

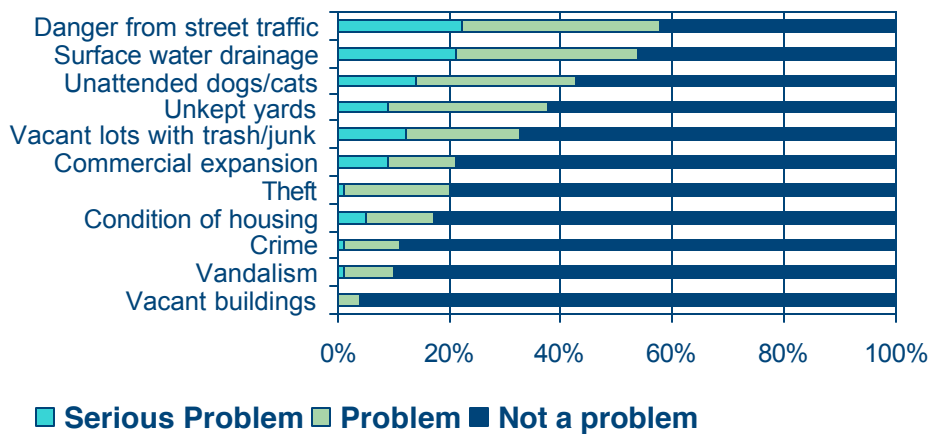
APPENDIX

UTAH STATE UNIVERSITY – EXTENSION

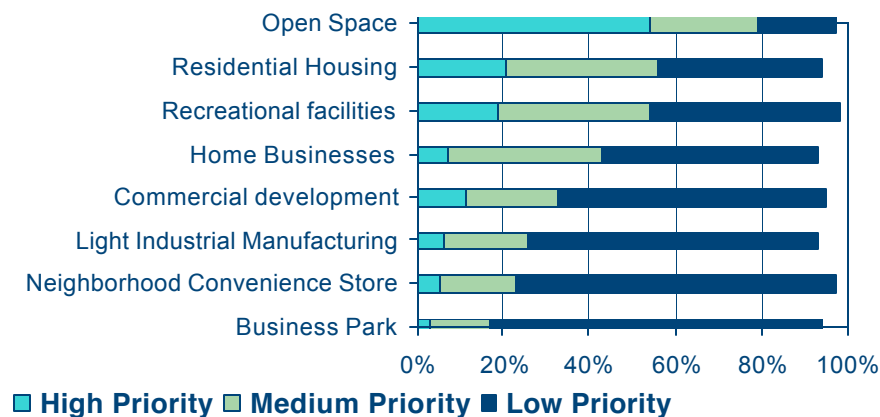
Elwood Town Survey

A. Planning

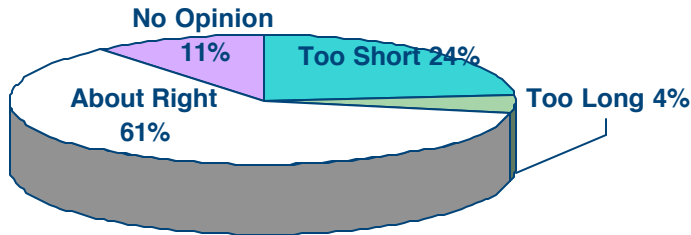
1. Which of the following conditions are a serious problem, a problem, or not a problem in your neighborhood?



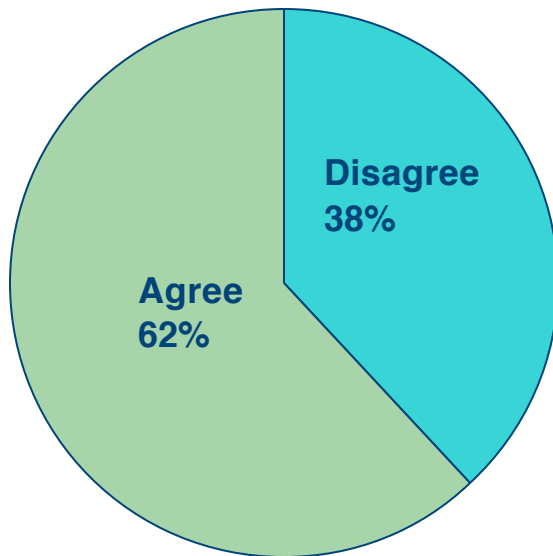
2. What priority should the Town of Elwood give to the development of each of the following?



