# **Local Food Preferences of Restaurant Consumers**

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### **Abstract**

Changing consumer attitudes towards environment, animal welfare, food safety, food quality, and personal health is boosting demand for locally produced food products. Although a number of studies have examined the demand for these products through direct marketing channels, the literature on consumer preference for locally produced food ingredients in restaurant setting is limited. This study attempts to fill this gap in the literature by using a panel survey of 303 restaurant diners in the U.S. southwest. The preliminary results show that price is the primary factor in determining consumer choice for restaurant meals followed by the use of local food ingredients and the type of restaurant.

## Introduction

Consumer demand for locally grown food products has increased substantially in recent years. Factors such as changing consumer attitude towards environment (Lusk, Nilsson, and Foster, 2007; Anderson, Goeree, and Holt, 1998), animal welfare (Morris, 2009; Barnes, Vergunst, and Topp, 2009), food quality (Lempert, 2008; Baker, 2008), food safety (Banterle and Stranieri, 2008; Fritz and Schiefer, 2009), and personal health (Acharya et al, 2006) are boosting the demand for locally produced food products. For instance, increasing realization that the rising food mileage can induce global warming has energized the 'Locavores' (those who try to eat food grown or produced within 100-mile radius of their residence) to initiate the local food movement (Thilmany, Bond, and Bond, 2008). Likewise, the rising concern about the intentional food contamination possibilities and the recent food safety scares have increased the consumer interest in understanding the process involved in producing, processing, and transporting the food they consume.

As a results, increasing number of consumers are now buying food products directly from local growers and food processors. For instance, recent Agricultural Census data shows that the amount of food sold directly to consumers has increased from \$812 million in 2002 to \$1.2 billion in 2007. During the same period, the number of farms selling their products directly to consumers increased by 17 percent reaching over 116,000. According to 2008 National Farmers Market Directory (U.S. Department of Agriculture, 2008) there are over 4,685 farmers markets in the U.S. Moreover, 44 state agricultural agencies have been promoting food products grown or processed in the state (Darby et al, 2008).

Although a number of studies have examined the consumer demand for locally produced food products through direct marketing channels such as farmers markets, community

supported agricultural groups, and personal marketing, there is limited research examining the consumer demand for restaurant menu items prepared with locally grown ingredients. This study attempts to fill this gap in the literature by evaluating consumer preference for restaurant menu items that are prepared with locally grown ingredients. In addition to local ingredients, consumer preference for restaurant menu items might be affected by many other factors including consumer income and changing demographics (Lin et al., 2003). As demographics change and incomes increase, consumers may demand different attribute bundles from their foods.

In particular, we examine whether consumer prefer restaurant menu items that are prepared with locally grown ingredients over those which are prepared with non-local ingredients. In addition, other important demand factors such as meal price and type of restaurant are also examined. Consumer demographics were also used to help segment markets and provide insights into possible market opportunities. Preliminary results show that price is the most important factor determining consumer menu choices followed by use of locally grown food ingredients and the type of restaurant.

#### **Relevant Literature**

Food production locality has been measured by "food miles." The importance of food miles, "the distance food travels from where it is grown to where it is ultimately purchased or consumed by the end user" (Pirog and Genjamin, 2003), is increasingly being examined in the literature (although much of the discussion has occurred outside of the agribusiness literature). Most of the earlier studies related to food mile have focused on the relationship between food miles and the environment (Sirieix et al., 2007; Holt and Watson 2008; Weber and Matthews, 2008). Recently, a number of studies have evaluated the impact of rising consumer concern

about environmental impact of rising food mileage on demand for locally produced food products (Sirieix, Grolleau, and Schaer, 2008; Frank, 2004). However, there has been limited study examining the consumer preference for locally produced food in restaurant setting (Starr et al., 2003; Thilmany, 2004).

With food and fuel costs increasing significantly, restaurants and other food service supply chain participants are looking for opportunities to increase their profitability. While locally grown foods have been used for centuries, they have not always been marketed as such. If there is a strong demand for restaurant menu items prepared from locally produced ingredients and the local producers of these ingredients can provide a consistent supply of fresh products at reasonable prices (Thilmany, 2004), a coordinated effort to promote locally grown products can boost profitability of all supply chain partners involved in producing these meals.

While earlier studies have examined food buyers' preferences for local foods to be utilized in restaurants and/or institutions (e.g., Starr et al., 2003; Thilmany, 2004), there is limited research that examines consumers' preferences for restaurant menu items prepared from locally produced meats, fruits, and vegetables. That is, do final consumers of local foods prefer their restaurants to utilize local ingredients? What implications do these consumer preferences have for supply chain providers, e.g., producers, manufacturers, and food service distributors? Consumer perceptions regarding the use of local production as an ingredient in the foodservice industry may provide insight into a valuable marketing opportunity for both restaurant owners and local food producers. Therefore, the objective of this research is to examine restaurant diners' preferences for menu items that are prepared by using ingredients grown or raised locally.

# **Procedures**

A panel survey of 322 consumers was conducted on July 5th-6th, 2008. Survey respondents were screened to ensure that they consume ethnic foods and were from the American Southwest. The sample population closely matched that of the Southwest in both population by state and income (U.S. Census, 2008). The sample population's age was similar to that of the U.S. population, although the "Under 20" age category was largely underrepresented due to the survey distribution method. Gender distribution in the sample population was similar to the U.S. population, with females being slightly overrepresented. Eighty-five percent of respondents were a primary food purchaser for their household.

Consumers were presented with hypothetical restaurant choices and asked to rate their likeliness to select the restaurant when eating away from home. Only three attributes differed among the restaurants: 1) price, 2) restaurant type and 3) the use of locally grown ingredients. The conjoint model was used to estimate part-worth utilities for price, restaurant type, and the use of locally grown ingredients utilizing SAS's "Transreg" procedure (SAS, 2004).

# Results

Out of 322 surveys received, only 303 were complete and are used in this study. Individual part-worth utilities were estimated for three restaurant meal attributes considered in this study – price, locally grown ingredient (local ingredient used or not used), and restaurant type (chain versus local) Initial results suggest that while it was not the primary decision factor, consumers did consider a restaurant's practice of "buying locally" in their choice of eating out. Table 1 shows survey respondent's average part-worth utilities for meal price, restaurant type, and the use of local ingredients. These results show that price is the primary factor determining

consumer choice for restaurant menu items followed by use of locally grown ingredients and the type of restaurant chain.

Table 1. Average Part-Worth Utility for Specific Restaurant Variables

Variable	Average Importance
Average meal price	58.5
Restaurant type	17.5
Local ingredients	23.9

Following Kuhfeld (2005), additional analysis related to the conjoint analysis will be conducted and presented. This analysis will include market segmentation, including identification of consumers who place greater importance on food production locality and development of consumer willingness-to-pay measures for restaurants utilizing local foods.

## Conclusions

Increasingly consumers are concerned with understanding the food marketing system and knowing where their food has originated. As disposable incomes increase, consumers have indicated a willingness to pay for additional food attributes. This study identifies the importance of locally obtained foods to a set of restaurant consumers located in the American Southwest. By better understanding restaurant consumer preferences for locally produced foods, supply chain participants in the food service industry will be able to better serve their market constituents.

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