parking garage. The households who preferred suburban and rural locations tended to prefer outdoor parking spaces in front of the building, as well as walking trails and tennis courts.

Despite the limitations of the sample, the procedure and findings of this study are important because it was the first empirical study that explored lifestyle and demographic influences on location preferences of multifamily housing residents

and linked the location preference to the specific apartment community features. Thus, the researchers suggest applying the instrument and procedures of this study for cross-market comparisons of lifestyle and location preferences to better understand multifamily housing residents' location choices in other geographic areas. Also, it would be useful to compare lifestyle and location preferences of homeowners and renters to see if tenure type makes any difference in their housing choices.

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