3. The current minimum lot frontage in Elwood for a residential lot is 120 feet. Is this frontage:



4. The minimum lot size of a residential lot in Elwood is ½ acre. Do you agree with this minimum lot size?

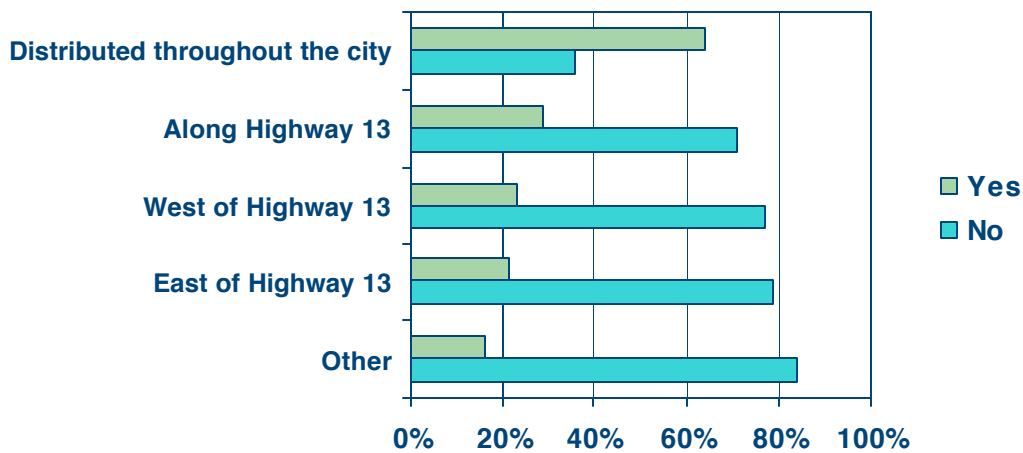


5. Please rank in order, your preference for land use in Elwood with 1 being your first preference and 6 as your last

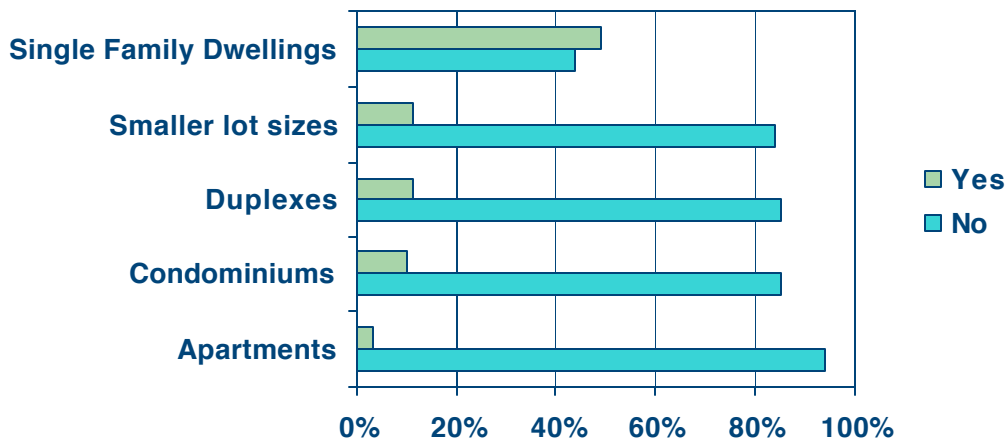
	RANK	MEAN
- Agriculture	1 st	(1.30)
- Residential	2 nd	(2.39)
- Recreation	3 rd	(3.41)
- Business	4 th	(3.95)
- Manufacturing	5 th	(4.96)
- Other	6 th	(5.03)

B. RESIDENTIAL DEVELOPMENT

1. Where would you like future residential growth in Elwood to occur:



2. Would you favor higher density housing in your area if it were to occur in one of these forms:

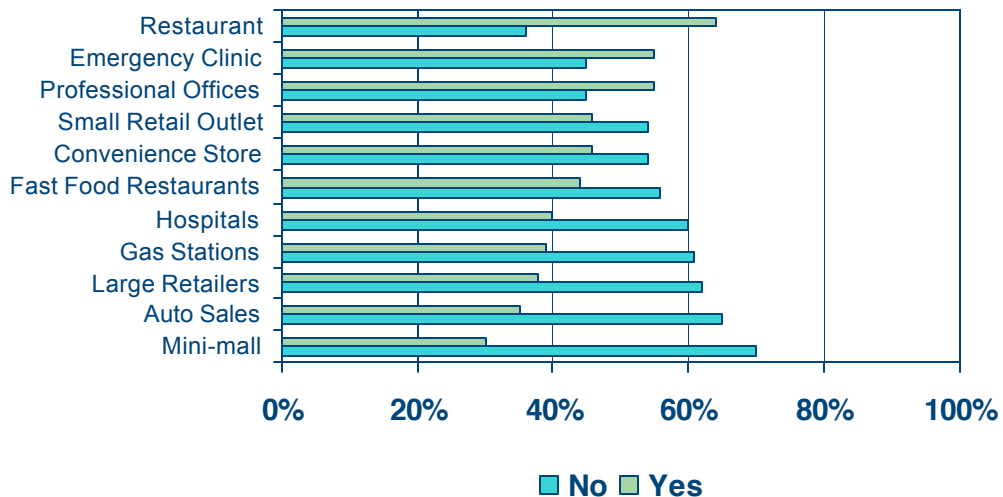


3. Experience has shown that fees and taxes generated from residential expansion seldom covers the costs of increased residential services. The following methods of financing have been used to cover current or projected residential growth. Elwood has the 3rd lowest taxes in the county. Please rank these in order of your preference with 1 being first and 7 being last.

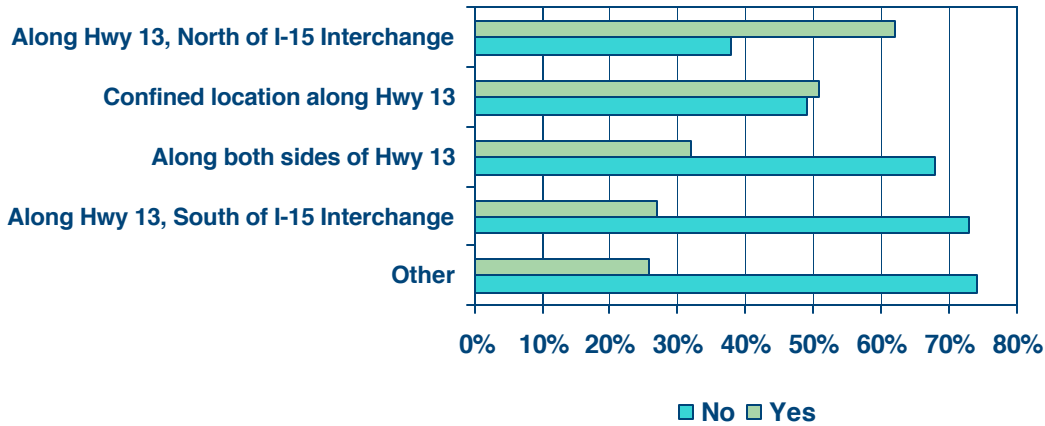
	RANK	MEAN
- Increase impact fees	1 st	2.71
- Increase tax base through business and industrial growth	2 nd	3.11
- Increase residential fees	3 rd	3.23
- Increase business taxes	4 th	3.58
- Increase business fees (license)	5 th	3.60
- Other	6 th	5.05
- Increase residential property taxes	7 th	5.63

