Introduction

Obesity, diabetes, cardiovascular disease, and many other chronic disease rates are rising to alarming levels in the United States. The public health sector is devoting various efforts to stop this trend and improve the health of communities all across the country. Each city has the power to set goals, make decisions, and create change that can fashion a healthier community. More specifically, city planners have the power to generate new zoning ordinances or to amend old ones to develop healthier environments. Zoning ordinances determine what a city's environment can look like and how it should function. The built food environment is of particular concern when considering the high rates of obesity and chronic disease.

Spokane, Washington, a city located on the eastern edge of Washington State, is home to about 209,000 people making it the second largest city in the state. Spokane is a unique city situated around the Spokane River and is divided into several neighborhoods, which have varying food environments. Some neighborhoods have ample access to healthy foods being in close proximity to supermarkets or large grocery stores, farmers' markets, and even community gardens. Other neighborhoods, typically low or mixed-income, have limited access to healthy foods. Overall, Spokane's population is 84 percent non-Hispanic white. Among those 25 years and older, 90 percent are high school graduates while only 27 percent have earned a Bachelor's degree or higher. The 2010 U.S. Census revealed that 18.6 percent of Spokane's residents were living below the poverty line, placing them at greater risk for living in areas with limited access to foods that are necessary for a nutritious diet.

The Spokane Regional Health District's Health Promotion Division requested guidance on how to utilize zoning laws to increase access to healthy foods throughout the city. The intention of this brief is to explain the importance of a healthy food environment, describe the zoning options available to cities and, provide Spokane with specific guidance for the next steps to greater access to healthy foods and an overall healthier food environment. Zoning options will focus on increasing farmers' markets, urban agriculture, and healthy food retail as well as options for limiting fast foods.

Impact of the Food Environment on Health

The rates of obesity, cardiovascular disease, stroke, and diabetes, continue to rise even among children and especially among low-income populations. Determining and combating the factors that are causing the continuous increase has become a primary focus of public health. While there are many that contribute to the obesity epidemic, the food environment play a significant role and is a public healthy target for improving the health of communities. The food environment contributes to the health disparities and inequalities found between neighborhoods in cities all across the nation. Not all neighborhoods offer the same level of safety or cleanliness, and the same can be said for the availability and affordability of nutritious foods. The food environment has the power to influence a population’s shopping and eating behaviors. Therefore, individuals’ diets tend to be healthier when more healthy food items are available to them.
The highest rates of preventable diseases associated with diet are found among low-income populations. More specifically, higher rates of obesity and diabetes are found among female, non-white, low-income populations. Limited access to healthy, affordable foods is linked to higher rates of these health related issues. One reason for this association is low-income areas within communities across the nation have limited access to foods that are important for a healthy diet such as fruits, vegetables, whole grains, and low-fat dairy products. Limited access to supermarkets, which generally stock a greater variety of fresh produce and whole grain options may be one explanation for the health disparity. Low-income, minority, and rural neighborhoods have a greater density of small grocery or convenience stores than supermarkets within their neighborhoods, which limits access to healthy, affordable foods. The quality and price of the food items found in small groceries differ from those in supermarkets that are more commonly found in more affluent areas.

Small groceries not only stock fewer healthy items but typically have less variety and poorer quality items and higher prices. The cost of healthy food items in small grocery or convenience stores can be up to 49% higher than foods found in supermarkets in some areas. Greater availability of supermarkets is associated with increased consumption of fresh produce, but unfortunately the United States Department of Agriculture (USDA) determined that 23.5 million Americans do not have access to a supermarket within one mile of where they live. With limited access to healthy, affordable foods, low-income populations are more likely to consume poor diets on a consistent basis and therefore are at greater risk for obesity and chronic diseases. While those with access to supermarkets have the lowest rates of obesity. So in theory, healthier options are more available and have a greater chance of being selected at supermarkets to replace more unhealthy, calorie-dense foods in many individuals' diets.

