



ILLUSTRATION 44

The location of a significant amount of active farmland, as identified in the adjacent illustration, is one factor that should be considered when determining where to focus farmland preservation efforts.

Open Space Design

The implementation of open space subdivision design can provide benefits to all parties involved. Through the implementation of the open space concept, the developer is able to construct the same number of units they would be permitted under a conventional design, but leave a substantial portion of the site as open space. A reduction in the size of lots is therefore permitted to offset the area consumed by open space. The developer receives benefits from the reduction in the overall infrastructure costs and through the creation of a more marketable and desirable development, while the community benefits with the preservation of open space in perpetuity. While the open space concept seems to be an ideal scenario for all involved, the soils in St. Clair Township make this type of development difficult to implement when sanitary sewer is not available. Engineered septic fields are not permitted by the Health Department in a site condominium or platted subdivision unless the soils on the lot maintain three (3) feet of sand.

Finding a way to work around the soil conditions is the main hurdle St. Clair Township must overcome. The open space concept may work when a development is proposed with the construction of a public road and simple splits. Engineered septic fields are permitted when a development is only proposing land divisions. The open space concept may work in this case if a twenty-five percent (25%) open space requirement is added to the zoning ordinance. This would allow for a reduction in lot size to three (3) acres, which would still be enough room to accommodate an engineered septic field, the reserve field, a pond, an accessory building and the primary residence. In reviewing an open space proposal, or any public road proposal for that matter, the Township should ensure that the appropriate stub streets are planned for to allow for a continuous road system that promotes connectivity.

ILLUSTRATION 45

A yield plan identifies how many lots could be accommodated through a conventional development design.



ILLUSTRATION 46

An open space design will allow for a reduction in lot size in exchange for the preservation of a substantial amount of open space.



Environmental Considerations

The Pine and St. Clair River provide substantial contributions to St. Clair Township as a community with an abundance of natural resources. St. Clair Township recognizes these resources as a benefit to the community and as such, the Master Plan identifies areas where the Township should focus preservation efforts. The Resource Conservation designation that has been developed is not intended to imply that natural resource areas outside of this overlay area should be ignored, but rather indicates that areas within the conservation overlay area should receive additional attention from the Township. Further, the text outlined in this section provides additional steps necessary to preserve the environmental features of the Township.

Watershed Plan Recommendations

The County is currently in the process of developing watershed plans for each of the County's watersheds. As the plans specific to St. Clair Township are developed, the Township should work closely with the County to ensure that environmental concerns in the Township have been met. Once adopted, the Township should utilize these watershed plans as a primary document in resource protection and conservation. The overarching goals that should be promoted during the development of the watershed plans in St. Clair Township are as follows:

- Strive to Restore and Enhance Recreational Uses
- Strive to Restore and Protect Aquatic Life, Wildlife and Habitat
- Promote and Protect Public Health
- Reduce/Eliminate the Impacts of Illicit Discharges and Stormwater Runoff

Best Management Practices (BMPs)

The Master Plan promotes four (4) different Best Management Practices (BMPs) that will give the Township the tools necessary to protect the natural resources of the community. These are identified as follows:

- *Natural Resource Inventory and Assessment*
- *Conservation of Riparian Land for Future Parks and Public Access*
- *Integrate Natural Resource Protection into the Planning Process*
- *Preserve and Enhance Existing Wetlands/Woodlands*

Recommendation: Work with the County to Conduct an Existing Tree Assessment

Building off of the generalized woodlands survey provided in this Master Plan, the Township should work with the County to more specifically identify significant tree stands in the Township. A tree assessment will provide the Township with a better understanding of the tree species, size and locations of significant wooded areas. The tree assessment could be tied to the review of wetlands and other environmental features as the Township reviews developments.