C. COMMERCIAL DEVELOPMENT

1. What types of development would you favor in commercially zoned areas:

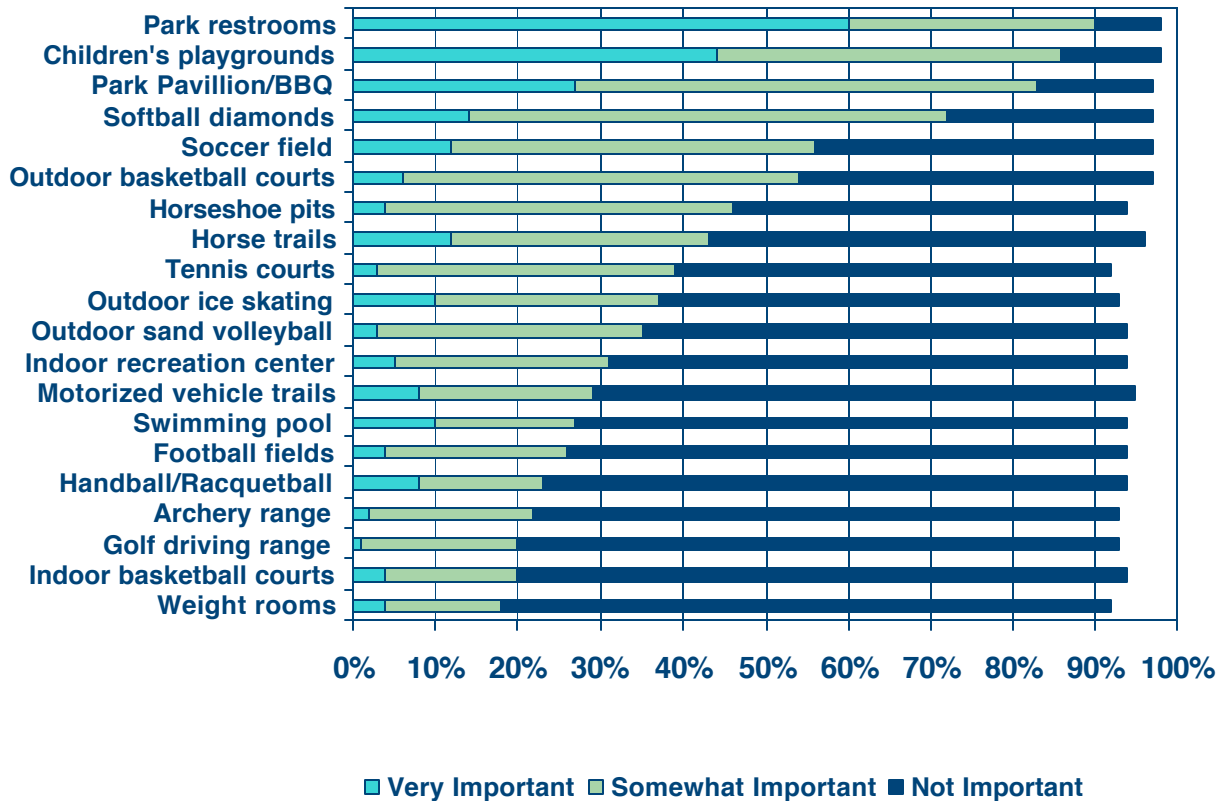


2. Where would you like future commercial development to be located in Elwood?



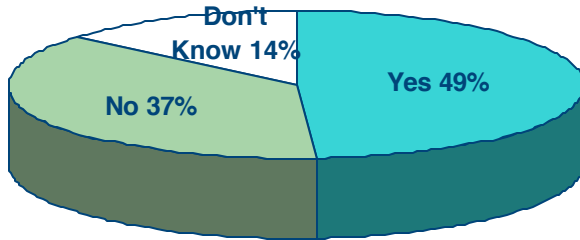
D. RECREATION

1. On each of the following park and recreation items indicate if it is VERY IMPORTANT, SOMEWHAT IMPORTANT, OR NOT IMPORTANT to have in Elwood:

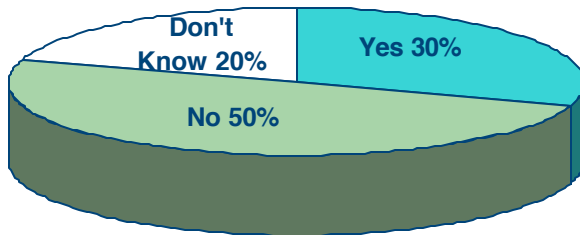


E. TRANSPORTATION

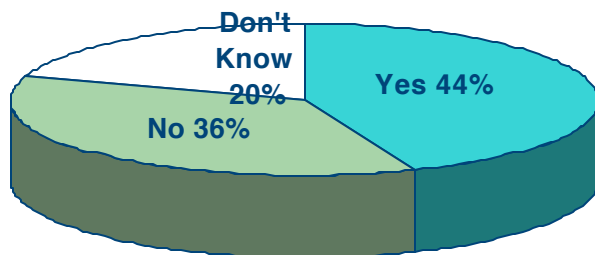
1. Should Elwood plan for roads to link subdivisions together?