Access to healthy foods is associated with positive health outcomes for both adults and children. According to national data reports, availability of supermarkets is significantly associated with a lower body mass index (BMI) among adolescents. On the other hand, populations with greater access to convenience stores, which typically do not offer many healthy food options is associated with a greater BMI and increased overweight.

Although beyond the scope of this paper, lack of transportation options and limited time can also inhibit healthy food access among low-income populations. Many low-income, particularly urban, populations do not own a car and rely on a public transportation system that may not be in route to supermarkets. Lengthy amounts of time may be needed to travel to and from these stores, further creating a barrier to healthy food access. Therefore, transportation needs and options should also be considered when developing and revising zoning laws to improve access to healthy foods.

On the opposite end of the spectrum, abundance of unhealthy foods is just as important to consider as limited access to healthy foods. Corner and convenience stores are found in much greater numbers within low-income areas. In fact, low-income zip codes have 30 percent more convenience stores than middle-income zip codes. These store types offer more processed or ready-to-eat foods and beverages that are typically high in calories, fat, and sugar and lack more nutritious foods. Small grocery and convenience stores may be the only option for many community members that are not able to travel to the nearest supermarket. The USDA found an association between the
consumption of plant-based foods and whole grains with a decreased risk of cardiovascular disease. It is clear that a diet lacking in plant-based foods and high in saturated and trans fats increases the risk for cardiovascular disease. It is likely that those shopping at the small neighborhood stores will have diets lacking in the plant-based foods that are recommended to prevent chronic disease. The reason for this disparity may be due to the fact that healthy, plant-based and whole grain foods are not offered, the quality is too poor for the cost, or there are more enticing, inexpensive options for low-income families.

Another popular source of inexpensive, calorie-dense foods is fast food restaurants. Controlling for food preferences and the residence location decision, a study found that the proximity to fast food restaurants is positively correlated with BMI. In addition, the strongest links between obesity and fast food consumption are typically found among low-income populations. With lower prices and closer proximity to fast food establishments than supermarkets, there is greater accessibility of these foods. Fast food restaurants are a significant part of the food environment in many communities and must also be considered when planning healthy changes for a community.

Policy influences on the Food Environment

Policies have the ability to build equitable and sustainable food environments through various avenues. Local governments have the power to eliminate some of the barriers that limit access to healthy, affordable foods. City officials make planning decisions to grow and build a community in a way that is most suitable for its people. Zoning ordinances are a way for a city to enforce the plans. The primary reason that cities have zoning authority is to protect the community’s public health rights. Many cities have had demonstrated success in creating more pedestrian friendly environments to promote physical activity. Also, city officials can use zoning to improve access to healthy, affordable foods and to limit unhealthy food establishments. Zoning divides communities into several types of districts. Commercial districts most often house supermarkets and other food retail, which are typically a significant distance from residential districts that are mainly zoned for housing. Community residents with limited access to transportation options and who live greater than a walking distance to a supermarket have difficulty accessing healthy food choices. Many urban neighborhood populations will shop at small grocery or convenience stores that are occasionally allowed in the residential or mixed-use district but as discussed before, these stores often have little variety of healthy foods, poorer quality of healthy foods, and higher prices in general.

Community planners can work together with other community organizations to assess and identify the gaps in the food environment. There are numerous zoning options that can be utilized in taking action against inequitable food environments that are occurring across the country. Creating mixed-use neighborhood districts that include space for and allow large grocery stores, community gardens, and farmers’ markets is one way zoning can promote access to healthy foods among other healthy lifestyle behaviors. Mixed-use districts allow more flexibility and the greatest amount of opportunity for improving healthy food access. These districts are intended to bring retail and residential areas together so that community members do not need to rely on motorized
transportation but can walk or bike to access everyday needs such as food. Since larger grocery stores are typically allowed in these districts, a greater variety and higher quality of food can be available to those living or working near by. Mixed-use districts often allow open space where community or school gardens can exist and also permit farmers’ markets to further increase access to healthy, affordable foods.1