Zoning Ordinance Recommendation: *Develop a Zoning Ordinance provision that requires the replacement of trees that are 6" caliper or larger that are proposed to be removed during the development of a parcel.*

Recommendation: Work with the County to Conduct a More Detailed Review of Existing Wetlands

In connection with the review of wooded areas, which are often times associated with wetlands, the Township should closely review the location of wetlands. Final verification of wetland sites from the Michigan Department of Environmental Quality should be required as a part of the site plan review process. Working with the generalized National Wetlands Inventory Map provided in this plan, County aerial photography, and a wetlands consultant, the Township can develop a more thorough inventory of areas where significant wetlands exist which may require closer monitoring from Township and MDEQ officials.

Recommendation: Create Conservation Corridors along the Pine River and its Associated Tributaries

The Pine River is a major watercourse that bisects the Township. The establishment of a conservation corridor adjacent to the River would help minimize the rate of runoff as well as the sediment runoff from adjacent properties, preserve stream banks from soil erosion and help reduce flooding.

Zoning Ordinance Recommendation: *Develop an Ordinance provision that prevents development within a certain distance of any watercourse in the Township, including rivers, creeks, drains and wetlands.*

Recommendation: Integrate Natural Resource Conservation into the Planning Process

As a relatively undeveloped community, there are still several environmentally significant sites in the Township that could be preserved with careful attention during the site plan review process. To this end, the Township must balance the task of allowing some degree of development while still managing to preserve the environmental features found onsite. A thorough review process will be necessary when a site comes before the Commission that may impact wetlands, woodlands and other environmentally significant features.

Zoning Ordinance Recommendation: *Require the submission of a development impact statement when a site is proposed for development. This impact statement should provide a thorough assessment of the environmental features located on the site, with a documented record of all studies conducted.*



ILLUSTRATION 47

Bartlett Road, north of Township Hall, provides an example of the environmental features and rural character that exists in the Township.

Recommendation: Work with the County to implement the St. Clair County Multi-Hazard Mitigation Plan

St. Clair Township and the County recognize the need to have a plan to reduce the impact of natural and man-made hazards. Therefore, the Township supports the County's efforts in developing a Multi-Hazard Mitigation Plan. This Plan is being prepared with input from County residents, local officials throughout the County, and with the support of the Michigan State Police - Emergency Management Division (MSP/EMD) and the Federal Emergency Management Agency (FEMA). At completion, the Plan will guide the county toward greater disaster resistance in harmony with the character and needs of each community in the County.

Communities are required to have an approved mitigation plan in position prior to receiving post-disaster Hazard Mitigation Grant Program funds. Local mitigation plans must demonstrate that their proposed mitigation measures are based on a sound planning process that accounts for the risk to and the capabilities of the overall community. This Plan will allow St. Clair Township to qualify for HMGP funds.

The Multi-Hazard Mitigation Plan is intended to serve many purposes, including:

- ***Increasing public awareness*** to help residents of St. Clair County better understand the natural and man-made hazards that threaten public health, safety, and welfare; economic vitality; and the operational capability of important institutions;
- ***Enhancing decision making capacity*** by providing information that managers and leaders of local government, business and industry, community associations, and other key institutions and organizations need to take action to address vulnerabilities to future disasters;
- ***Developing a detailed community profile*** that can be utilized to as reference when considering the potential impacts that a hazard can have on a range of community assets;
- ***Providing inter-jurisdictional coordination of mitigation-related programming*** to ensure that proposals for mitigation initiatives are reviewed and coordinated among the participating jurisdictions within the County; and
- ***Promoting compliance with state and federal programming*** to ensure that St. Clair County and its communities can take full advantage of state and federal grant programs that encourage or mandate efficient hazard mitigation planning;

The Plan will present a comprehensive study of the hazards that have impacted St. Clair County in the past, as well as those that have the potential to occur in the future. Some of these hazards are a greater threat to some communities than others, and some of the hazards could harm one sector of society more than others. Of particular importance to St. Clair Township is the transportation of hazardous materials on the I-94 expressway and along the railroad. The St. Clair Township Master Plan recommends ongoing cooperation with the County in implementing the Multi-Hazard Mitigation Plan, as well as coordinating training activities for potential emergencies that may occur.