2. Should Elwood plan a north/south corridor road for an alternative to driving on Highway 13?

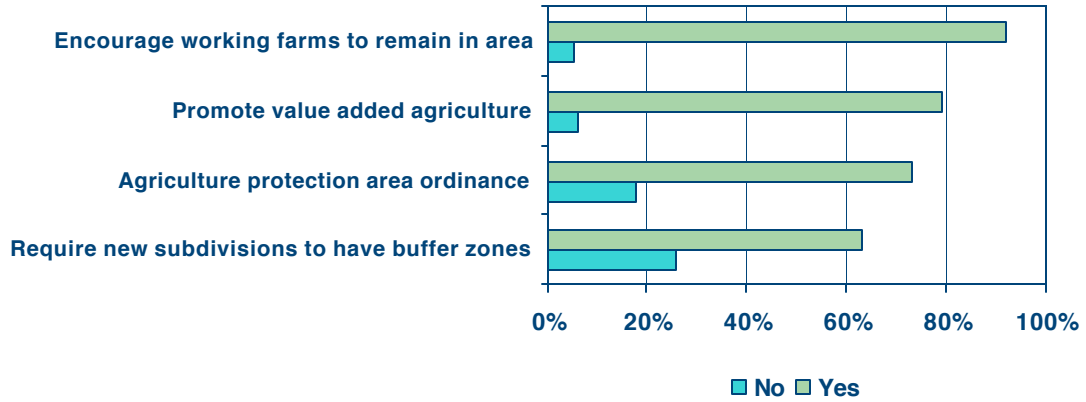


3. Should Elwood participate in a county wide transit system in Box Elder County?

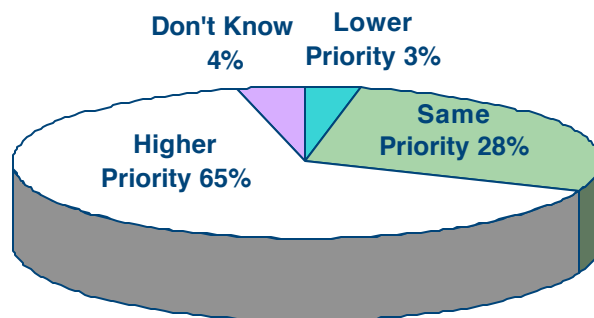


F. AGRICULTURE

1. Should Elwood do any of the following to help preserve agriculture in Elwood:

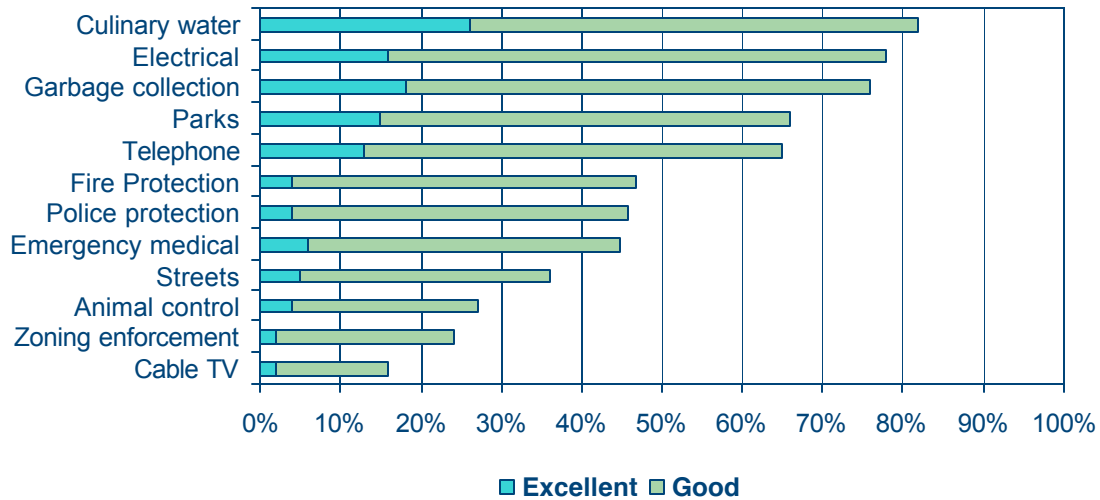


2. Compared to what is being done now, what priority should farmland preservation have in the years ahead?

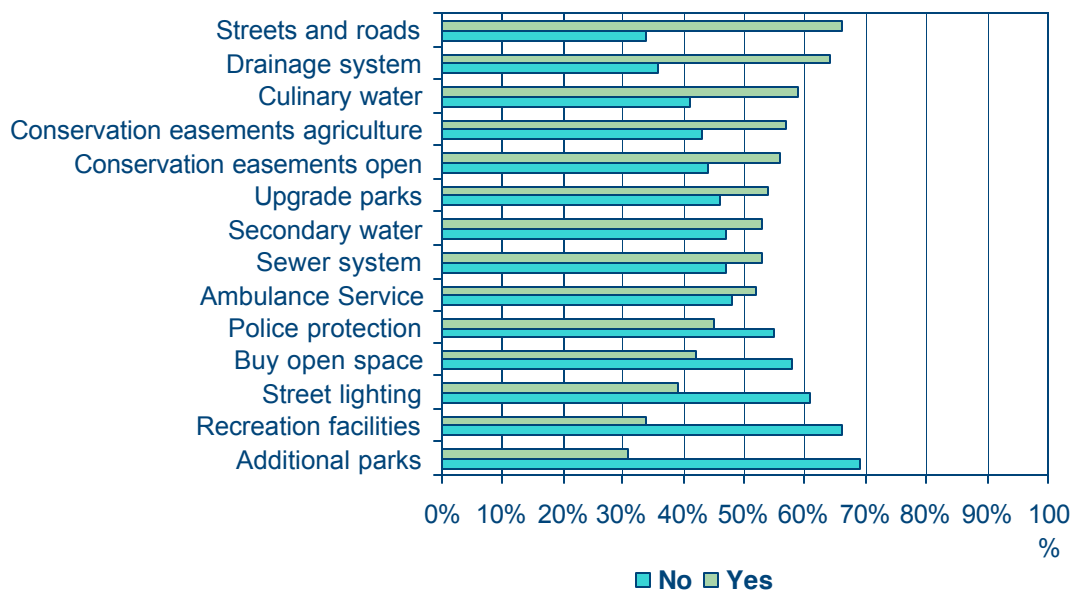


G. CITY SERVICES

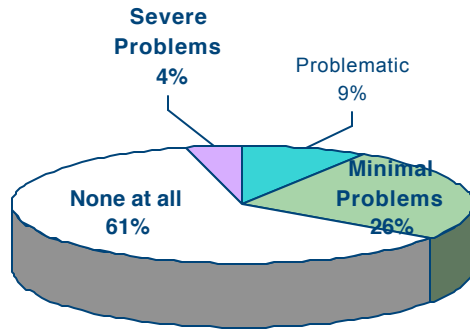
1. How would you rate the following services in Elwood:



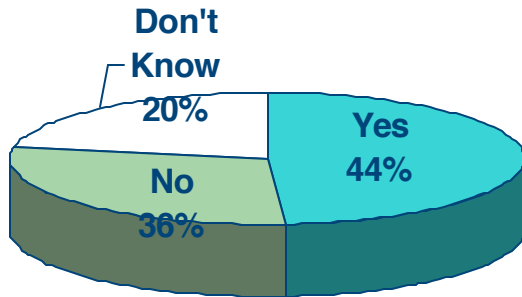
2. Below is a list of services that generally require taxes for maintenance and construction. Would you be willing to pay more taxes if you knew the money would be spent in Elwood for that particular purpose?



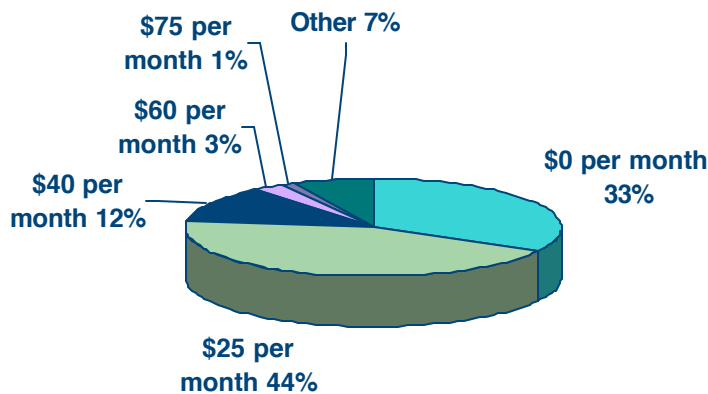
3. Sewage in Elwood is currently handled by the use of onsite septic systems. Have you experienced any problems with your septic system?