Attracting supermarkets to underserved neighborhoods using zoning incentives or deregulation is another option available to communities. Updating zoning districts to combine residential and retail can allow supermarkets into areas they may not have been allowed in previously.17 Offering greater floor area to stores, requiring fewer parking spaces, and eliminating expensive and lengthy special permit requirements are all examples of zoning incentives. New York City’s Food Retail Expansion to Support Health (FRESH) Program utilizes all three of the zoning methods in combination with financial incentives to acquire greater access to healthy foods in the city’s underserved areas.4

In addition to mixed-use zoning districts, community gardens and farmers’ markets can be permitted in other districts as well. Allowing and promoting community gardens on both private and public land such as schoolyards and parks in districts other than mixed-use can also open up greater opportunities for healthy food access within neighborhoods that may be unable to sustain a supermarket.1 Zoning ordinances have the ability to promote and protect farmers’ markets, community gardens, fresh produce vendors, and other urban agricultural programs. Zoning laws determine where these can occur within a community and also have the power to specify when and how they operate.

Designated appropriate spaces to start gardens and to hold markets can be determined by city planning officials and other community members and then placed into the zoning laws. Extraneous permit requirements and costs, including those for parking, can be acknowledged and simplified within zoning regulations further encouraging farmers and gardeners to participate. Allowing such entities as community gardens and farmers’ markets in underserved communities can create a more convenient way to access healthy, locally grown foods. Offering clear provisions for these entities within zoning laws, encourages farmers and gardeners to invest time and effort since there is greater land-use protection.4 Allowing public land to be used for community gardens and farmers’ markets increases access to locally produced healthy foods in various districts within parks or near schools. Another factor to consider is the form of payment accepted by farmers’ markets. Since many underserved communities are typically a low-income population, it is necessary to consider what forms of payment can be accepted to ensure that this population is able to purchase the foods offered. Zoning laws can go one step further to require, or at least encourage, the acceptance of Women, Infants, and Children (WIC) coupons and Electronic Benefit Transfer (EBT) cards, providing greater opportunity for low-income communities to purchase healthy foods.12

Increasing healthy food options alone may not be enough to improve the diets of community members. Limiting the unhealthy food choices surrounding a community are also important when considering the food environment. The density and locations of fast food establishments within a city will likely determine which policy method can be used to limit these establishments that
typically offer calorie-dense, nutrient poor foods in large portions at cheap prices. A city may decide to limit the number of fast food establishments within city limits, require a minimum distance from schools or other public institutions, or ban them altogether.

Rising rates of obesity and debilitating chronic diseases, especially among low-income populations, warrants change within the food environment. Positive changes can create food environments that have greater access to affordable, healthy foods at a neighborhood supermarket, farmer's market, or community garden. Updating and revamping zoning laws can allow for better healthy food access and lead communities to make the right decision for their health.

**Zoning Options to Support a Healthier Food Environment**

Cities striving to build a healthier food environment can utilize zoning laws to create a better balance between access to less healthy food options and affordable, nutritious food items. More equality between neighborhood food environments can also be achieved. Zoning laws can address farmers' markets, community gardens, healthy food retail, and fast food establishments in a variety of ways with the common goal of improving the community's health and wellbeing.

**Farmers' Markets**

Farmers' markets are places where community members can purchase locally grown and prepared foods. Farmers' markets typically offer a variety of healthy produce and other foods through direct marketing. Direct marketing means that the producers sell the food directly to the customer. There are benefits to direct marketing for both the producer who has an opportunity to sell their goods and for consumers who can access quality foods at a more affordable price.\(^\text{16}\) Farmers' Markets support a healthier food environment by bringing nutritious foods to areas of the community that may have very limited access to these foods otherwise. To ensure that farmers' markets can exist in a community it is important to look at the zoning ordinances that are in place. Farmers' markets need to be included in zoning laws so that markets are considered legal and land is available and/or protected for them.

Defining farmers' markets and permitting them in specified zones within a community is vital to the existence and success of the markets. Many farmers or producers are discouraged from initiating or participating in farmers' markets due to the reoccurring challenges such as having to reapply for certain permits on a regular basis.\(^\text{4}\) Zoning laws can eliminate the need for certain permits if general guidelines and regulations are established within the zoning ordinances. Without the inclusion of farmers' markets in the zoning laws, all farmers' markets would be termed illegal no matter where the markets were set up. Zoning ordinances should define farmers' markets and include the operators of the markets and what items can be sold. The National Policy and Legal Analysis Network to Prevent Childhood Obesity (NPLAN) recommends percentages be specified, within the zoning language, for the amount of products that must be local farm products and for vendors that must be producers or affiliated with the producers.\(^\text{12}\)
By permitting farmers' markets in various zoning districts and providing general land use guidelines, the number of markets can increase and existing markets strengthened since there would be fewer restrictions placed on the farmers in regards to location and permits. Already existing land for farmers' markets can be protected with the new ordinances as well. There are several other ways to encourage farmers' markets through zoning laws in communities that may already provide and/or protect land for this purpose. Communities have taken actions that include simplifying permit processes, sponsoring farmers' markets, and collaborating with other community organizations like schools, hospitals, and churches. The communities of San Diego, Fresno, and Ceres, California have partnered with schools to hold farmers' markets on school premises. The Farmers' market at La Jolla Elementary School in San Diego, California has experienced great success with more than 100 vendors each week and is even considered a community hub. The market has also provided the school with funds for a new library and various educational programs. An alternative action may be incentive zoning. The District of Columbia uses incentive zoning to encourage farmers' markets in the commercial districts. Incentive zoning can provide bonuses to developers that create space for farmers' markets.

Communities can determine the location of farmers' markets that would be most beneficial for both the community members and the farmers. Permitting farmers' markets in as many zoning districts as possible allows for greater reach to all of the community. Emphasizing location of markets near schools, town centers, or public transportation depots may increase the visibility of the markets as well as the purchase of healthy foods. It is also important to include operating rules and other guidelines such as composting or bicycle storage requirements in the zoning laws to protect the public's health. Health permits or other permits may still be required so these would also need to be mentioned within the ordinance. Additional guidelines may also include payment type accepted by the markets. To increase access to healthy foods for lower income populations, it may be of interest for a community to require that all farmers' markets accept WIC and EBT forms of payment. To keep this requirement from discouraging producer participation in the markets, city officials may want to provide technical assistance for WIC and EBT acceptance.

By lessening location and permit restrictions and improving land protection for farmers' markets through simple zoning ordinances, community members can be able to access healthy foods more easily and conveniently.

Community Gardens/Urban Agriculture

According the National Policy and Legal Analysis Network (NPLAN), urban agriculture "is an umbrella term that describes a range of food-growing practices, from backyard gardens to urban farms." Agricultural activities most often take place in rural settings but it is achievable and beneficial for suburban and urban communities to take part in these activities as well. Urban agriculture can include community gardening, bee keeping, and raising of small livestock that can be for-profit or not-for-profit depending on the community. The benefits to a community involved in urban agriculture can be immense, affecting the economy and the health of the community members. Those who participate in community gardens, consume significantly more fruits and vegetables than non-gardeners and even home gardeners. Growing healthy foods directly in the
neighborhood creates better access for those that may not have it otherwise. Community gardens also have the potential to strengthen neighborhoods and engage community members.

Like farmers’ markets, it is necessary to clearly define urban agriculture, such as community gardens, within zoning regulations. Each community will differ on what urban agricultural activities are feasible for their city. The zoning laws must demonstrate which agricultural activities are allowed and where they can occur. Again, without this information within the zoning ordinances, all urban agricultural activities could be termed as illegal. Cities may choose to allow community gardens out right or as conditional uses. Out right provisions allow community gardens to exist without special approval as long as all specified regulations are followed. Kansas City, Missouri allows community gardens out right within several zones. With out right uses for gardens, more neighborhoods within a city have the opportunity to grow their own healthy foods. The City of Boston designated community gardens as a sub-district of open-space zones. The gardens are allowed on both private and public land as long as the owner consents. San Francisco allows community gardens on public park and recreation land as a way to increase access to healthy foods.