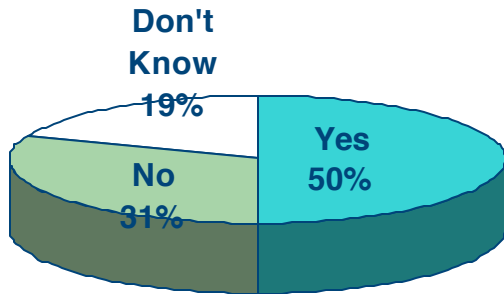
4. The City is considering a sewer system. Do you think the city should develop a sewer system?



5. What would be the maximum amount you would be willing to pay monthly for sewer?

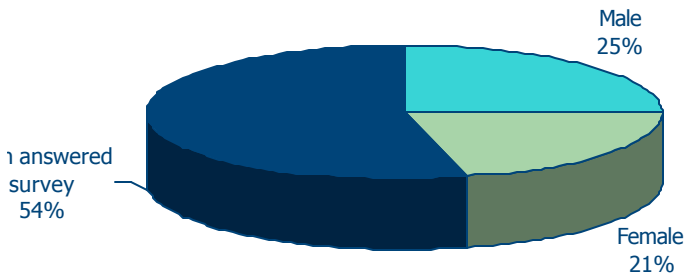


6. The City is considering a secondary water system. Do you think the city should develop a secondary water system?

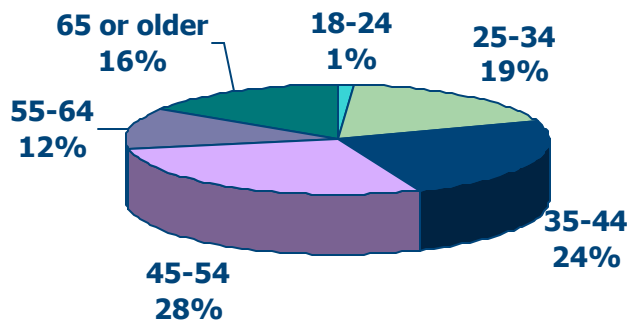


H. NOW A FEW QUESTIONS ABOUT YOURSELF

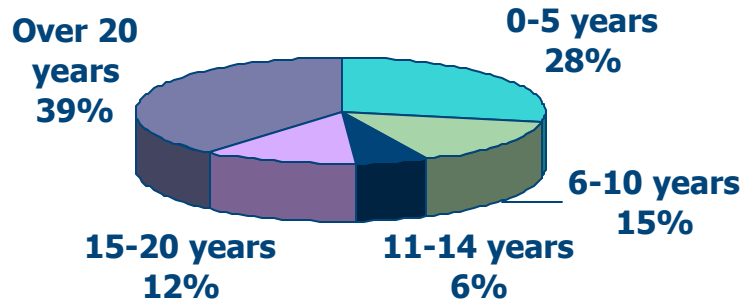
1. Gender of Respondents



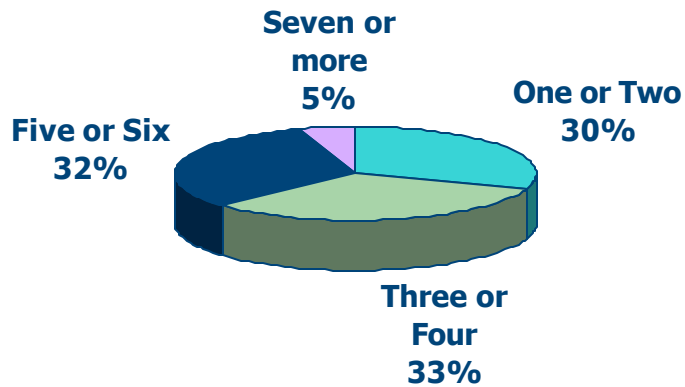
2. Age of the Head of Household



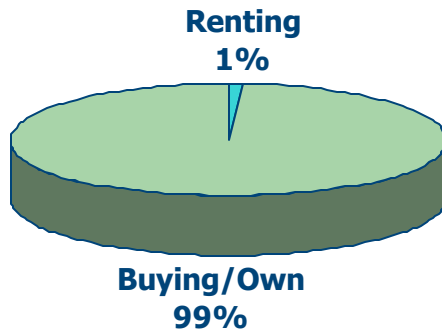
3. Years lived in Elwood



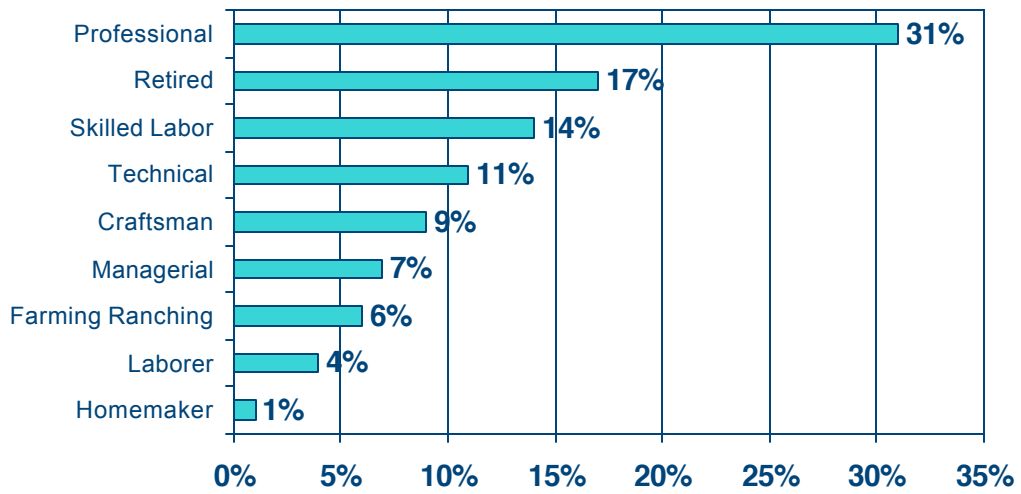
4. Number of family members residing in home.



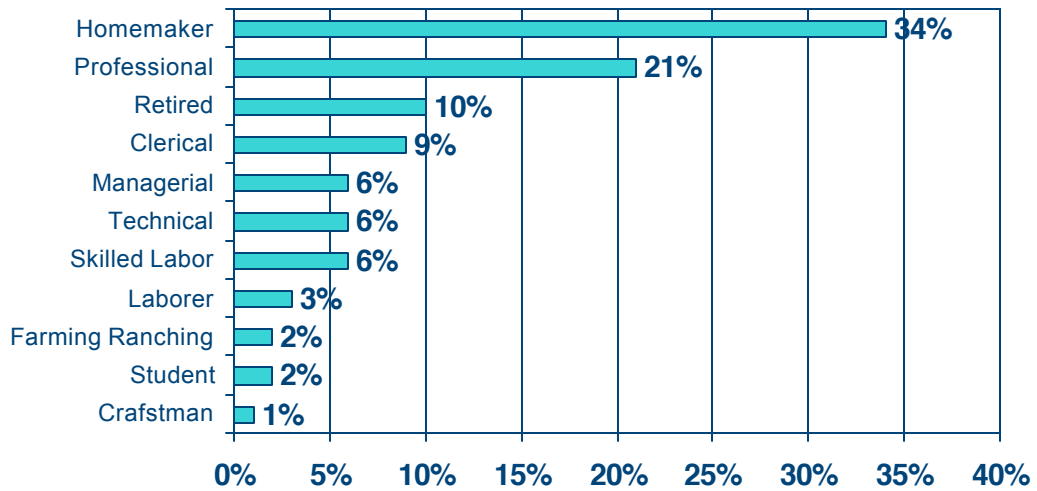
5. Housing Status



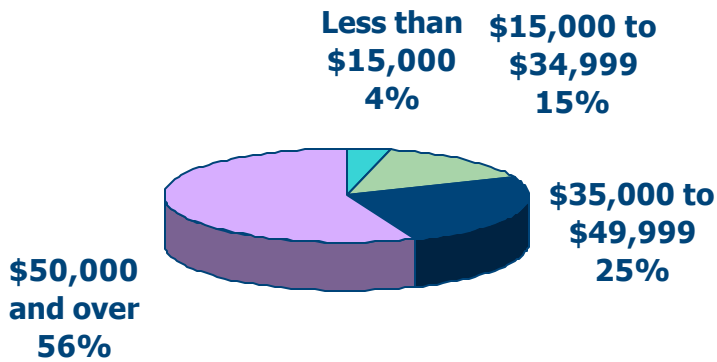
6. 1ST Head of Household Occupation



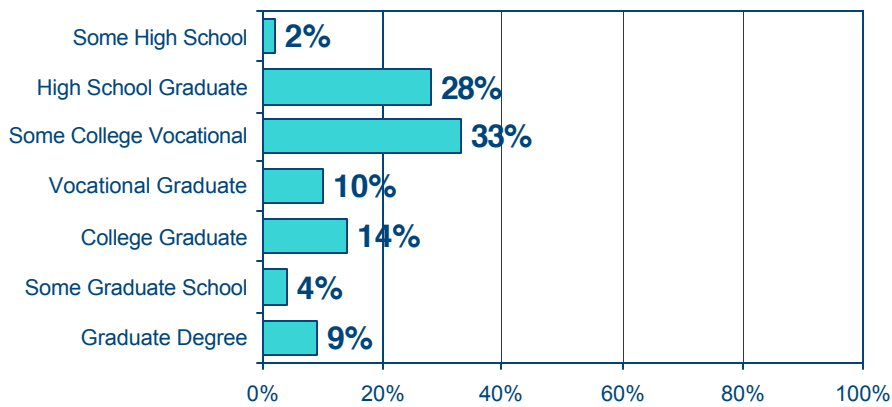
7. 2nd Head of Household Occupation



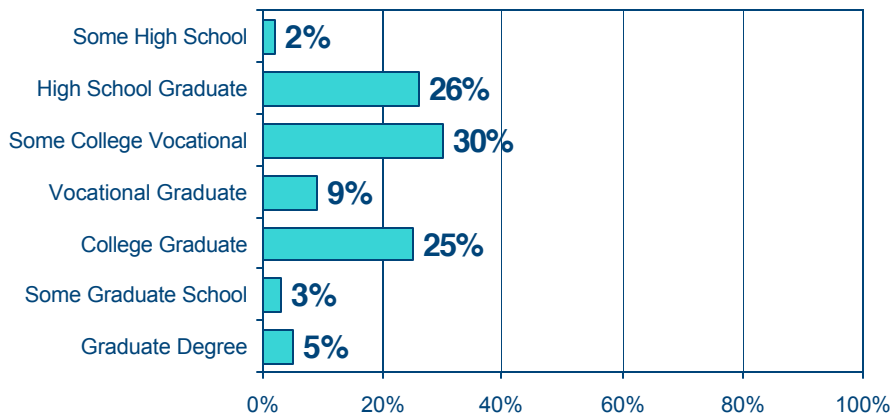
8. Total family income



9. Levels of Education 1st Head of Household



10. Levels of Education 2nd Head of Household



DESCRIPTION OF SOIL TYPES

Soil Survey Box Elder County, Utah (Eastern Part)

Airport silt loam (Ao): This soil is on lake plains and low lake terraces in the valleys of the Bear River and the Malad River valleys. Slopes are 0 to 1 percent. This soil consists of somewhat poorly drained soils that are affected by alkali. The natural vegetation in noncultivated areas is saltgrass, alkali sacaton, and greasewood. This soil is used for irrigated crops and range. Irrigated crops are alfalfa, sugar beets, small grains, corn for silage, and pasture. Runoff is slow, and the hazard of erosion is slight.

Collett silty clay loam (Co): This soil is on broad, low lake terraces and lake plains in the Bear River valley. Slopes most commonly are less than 1 percent but may range 0 to 2 percent. Permeability is slow to a depth of 23 inches and is moderately slow below that depth. This soil is used for irrigated alfalfa, small grains, corn for silage, sugar beets and irrigated pasture. Runoff is slow, and the hazard of erosion is slight. Most areas of this soil have been leveled and tile drained. Where the soil is not drained, the water table is at a depth of 40 to 50 inches or more.

Fielding silt loam (Fe): This soil is on broad valley plains and alluvial fans adjacent to the valley plains. Slopes most commonly with this soil range 0 to 3 percent. The natural vegetation is bluebunch wheatgrass, Great Basin wildrye, big sagebrush, western wheatgrass and annual grasses. This soil is used for irrigated tomatoes, sugar beets, alfalfa, small grains, corn for silage, irrigated pasture and truck crops. Runoff is slow, and hazard of erosion is slight.

Fresh water marsh (FT): Is a miscellaneous land type that occurs in natural depressions and manmade ponded areas. These marsh areas are on nearly level valley plains and along stream flood plains, where seasonal runoff accumulates and no surface drainage outlet is available. These areas are covered by fresh water most of the year, but when they are not covered they have a water table within 12 inches of the surface. Vegetation in these areas are dominantly sedges, cattails, and bulrushes. Fresh water marsh is well suited to use as wildlife habitat. Many of the areas are being managed for use by migratory waterfowl and the trapping of muskrats. Some areas are used as range for cattle in winter.

Greenson silt loam, clay substratum (Gr): This soil is on broad, low lake terraces and lake plains in the Bear River valley south and west of Tremonton. This soil consists of somewhat poorly drained soils. Slopes for this soil type range from 0 to 1 percent. Natural vegetation for these areas are mainly saltgrass, alkali sacaton, greasewood, alkali bluegrass, and some foxtail and sedges. This soil is used for irrigated alfalfa, small grains, sugar beets, corn for silage, tomatoes, and irrigated pasture. Runoff is slow, and the hazard of erosion is slight. The rate of water intake is moderate.

Honeyville silty clay loam (Ho): This soil is on broad, low lake terraces and lake plains in Bear River Valley south and west of Garland. Slopes are 0 to 1 percent. The natural vegetation in these areas include western wheatgrass, Great Basin wildrye, big sagebrush, and annual weeds. This soil is used for irrigated alfalfa, small grains, sugar beets, corn for silage, tomatoes, and irrigated pasture. Runoff is slow, and the hazard of erosion is slight. Most areas of this soil type has been leveled and tile drained.

Kearns silt loam, 3 to 6 percent slopes (KeC): This soil is on terraces and broad, long alluvial fans. The natural vegetation for this soil type include mainly bluebunch wheatgrass, Sandberg bluegrass, big sagebrush, cheatgrass and annual weeds. This soil is mainly used for nonirrigated small grains. Small areas are used for irrigated alfalfa, small grains, corn for silage, tomatoes, and irrigated pasture and also for wildlife habitat. Runoff is slow, and the hazard of erosion is slight in nonirrigated areas and moderate in irrigated areas.

Kearns silt loam, 10 to 20 percent slopes (KeE): This soil type is on alluvial fans. The slopes are convex and short. The natural vegetation for this soil type include mainly bluebunch wheatgrass, Sandberg bluegrass, big sagebrush, cheatgrass and annual weeds. This soil is used for nonirrigated small grains and wildlife habitat. The runoff is rapid, and hazard of erosion is high. Rill erosion is common, and there are a few shallow gullies.

Kidman fine sandy loam, 0 to 2 percent slopes (KIA): This soils is on broad, low lake terraces in the Bear River Valley. The natural vegetation for this soil type include mainly bluebunch wheatgrass, western wheatgrass, sagebrush, cheatgrass and annual weeds. This soil is used for irrigated sugar beets, corn for silage, tomatoes, and irrigated pasture alfalfa, apples, stone fruits, and some truck crops. Runoff is slow, and the hazard of erosion is slight.

Kidman fine sandy loam, 2 to 4 percent slopes (KIB): This soil is on medium-length, mainly west-facing slopes on low and intermediate lake terraces. The natural vegetation for this soil type include mainly bluebunch wheatgrass, western wheatgrass, sagebrush, cheatgrass and annual weeds. This soil is used for irrigated sugar beets, corn for silage, tomatoes, and irrigated pasture alfalfa, apples, stone fruits, and some truck crops. Runoff is slow, and the hazard of erosion is slight.

Kirkham silt loam (Kr): This soil is on flood plains and low river terraces along the Malad River and Bear River. Slopes are 0 to 2 percent. The surface is quite uneven where the soil has not been leveled. The natural vegetation in noncultivated areas is saltgrass, foxtail, wiregrass, Great Basin wheatrye, alkali mallow, sourdock, povertyweed, cheatgrass and greasewood. This is used for native pasture and irrigated crops. Where flooding is controlled and the soil drained, it is used for irrigated small grains, corn for silage, alfalfa and improved pasture. Runoff is slow, and the hazard of erosion is slight. This soil is subject to overflow or flooding in spring

Martini fine sandy loam (ME): This soil is on low river terraces and flood plains, mainly as small parcels on the oxbows along the Bear River. Slopes are 0 to 2 percent. The natural vegetation for this soil type include mainly, boxelder, willow, rose, western wheatgrass, Great Basin wildrye, sagebrush, and cheatgrass. This soil is used for irrigated alfalfa, small grains, sugar beets, corn for silage, tomatoes, and irrigated pasture. Some areas are use for nonirrigated small grains and range. Runoff is slow, and hazard of erosion is slight. This soil is subject to overflow or flooding early in spring in about 4 out of 10 years.

Parleys loam 0 to 3 percent slopes (PbA): This soil is on broad, low and intermediate lake terraces and alluvial fans in the the Bear River Valley south of Garland. The natural vegetation for this soil type include mainly bluebunch wheatgrass, western wheatgrass, Big sagebrush, yellowbrush, phlox, balsamroot and annual grasses. This soil is used for irrigated small grains, sugar beets, alfalfa, tomatoes, corn for silage, irrigated pasture and orchards. It is also used for urban development and wildlife habitat. Runoff is slow, and the hazard of erosion is slight. This soil is well drained

Roshe Springs silt loam (Ru): this soil is on low lake terraces and flood plains that receive runoff from adjacent areas. Slopes range from 0 to 3 percent but most commonly are 0 to 1 percent. The natural vegetation for this soil type include mainly wiregrass, sedges, saltgrasses, and foxtails. This soil used for range and irrigated crops. The irrigated crops include corn for silage, small grains, alfalfa, sugar beets, and improved pasture.

Rough broken land (Rv): Rough Broken land is a miscellaneous land type that consists of very steep escarpmentlike breaks into river bottom land. It also is on very steep drainageways or v-shape tributaries. Geologic erosion is active, and runoff is very rapid. Soil slipping is common, and the steep slopes have a succession of short, vertical exposures. The lands are used for wildlife habitat and limited grazing. It has little or no value for farming.

Sunset silt loam (Sy): This soil is along the Bear River on low river terraces and flood plains. Slopes are 0 to 2 percent, and the surface is uneven where the soil has not been leveled. The natural vegetation for this soil type include mainly willow, rose, western wheatgrass, Great Basin wildrye, saltgrass, foxtail, provetyweed, cheatgrass, and annuals. This soil is used for mainly for irrigated alfalfa, small grains, sugar beets, corn for silage, and improved pasture. Runoff is slow and the hazard of erosion is sligh. This soil is subject to overflow and flooding early in the spring in 4 out of 10 years.

Timpanogos loam, 0 to 3 percent slopes (TmA): This soil is on low and intermediate lake terraces and alluvial fans in the Bear River Valley south of Garland. The natural vegetation for this soil type include mainly bluebunch wheatgrass, western wheatgrass, big sagebrush, and annual grasseses. This soil is used for irrigated sugar beets, tomatoes, alfalfa, small grains, corn, truck crops, and irrigated pasture.

Timpanogos loam, 3 to 6 percent slopes (TmB):

This soil is on low and intermediate lake terraces and alluvial fans in the Bear River Valley south of Garland. The natural vegetation for this soil type include mainly bluebunch wheatgrass, western wheatgrass, big sagebrush, and annual grasseses. This soil is used for irrigated alfalfa, small grains, corn for silage, sherries, apples, apricots and irrigated pasture. Runoff is slow and the hazard of erosion is slight.

Water (W):

These are areas of open water.

EXISTING TRANSPORTATION FACILITIES

Congestion Management

A congestion management system is used to reduce congestion on the existing transportation facilities. Some examples of projects done under a congestion management system are signal coordination, park and ride lots, ridesharing and alternative transportation modes. In addition to these project the use of access management and corridor preservation techniques along existing and future transportation facilities help to reduce congestion within the transportation system.

Access Management

Access management is the planning, design and implementation of land use and transportation strategies that control the flow of traffic between the road and surrounding land. It applies traffic engineering principles to the location, design and operation of access drives serving activities along a highway. It evaluates the suitability of providing access to a given road, as well as the suitability of a site for land development. It addresses the basic questions—when and where access should be located, how it should be designed, and the procedures needed to administer the program. In broad context, access management is resource’s management, since it is a way to anticipate and prevent safety problems and congestion.

Access management can bring significant benefits to the community, such as:

- Postponing or preventing costly highway improvements
- Improving safety conditions along highways
- Reducing congestion and delays
- Providing property owners with safe access to highways
- Promoting desirable land use patterns

- Making pedestrian and bicycle travel safer

Streets and highways are an important resource and represent a major public investment that should be preserved. Poorly coordinated circulation systems force more trips onto the arterial roadways. This results in multiple traffic conflicts, increased congestion and a decline in traffic and pedestrian safety. This generates a demand for roadway improvement and the cycle begins again. Failure to address the congestion and safety problems ultimately leads to a deterioration in the abutting properties. These are not the inevitable of development and urban growth. Rather, they are symptoms of inadequate attention to access management to preserve the integrity of the transportation system.

Some of the symptoms of poor access management include the following items:

- High crash rates
- Poor traffic flow and congestion
- Numerous brake light activations by drivers in the through lanes
- Unsightly strip development
- Neighbors disrupted by through traffic
- Using a local street parallel to the overburdened “arterial” to make a one-way pair
- Pressures to widen an existing street or build a bypass
- Bypass routes as congested as the roadways they were built to relieve
- A decrease in property values

From a land development perspective, private investment in the abutting land development is jeopardized as traffic problems cause a decline in commercial and residential property values. The Urban Land Institutes’ *Shopping Center Development Handbook* warned that poorly designed entrances and exits not only present a traffic hazard, but also cause congestion that can create a negative image of the center.

By preserving the quality of traffic service, access management helps transportation and reduces the need for expensive improvements. Studies show poor spacing, design and location of driveways could reduce average travel speed. Improvements in access could increase roadway capacity substantially. Some of the ways we do access management include the following:

- Non-traversable medians
- Auxiliary lanes
- Signal spacing
- Driveway location and design
- Driveway spacing
- Corner clearance
- Joint & cross access
- Reverse frontage

Since varying functions of streets are designed to provide varying levels of access to adjacent land uses, it follows that land-use planning must be integrated with highway planning. The purpose of this integration is to allow land uses under a certain set of access control parameters which both facilitate land access and land development and also facilitate the adjacent street function. It is clear that a proper balance of the needs for street function and the need for land access can enhance the goals of both.

Corridor Preservation

Corridor preservation is a coordinated application of various measures to obtain control of or otherwise protect, the right-of-way for an existing or planned transportation facility, so that the right-of-way and other needed land can be provided. The ultimate objective is to provide a transportation system that affords a reasonable level of service for rapidly growing metropolitan areas. In order to do this, we must make a closer tie between land development proposals and transportation investments through the integration of transportation planning and project development.

Corridor preservation is a concept utilizing the coordinated application of various measures to obtain control of or otherwise protect the right of way for a planned transportation facility. Corridor preservation techniques should be applied as early as possible after the transportation corridor is identified either along a new alignment, or along an existing facility to:

- Prevent inconsistent development;
- Minimize or avoid environmental, social and economic impacts;
- Reduce displacement;
- Prevent the foreclosure of desirable location options;
- Allow for the orderly assessment of impacts;
- Permit orderly project development;
- Reduce cost

The preservation of transportation corridors is a critical issue as the American Association of State Highway and Transportation Officials (AASHTO) predicts that surface travel demand nationally will double by the year 2020. There will be an increasing need to identify and protect potential transportation corridors.

Techniques to preserving transportation corridors have certain aspects that should be given consideration in determining the best manner in which to protect the corridor. These include the following areas of legal issues, participation of decision-makers, environmental issues, and alternative techniques that could be use to for corridor preservation. As growth takes place the preservation of transportation corridors become more and more a critical issue. Questions should be asked concerning the value of preserving any corridor.

- How important will the corridor(s) be in the transportation system needed to serve the area's development pattern in the early years of the twenty-first century?
- Will the land "get-away" if nothing is done to prevent encroachment before full construction funding becomes available?
- If encroachment in the potential alignment does occur, what options will be foreclosed? What environmental, economic, and social consequences may result?
- Is development in the corridor still sufficiently modest that early protective action can make a difference?
- Will the affected communities do their share to help?

Corridor preservation is an important component in a transportation management system. Corridors must be reserved for needed transportation facilities as much as 20 years in advance of construction. Early protection of transportation corridors has both a social and economic benefit to local society. By doing nothing there is an opportunity cost to the society. Preservation of corridors is essential in order to prevent increases in land prices prior to the time land within the corridor is developed.