Conditional use for urban agriculture is used when gardens and other activities are allowed within a district but may not be permitted on all land within a district so condition use zoning requires that the landowner seek special approval. This allows for community input but can also be very expensive and time consuming and therefore a significant barrier to participating in urban agriculture. Some communities may not chose to create new zoning districts or sub-districts for urban agriculture but can still improve the communities’ food environment by listing agricultural activities as permitted uses within certain districts. Philadelphia chose this approach by listing community gardens as a permitted use of land within residential districts.

Protecting already existing gardens is important as well. Urban agriculture may be permitted within certain zones and districts but there is always the possibility that the land will be desired for other uses in the future. Land for community gardens can be protected with specific zoning designations that prevent redevelopment of the land in use. Designating land as open-space zones and permitting community gardens within the zoning language, creates protection for the gardens in the future since changing open-space zoned land requires additional action from city officials and possibly even involves a citizen vote in some cases. The example from the city of Boston mentioned previously demonstrates this level of protection. Also, Cleveland, Ohio’s planning officials require that community gardens must be rezoned before the garden is removed and the land is redeveloped as a way to protect the gardens. Other ways communities can instill more protection for community gardens is through land trusts or lease agreements.

Community gardens and other urban agricultural activities can have negative impacts on communities that are important to address within zoning regulations. Planning officials should be careful not to create major barriers to participating in these activities that have the potential to provide numerous benefits to the community while also being mindful of the safety and concerns of the entire community. Some necessary requirements or regulations may include fencing, weight maximums for rooftop gardens, minimal land amounts, and restrictions or forbiddance of sales on site. Many of these requirements may be essential for conducting successful urban agriculture to
sustain other health concerns. An example of necessary restrictions that do not unreasonably inhibit participations can be found in Portland, Oregon where selling produce from community gardens is prohibited in order to prevent competition with the already existing farmers’ markets and businesses. Regulations and requirements are likely needed in most cities but excessive amounts of restrictions may deter gardeners from participating. Finding the balance between what is allowed and what must be restricted is vital for successful urban agriculture.

Fast Food Establishments

Fast food restaurants are known as a popular source of unhealthy foods. Many cities have placed bans or restrictions on these establishments for reasons other than health, such as noise, traffic, or general appearance. The towns of Calistoga, Truckee, and Cotati in California prohibit fast food restaurants to uphold their downtown areas’ character. Other cities have decided to utilize zoning laws to limit or ban fast food establishments within certain districts or near schools and other public facilities for various reasons. Whatever the reason may be, community members benefit from these bans and restrictions.

There are several methods for reducing access to unhealthy foods from fast food establishments. They can be banned all together, limited by number or density, or restricted by distance from other locations such as schools. Each city will differ in the approach to limiting fast food establishments depending on the overall goal, political climate, and the ease of obtaining special use permits.

Banning Fast Food Establishments

If a city chooses to ban fast food restaurants, there are three primary ways to accomplish this through zoning. The first is a direct ban, meaning all fast food establishments are prohibited in any or all designated locations. Concord, Massachusetts bans all “fast-food and drive-in service.” Definitions of fast food, drive-ins, and other related terms must be provided in the zoning language. These definitions may vary slightly from city to city but all are beneficial to include in the zoning laws. The second way to ban fast food is by using an indirect ban that occurs when fast food establishments are not prohibited out right but they are also not listed as a permitted use. This leaves room for fast food to be permitted in the future. Lastly, a mixed approach can be utilized when fast food establishments are not banned but must acquire a special use permit. Newport, Rhode Island uses a mixed approach by allowing fast food restaurants with a special use permit in four out of five of their districts but prohibits drive-in and carry-out services. Prohibiting drive-in establishments may deter fast food establishments from building at since about 60 percent of business occurs through the drive-in service.

A step beyond banning fast food establishments is to ban all formula restaurants, which are also called chain restaurants; fast food falls under the formula restaurant category. Nantucket, Massachusetts has banned any new national chain restaurants from being operated in the downtown area. Mount Carmel, California was the first town in the nation to ban all formula restaurants. The town of Calistoga, California, that was previously mentioned, banned all formula restaurants, including fast food, and regulated all other formula businesses to maintain the historic character that is vital to the tourist economy in the area. Formula restaurants are known to
provide highly processed calorie dense, high-fat foods, with added sugars and salt so by preventing these establishments from entering the food environment, there is protection for community members’ health and a reduction in access to unhealthy foods. Most cities that introduce new zoning regulations to ban fast food or all formula restaurants allow the already existing establishments to remain in place due to the controversial and costly process of eliminating them.

Limiting Fast Food Establishments

There are other zoning options to limit unhealthy foods in a community without completely banning certain establishments. Limitations or restrictions such as the location, number, and/or density of fast food establishments within a community can be determined using zoning laws. Cities may decide to focus efforts around specific areas of the community like schools, parks, and/or public libraries. Research has shown that students attending schools within a half-mile of fast food restaurants consume more sugar-sweetened beverages, less fruit and vegetable servings, and are more likely to be overweight or obese compared to students attending schools with a greater distance to fast food restaurants. Zoning laws can be used to create distance between students and these unhealthy foods. Detroit, Michigan officials were concerned about marketing of and exposure to unhealthy foods to children so the city now requires a minimum of 500 feet between most fast food restaurants (drive-in and carry-out) and all schools. Some cities may decide that limiting the total number of fast food establishments is best for their community. The City of Arcata, California allows nine fast food restaurants at one time to limit the number of fast food restaurants. Density of fast food restaurants in a city or certain area can also be limited using zoning laws that specify the number of fast food establishments per capita, square footage, or building. Bainbridge Island, Washington uses density restrictions, among others, to limit fast food establishments by requiring “formula take-out food restaurants” to share a building with another business that is not a formula take-out food restaurant while also prohibiting drive-thru facilities.

A highly publicized example is found in Los Angeles, California. The city began a one year "moratorium" or hold on the development of new fast food restaurants in 2008. The zoning actions took place in low-income areas of southern Los Angeles that have the greatest density of fast food establishments. The goal of the moratorium was to allow time for the city to attract healthier food retail options to the areas with limited access to healthy foods and an overabundance of unhealthy foods. Los Angeles chose not only to limit fast food restaurants but also to incentivize healthy retail options to create a better balance in the food environment. The city is now considering a more permanent ban on fast food restaurants.

Healthy Food Retail

Increasing the amount of healthy food retail options has the potential to improve eating habits within a community. A multistate study revealed that for each supermarket in existence within a census district, consumption of produce increases by 11 percent for white Americans and 32 percent for African Americans. The lowest rates of overweight and obesity are found among communities with access to only supermarkets and grocery stores and the highest rates are among populations with no access to supermarkets. Often times eating habits and obesity rates are not primary reasons for actions taken by city officials. City officials may be more encouraged by the
economic benefits that supermarkets can bring to underserved neighborhoods. The state of Pennsylvania found that bringing new or rejuvenated grocery stores to areas in need sustained nearly 5,000 jobs and bolstered economic activity in the surrounding areas. New or amended zoning regulations have the ability to aid in the development or revitalization of supermarkets and grocery stores so that more of the population has access to healthier foods.

Not only do city planning officials need to be convinced of the need for supermarkets but also the supermarkets themselves do. There is often concern over the potential for success in underserved areas; therefore, both supermarket owners and city officials need to be committed to completing the development and working out the issues that arise. The cost of developing a supermarket differs depending on the area. Urban development is often more expensive, creating a hindrance for supermarket development despite the need. Zoning laws can be amended to relieve some of the financial and other regulatory barriers that inhibit supermarket development. The New York City’s FRESH Program utilized a combination of zoning and financial incentive to encourage development of grocery stores in underserved neighborhoods. Zoning regulations were amended to allow for more square footage within mixed use buildings for grocery stores, decreased requirements for parking in areas with pedestrian traffic, and eliminated the need for costly and time consuming special permit processes in certain areas.

Other options for cities are to identify land to be used for this purpose and to provide financial incentives to supermarket chains if needed. Baltimore, Maryland city officials have located vacant land around the city to offer to supermarket chains for development. Chicago, Illinois chose to simplify the permit process to encourage retail development. The state of Nevada offered a temporary tax incentive in 2005 to increase the number of grocery stores in the southern parts of the state. Zoning incentives could be combined with tax incentives or other funding programs to attract supermarkets or grocery stores to underserved areas.

Mobile food carts or street vendors have the ability to increase access to healthy foods in underserved areas as well. When supermarkets and grocery stores my not be feasible in a neighborhood, these smaller retail options can become a more accessible source for healthy foods. New York City allows “NYC Green Carts” to sell only fresh fruits and vegetables in areas with limited access to these foods. Permits are required and the number of permits granted is limited. By restricting the sales to only fresh fruits and vegetables, access to healthy food is increased but access to unhealthy foods is restricted since in general many mobile carts are known for serving less healthy food options. Whether through supermarkets of mobile food vendors, access to healthy foods can be improved within cities lacking balance in the food environment.

Zoning Opportunities for Spokane, Washington

The city of Spokane, like many other cities in the United States, is faced with an unbalanced food environment with low-income neighborhoods that have limited access to supermarkets and areas that are dense with corner stores and fast food restaurants. There are both strengths and limitations found within Spokane’s zoning laws related to healthy food access and there are
opportunities for revisions that have the potential to improve the health of Spokane's citizens. New zoning laws and revamped zoning laws can be utilized to strengthen the food environment for all residents. Identifying the areas or neighborhoods with limited access to sources of healthy foods such as supermarkets, farmers' markets, and gardens allows city officials to determine the best, feasible zoning tactics to construct the greatest improvements. The city of Spokane has many assets for conducting a food environment assessment and identifying improvement strategies including the Spokane Regional Health District and a Food Access Coalition.

Community Gardens / Urban Agriculture

Spokane utilizes four major zoning districts: residential, commercial, industrial, and mixed use or center/corridor zones. Residential, commercial, and mixed use zones are most relevant to the food environment for those living in Spokane. One major strength of the city's zoning is that both home and community gardens are permitted within all zoning districts, even residential. The city offered up land surrounding four water pumphouses which are found in most of the city's neighborhoods as part of the aquifer system. The grounds are maintained by the city and many of the pumphouses have ample land to support a garden. There are also plans for the completion of two gardens in public parks. Community gardens are clearly valued in the city of Spokane which is a positive food environment attribute.

The city supports urban agriculture even further by permitting the raising of chickens and keeping of bees in all zoning districts with some limitations within commercial and mixed use zones. The support of agriculture within the city of Spokane encourages a more balanced food environment where community members are able to grow or raise healthy foods for themselves and others in their neighborhood. Spokane's community garden network sets a great example for other communities.

Farmers' Markets

According to Spokane City Planner, Dave Compton, farmers' markets are currently considered as retail sales and services; therefore, they are only permitted in commercial and mixed use areas as of now. Since residential areas in Spokane typically surround mixed use areas, this allows greater access to local, healthy foods to those living or working within walking distance of the markets. Also, less densely populated areas just outside of the city lack access to healthy food retail but ironically much of the agricultural activities occur in these areas. Zoning laws allow farmers and producers to sell their products on site and therefore provide greater access to healthy foods in more rural areas of Spokane.

Although farmers' markets are allowed in two major districts within the city, there are barriers that may discourage farmers and producers from participating in the markets. Zoning laws require farmers and producers to obtain costly permits to sell items. Obtaining parking permits to be used during the market hours and the frequent renewal process is also a barrier for some farmers. There are a few options for Spokane to consider for strengthening their farmers' market network. Defining farmers' markets separately from other retail sales and services and allowing them into all possible districts, especially residential, could increase access to healthy food among
neighborhoods that mainly have access to convenience stores. City planners of Spokane could also identify or designate land to be used for farmers' markets long-term so that the farmers and producers do not have to be as concerned about identifying a location and frequently acquiring multiple permits. Finally, simplifying the entire permit process and reducing costs for farmers and producers, to a feasible extent, may encourage greater participation.

Other weaknesses of Spokane’s zoning laws involve limitations to food retail. Excluding all retail from residential districts limits access to healthy foods especially for low-income communities that may lack transportation and other resources needed to access supermarkets and grocery stores found in other districts. In addition to this, retail businesses are limited to the amount of space allowed within commercial districts. This may discourage supermarket chains and grocers from developing in these areas within Spokane. For residents that rely on these areas to obtain food and groceries, a barrier is created to accessing affordable foods for a healthy diet. On last weak area of zoning is that Spokane’s zoning laws minimally limit fast food establishments.

**Healthy Food Retail**

Retail, including food retail like grocery stores, is allowed within mixed use areas and commercial districts. Mixed use districts must not extend more than two city blocks from the center of a transportation corridor according to current zoning laws. This requirement may ensure that more of the community can access these areas where food retail is available. Creating access to retail in this way is beneficial for Spokane residents but may still limit healthy food retail to those with transportation and/or time restraints. These factors are possible to assess and can then be addressed within the zoning laws to provide access to healthy foods to as many citizens as possible.

Spokane city officials and community members may find it helpful to identify available land for supermarkets or grocery stores within residential zones or other zones that have limited access to healthy foods. Vacant buildings or lots are possible locations to consider that can be presented to developers. Decreasing parking space requirements for potential new supermarkets may be another option in many areas since there are several neighborhoods within Spokane with increased pedestrian activity. The neighborhoods that rely heavily on walking for transportation could greatly benefit from acquiring a supermarket or grocery store nearby.

Retail businesses are allowed in mixed use districts and many of these zones in Spokane have neighborhood centers. There are current restrictions on the square footage allowed for retail in these centers that are based on other concerns. Since this could be a barrier to acquiring supermarkets and grocery stores to areas in need, re-evaluation to reduce these limitations may be beneficial. Other food retail such as fast food establishments are also allowed within the mixed use and commercial districts and are often unaffected by the square footage limitations. Therefore, there may be more convenient access to fast foods than healthy foods within the mixed use districts.

**Fast Food**

Creating a specific limitation on where fast food establishments may be located and how many are allowed is another option for Spokane. Accessing where current fast food establishments are
located may present target areas to focus on. Limiting these establishments near schools and other public areas could be a more feasible place to begin. Several areas within Spokane are working toward more pedestrian traffic and less automobile traffic so by restricting drive-in services both goals of less automobile traffic and a healthier food environment could be achieved.

**Conclusion**

As discussed throughout this brief, food environments are lacking in healthy food retail options and bombarded with inexpensive, unhealthy foods in many areas of the United States. Low-income populations tend to experience these poor food environments more so and suffer from greater rates of obesity and chronic disease. Each city has the power to develop in the most appropriate way seen fit and the commitment to protect the health and wellbeing of each resident. Zoning regulations are a primary method used for carrying out those actions. New zoning laws can be created and/or existing ones amended to provide more farmers’ markets, urban agriculture activities, healthy food retail options to community members and to reduce the amount of unhealthy foods, like fast food, within the food environment.

Spokane, Washington has numerous assets for creating a healthy food environment such as already existing farmers’ markets, citywide community gardens, and the walkability of many areas in the city. By identifying the underserved areas within Spokane, zoning efforts can be targeted to the populations in need of greater access to affordable, healthy foods. Spokane city officials have the ability build upon their strengths to expand farmers’ markets into underserved areas, lighten regulations and permit processes to increase healthy food retail options, and limit the location and number of fast food establishments. With a few zoning amendments and the introduction of some additional zoning laws, Spokane can create an even healthier food environment.
References:


