Highway 14 Corridor Plan



The Municipalities of

Beaver County

Including Holden, Ryley, Tofield and Viking



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Part One: Introduction

Section 1: Plan Goals and Objectives

The Highway 14 Corridor Plan has been initiated by Beaver County, Village of Holden, Village of Ryley, Town of Tofield and the Town of Viking to plan for the orderly development of the Highway 14 Corridor running through Beaver County. With the strong economic and population growth within the Edmonton and northeastern Alberta regions, this Corridor is experiencing pressure for industrial, commercial and residential development. To properly plan for this growth, the need to identify future growth areas is critical.

The Highway 14 Corridor is an eastern gateway to Saskatchewan and is increasingly becoming a gateway for industrial traffic travelling to Fort McMurray. Highway 14 and Highway 36 have been designated part of the Alberta High Load Corridor. The High Load Corridor consists of designated highways within the Province of Alberta, which ultimately will have overhead utility lines raised to accommodate loads of up to 9.0 metres high.

Early public consultation processes in 2008 helped the Highway 14 Corridor Plan Committee establish the main goal for this Corridor Plan. The main goal was derived through public consultation and relates directly to the original Terms of Reference developed for this project by the Highway 14 Corridor Plan Committee. The goal of this Corridor Plan is to:

Ensure orderly, efficient, compatible, economically and environmentally sound land uses within the Plan area, while avoiding land use conflicts and coordinating future land uses with transportation plans.

The objectives of the Highway 14 Corridor Plan are as follows:

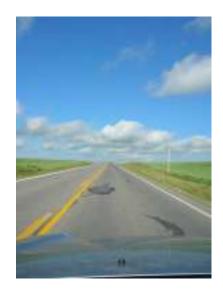
- Develop integrated strategies and policies for future development;
- Identify suitable locations for residential, commercial and industrial development;
- Determine environmental, geotechnical, and man-made constraints to development;
- Integrate land use with existing and future transportation, servicing and other infrastructure;
 and
- Promote a high standard of design and aesthetics for development along the Corridor.

"Through the development of the Highway 14 Corridor Plan, the participating municipalities within Beaver County will identify suitable locations for residential, commercial and industrial development."

Section 2: Plan Area

The Highway 14 Corridor Plan area is shown on Figure 1 Location Map. The Plan area extends for 1.6 km on both sides of Highway 14 for the entire length of Beaver County. The Plan Area encompasses 30,834 hectares (119 square miles or 76,160 acres) of land. Due to the linear nature of the Plan area, the 95 kilometer (60 mile) Corridor has been segmented into seven areas from the Highway 833/630 Intersection area at the west end to the Kinsella area at the east end.

Beaver County has an economic base in the agricultural, sand and gravel, and petroleum sectors as well as potential for future coal extraction industries. In order to ensure a strong long-term economic base for the region, it is the intent of the municipalities to diversify the economy to



complement the agriculture and natural resources bases, while preserving the better agricultural land. It is the intent of the Plan to identify nodes to encourage the development of manufacturing and servicing, as well as identifying areas for future multi-parcel country residential development.

The following is a brief description of the existing land uses in the Corridor from the Highway 833/630 Area in the west to Kinsella Area in the east. The corridor contains four urban centres: Tofield; Ryley; Holden; and Viking. Outside of these urban centres, the majority of the land in the Corridor is zoned A – Agriculture District. The purpose of the Agricultural District is to permit activities associated with primary agricultural production, and to preserve valuable agricultural land from inappropriate development. That said, there are other uses within each sub-region, ranging from recreational (golf courses), to manufacturing facilities.

Highway 833/630 Area

The western portion of Beaver County has a number of country residential subdivisions. Within its Municipal Development Plan, the County has designated much of this area for country residential development, where multi-lot subdivisions are allowed.

Tofield Area

The Town of Tofield is the largest urban centre in Beaver County, and provides a wide range of businesses and services. The Town is witnessing considerable growth, with several new residential subdivisions being developed within its corporate limits but away from Highway 14. The lands adjacent to Highway 14 within the Town are zoned for either highway commercial and industrial. Within the industrial lands located on the western edge of the Town is the Tofield Municipal Airport and the recently constructed KNM Manufacturing Plant. As with the Highway 833/630 Area, there are also many country residential parcels in the Tofield Area outside of the Town. A golf course is located south of Highway 14 and west of Highway 834 and some minor industrial developments have developed west of the golf course.

Ryley Area

The Village of Ryley accommodates businesses and services which serve the local market. The Village has numerous opportunities for residential, commercial and industrial development. The Village has several properties adjacent to Highway 14 which accommodate agri-business and food service industries. The Ryley area is dominated by industrial activities, including the recently created Equity Industrial Park, Beaver Regional Landfill, and Clean Harbors Environmental Services Landfill.

Holden Area

The Village of Holden accommodates businesses and services which serve the local market. The Village has numerous opportunities for residential, commercial and industrial development. The Village has several vacant properties adjacent to Highway 14 that are zoned for industrial purposes. Outside of the Village, the area remains predominantly agricultural.

Bruce Area

The Hamlet of Bruce is a rural centre which contains several businesses as well as serviced residential properties. However in general, the area remains predominantly agricultural.



Viking Area

The Town of Viking is the second largest urban centre in Beaver County, and provides a wide range of businesses and services. Within the Highway 14 Corridor, both the Town and County have lands developed for highway commercial and industrial purposes. Outside of Viking, the Viking area remains predominantly agricultural, however there are industrial activities north of Highway 14 and west of Highway 36 within the County.

Kinsella Area

The Hamlet of Kinsella is a rural centre which contains several businesses as well as serviced residential properties. The Kinsella area has developed gravel deposits, and as such, there are several industrial related activities located in the area. The University of Alberta also has a field station north of Highway 14 in the Kinsella Area.

Section 3: Planning Process

The Highway 14 Corridor Plan was prepared in four phases over a ten month planning period between February of 2008 and November of 2008. These included the following:

- ◆ Phase I Project Start-up/Issue Identification
 - o April 10 Inter-municipal Meeting to Identify Issues and Opportunities.
- Phase II Stakeholder Consultation
 - May 5 Inter-municipal Meeting with Alberta Transportation to Identify Potential Issues.
- Phase III Policy Development and Implementation Strategies
 - October 7 Inter-municipal Meeting to Review Draft Highway 14 Corridor Plan.
- ◆ Phase IV Public Consultation
 - o November 5 Highway Corridor Plan Open House.

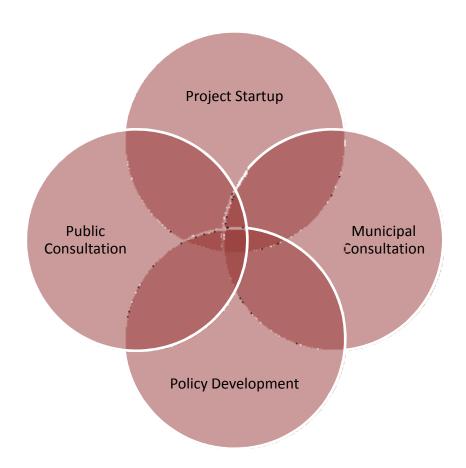


Figure 1 – Plan Area Location

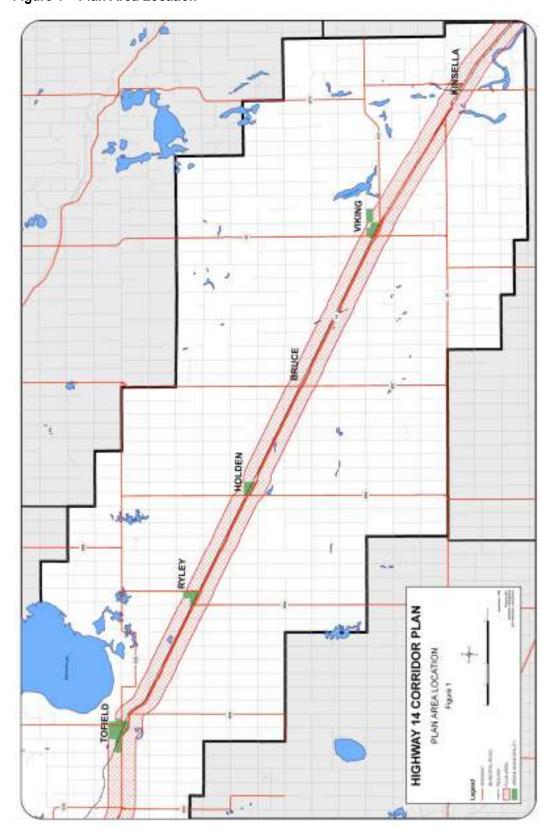
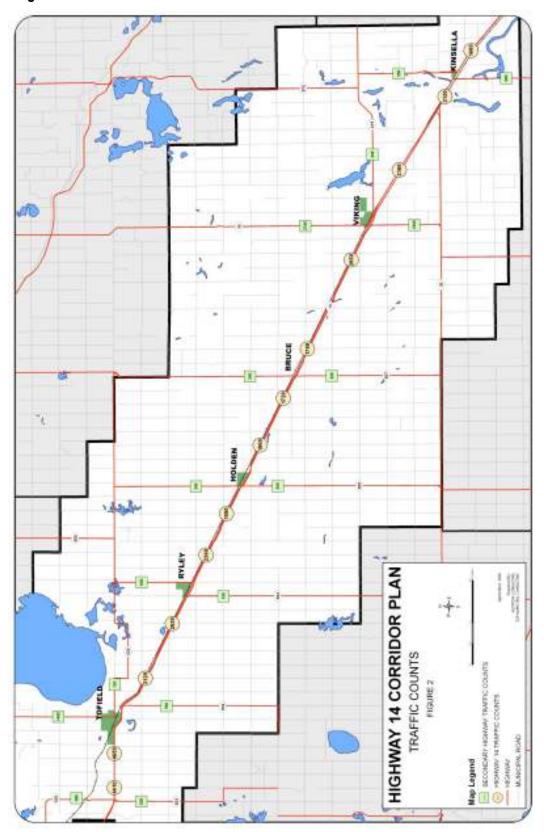


Figure 2 – Traffic Counts



Section 4: Site Context and Development Considerations

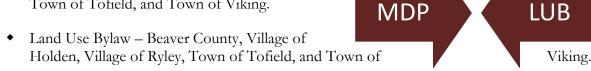
The following items were considered during preparation of the Highway 14 Corridor Plan.

- Natural Features Including protecting the Beaver Hills Moraine and other natural features.
- Existing Land Use / Zoning Working with existing uses towards enabling compatible development to occur.
- Resource Development These included identifying lands needed for gravel, oil and gas, and coal extraction as well as associated industries.
- Man-made Constraints The existing railway line adjacent to the highway.
- Historical and Archaeological Resources This included the Ribstones Heritage Monument near Viking.
- Traditional Land Use Recognizing the importance of having sustainable communities within its boundaries, Beaver County endeavours to support development within the urban centres wherever possible. The County also desires preservation of better quality agricultural land wherever possible.
- Parks, Recreation and Open Space Protecting wildlife habitat to the greatest extent possible. Conserving land which can support outdoor recreational activities.
- Transportation Highway 14 as well as the seven north-south highways that intersect it. Highway 14, Highway 36, and Highway 834 have been designated by the Province to be High Load Corridors.
- Utilities and Infrastructure Working with the Highway 14 Regional Water Services Commission as well as urban municipalities to enable the creation of serviced lands.
- Police, Fire and Emergency Services Ensuring that any development nodes can be serviced by protective services.

Section 5: Policy Context

The following planning documents were reviewed to identify policies that were relevant to the Highway 14 Corridor Plan:

 Municipal Development Plans – Beaver County, Village of Holden, Village of Ryley, Town of Tofield, and Town of Viking.



Part Two: Development Issues and Opportunities

This section identifies the issues and opportunities that are currently faced along the Highway 14 Corridor. The Highway 14 Corridor is faced with a number of issues, including issues and opportunities of physical, environmental and man-made constraints to development on one hand, and development desires from landowners and municipalities on the other. General development issues (positive and negative) that exist throughout the Plan Area are outlined first, and because the Plan area has been divided into seven (7) areas as shown in Figure 3, specific issues and opportunities to each are further elaborated.

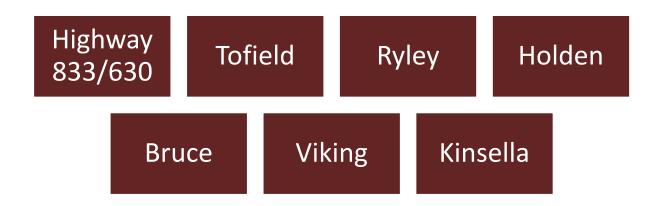
Section 6: Issues and Opportunities for the General Plan Area

The following is a brief summary of key issues and opportunities that were identified during the planning process by both the project team and stakeholders that were consulted.

- 1. Potential Resource Development;
- 2. Meeting the Long Term Affordable Housing Needs within the Region; and
- 3. The Demands and Abilities to Provide Municipal Infrastructure and Community Services.

Section 7: Issues and Opportunities for Specific Areas

As the Plan area is large and has a linear shape, it has been divided into seven (7) areas. This section examines and identifies the specific issues and opportunities facing each area, elaborating on the general issues and opportunities that have been described in the preceding pages.

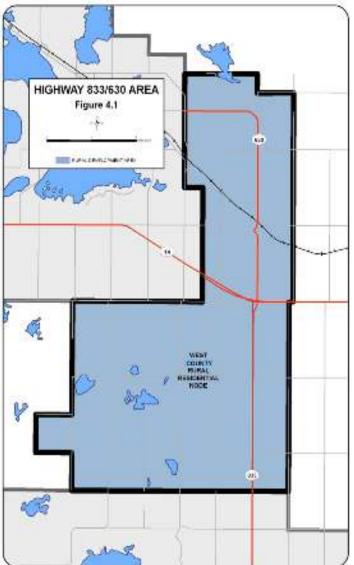


BRUCE SPECIFIC HIGHWAY DEVELOPMENT AREAS HIGHWAY 14 CORRIDOR PLAN

Figure 3 – Specific Highway Development Areas

7.1 Highway 833/630 Area Issues and Opportunities

Figure 4.1 - Highway 833/630 Area



West County Rural Residential Node

A potential rural **country residential** node has been identified north and south of Highway 14.

- ⇒ Appropriate setbacks and screening from Highway 14 will be required. Setbacks and screening will be developed to the satisfaction of the Development Authority.
- ⇒ On-site water and sanitary services may be required to service this node.
- ⇒ Emergency fire and medical response to this area is currently provided from the Town of Tofield.
- ⇒ An Area Structure Plan will be required prior to development within this node.

7.2 Tofield Area Issues and Opportunities

Town of Tofield

The Town of **Tofield is an urban growth node** located adjacent and north of Highway 14.

⇒ An average of 4,650 vehicles per day travel on Highway 14 from the west to Tofield, while a total of 3,120 travel east. A significant amount of traffic heads north on

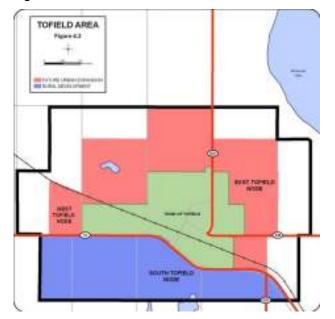


Highway 834 (1,490 vehicles per day). This traffic volume indicates that there is a strong local market to support commercial and industrial development within this area.

- ⇒ Highway 834 has been designated a "High Load Corridor" by Alberta Transportation. The department is planning to realign Highway 834 in and around Tofield. This realignment will also include changes to Highway 14.
- ⇒ The Town offers water and sanitary service.
- ⇒ The Town has **numerous residential development opportunities**, ranging from low density single detached dwelling housing to multiple unit condominiums.
- ⇒ The Town also has opportunities for highway and downtown commercial development, and has lands available for larger lot serviced industrial development.



Figure 4.2 - Tofield Area



"The Town of Tofield is witnessing the most amount of development activity within the Highway 14 Corridor"

West Tofield Node

Lands have been identified for **future annexation** by the Town of Tofield for **industrial purposes**. These lands are adjacent to the airport and the KNM manufacturing plant.



- ⇒ Located at the west access to Tofield, this site would provide Tofield with lands for industrial expansion. The airport, as well as the KNM plant, is located immediately east of the property within the Town of Tofield.
- ⇒ Land adjacent to the Town has been subdivided for a single lot residential parcel. The potential exists for conflict between the residential use and planned industrial activities.
- ⇒ On-site water and sanitary services are available to the site via the Town of Tofield. Emergency fire and medical response to this area is currently provided from the Town of Tofield.
- ⇒ The access to Highway 14 from Range Road 192 provides a logical west entrance to Tofield.
- ⇒ A Highway Access Study may have to be completed to determine the locations of all future accesses to the lands in close proximity to Tofield.
- ⇒ An Area Structure Plan will be required prior to development within this node.

South Tofield Node

Located south of Tofield, this site has been identified as a **County Development Area** within the Tofield/Beaver County Inter-municipal Development Plan. It is suggested that the lands be developed for **mixed uses** including recreational, residential, with some minor commercial and industrial activities.



- ⇒ The lands include a nine-hole golf course as well as several country residential parcels. The potential exists to expand this course to an eighteen-hole facility.
- ⇒ There are numerous sloughs and low lying areas within this node.
- ⇒ Water services may be available to the site from the Highway 14 Regional Water Line. Fire and medical response to this area is currently provided from the Town of Tofield.
- ⇒ There are three accesses to Highway 14 (Range Road 192, Range Road 191 and Secondary Highway 834). A Highway Access Study may have to be completed to determine the locations of all future accesses to the lands in close proximity to Tofield.
- ⇒ An Area Structure Plan will be required prior to development within this node.

East Tofield Node



Located east of Tofield and adjacent to the proposed realignment of Highway 834, this site has been identified for **future annexation** by the Town of Tofield for **commercial and residential purposes**.

- ⇒ The proposed realignment of Highway 834 makes these lands a logical and desirable location for future urban expansion, as the lands will have good vehicular access from both Highways 14 and 834.
- ⇒ Existing country residential development adjacent to the Town of Tofield may pose constraints respecting development and road alignment options.
- ⇒ Water and sanitary services will be available to the site by the Town of Tofield.
- ⇒ The lands slope towards Beaverhill Lake. Any expansion for urban purposes beyond what has already been identified is limited due to the existence of low lying lands.
- ⇒ A Highway Access Study may have to be completed to determine the locations of all future accesses to the lands in close proximity to Tofield. An Area Structure Plan will be required prior to development within this node

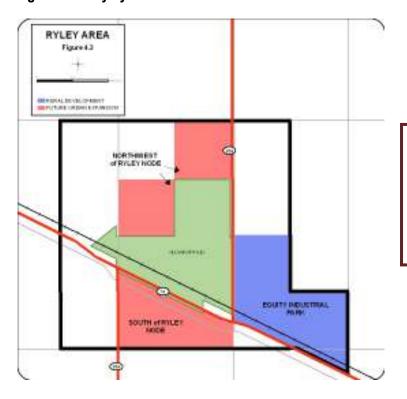
7.3 Ryley Area Issues and Opportunities

Village of Ryley

The Village of Ryley is an urban growth node located adjacent and north of Highway 14.

- ⇒ An average of 2,630 vehicles per day travel on Highway 14 from the west to Ryley, while a total of 2,360 travel east. A significant amount of traffic heads north on Highway 834 (620 vehicles per day).
- ⇒ The Village of Ryley area is dominated by two large industrial landfills, being the Clean Harbors and Beaver Regional landfills.
- ⇒ The Village offers sanitary services, while water service is provided by CU Water Limited.
- ⇒ The Village has numerous residential infill development opportunities.
- ⇒ The Village also has opportunities for highway and downtown commercial development, and has lands available for larger lot serviced industrial development.

Figure 4.3 – Ryley Area



"Beaver County has developed the Equity Industrial Park to provide for both light and general industrial uses."

Equity Industrial Park



The County has initiated development within the Equity Industrial Park, which is planned to be a comprehensively **planned** industrial area designed to take advantage of the topography, infrastructure and locational attributes of the area. Proposed uses within the Park include light industrial business and general industrial.

- ⇒ The Equity Industrial Park provides excellent access to Highway 14 via Highway 854.
- ⇒ The location of the Equity Industrial Park is in close proximity to the Ryley Regional Landfill. Existing land uses within the area enable the lands to be developed for light industrial purposes without any conflicts from neighbours.
- ⇒ The County is working with CU Water Limited to provide potable water to the park.
- ⇒ The County is working with the Village of Ryley to provide for sewage disposal and treatment.
- ⇒ No significant development constraints have been identified within this node.

South of Ryley Node

Located south of Ryley, this site has been identified as a potential area for **urban residential expansion**. In the Ryley/Beaver County Inter-municipal Development Plan this area has been designated as a fringe area and could provide for the long term growth of the Village.

⇒ The lands are primarily utilized for agriculture purposes.



- ⇒ Highway 854 south of Ryley is gravelled surface.
- ⇒ Water services may be available to the site from the Highway 14 Regional Water Line.
- ⇒ An Area Structure Plan will be required prior to development within this node

Ryley North/West Node



The **urban expansion** area includes the lands west of Highway 854 and north of Ryley. It is proposed that the lands west of Ryley in the County be developed for **residential** purposes (with commercial adjacent to Highway 14), while the lands north of Ryley be developed for **industrial** purposes (Clean Harbors expansion).

- ⇒ Residential expansion of the Village of Ryley is limited to the west due to the location of the Clean Harbors Landfill, Ryley Regional Landfill, and Equity Industrial Park.
- ⇒ Development west of the Clean Harbors lands for residential purposes is subject to a 450 metre development setback.
- ⇒ Water services are available through CU Water and sanitary services are available from the Village of Ryley.
- ⇒ An Area Structure Plan will be required prior to development within this node

7.4 Holden Area Issues and Opportunities

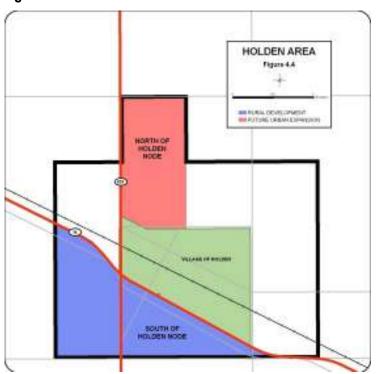


Village of Holden

The Village of **Holden is an urban growth node** located adjacent and north of Highway 14.

- ⇒ An average of 1,990 vehicles per day travel on Highway 14 from the west to Holden, while a total of 1,900 travel east.
- ⇒ The Village of Holden area has a significant amount of land available for residential, commercial and industrial development.
- ⇒ The Village offers sanitary services, while water service is provided by CU Water Limited.
- ⇒ The Village also has **opportunities for highway commercial and industrial development**.

Figure 4.4 - Holden Area



"Development of lands within the North of Holden Node must be compatible with the existing Village-owned wastewater lagoon."

South of Holden Node



Located south of Holden, this site has been identified as a **County Development Area** within the Holden/Beaver County Intermunicipal Development Plan. It is suggested that the lands be developed for **agricultural and** compatible **light industrial** purposes.

- ⇒ The lands are primarily utilized for agriculture purposes.
- ⇒ Highway 855 south of Holden is paved.
- ⇒ Water services may be available to the site from the Highway 14 Regional Water Line.
- ⇒ An Area Structure Plan will be required prior to development within this node

North of Holden Node

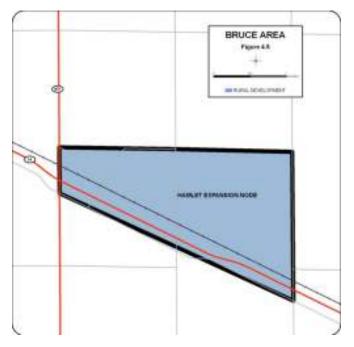
The lands north of Holden have been identified for **urban expansion** as well as a **County Development Area**. It is proposed that these lands be developed for residential and recreational purposes.

- ⇒ When developed for residential purposes, the lands adjacent to Holden and south of the sewage lagoon are subject to a 300 metre development restriction.
- ⇒ It is proposed that the lands adjacent to the sewage lagoon be developed for recreational purposes (golf course or other recreational use).



7.5 Bruce Area Issues and Opportunities

Figure 4.5 – Bruce Area



Hamlet Expansion Node

The Hamlet of Bruce has been identified by Beaver County as a growth hamlet. This primarily residential community provides important social and commercial functions to the agricultural community. The intent of the County is to promote growth and development in Bruce, and to expand the residential base, commercial and industrial bases.

- ⇒ It is proposed that any expansion of the Hamlet of Bruce take place north of Highway 14.
- ⇒ All new developments will be required to utilize the existing water and sanitary services.
- ⇒ Emergency fire response to this area is currently provided by the Bruce Fire Department, while emergency medical services come from Viking.
- ⇒ An Area Structure Plan will be required prior to development within this node.
- ⇒ When developed for residential purposes, the lands adjacent to the wastewater lagoon are subject to a 300 metre development restriction.

"Expansion of the Hamlet of Bruce will take place north of Highway 14."



7.6 Viking Area Issues and Opportunities



Town of Viking

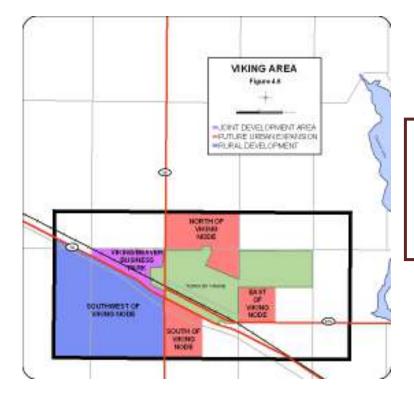
The Town of Viking is an urban growth node located adjacent and north of Highway 14.

- ⇒ An average of 2,050 vehicles per day travel on Highway 14 from the west to Viking, while a total of 2,160 travel east. Highway 36 also runs through Viking. Daily traffic entering Viking from the south is 1,820 vehicles per day while 2,740 vehicles per day travel north of Viking on Highway 36.
- ⇒ A significant amount of traffic on both Highway 14 and Highway 36 is industrial in nature, as both Highway 14 and Highway 36 have been designated as "High Load Corridors" by Alberta Transportation.
- ⇒ The Town offers water and sanitary service.
- ⇒ The Town has **numerous residential development opportunities**, primarily with respect to single detached dwellings.
- ⇒ The Town also has opportunities for highway and downtown commercial development.





Figure 4.6 – Viking Area



"The Viking/Beaver Business
Park is being developed by
both the County and Town for
Light Industrial Purposes."

Viking/Beaver Business Park

The County and Town are cooperatively planning for the development within the Viking/Beaver Business Park. The proposed land use within this node is **Light Industrial Business**.

- ⇒ The Viking/Beaver Business Park provides excellent access to Highway 14 and Highway 36.
- ⇒ The location of the
 Viking/Beaver Business Park is
 in close proximity to the Town
 - in close proximity to the Town of Viking. Existing land uses within the area enable the lands to be developed for light industrial purposes without any conflicts from neighbouring properties.
- ⇒ The area can be developed to an urban standard via services from the Town of Viking.
- ⇒ No significant development constraints have been identified within this node.



North and East of Viking Nodes

An urban expansion area includes lands north of Highway 14 and east of Highway 36. It is proposed that the lands north of Viking be utilized for both commercial and residential purposes, while the lands east of Viking adjacent to Highway 619 be utilized for residential purposes.

⇒ Expansion within these areas provides a logical extension of the municipal boundaries of Viking.



- ⇒ The potential exists to expand the golf course to an eighteen hole facility.
- ⇒ Water and sanitary services are available from the Town of Viking.
- ⇒ An Area Structure Plan will be required prior to development within this node

South of Viking Node

The lands south of Viking and east of Highway 36 have been identified as an urban expansion area for highway commercial and industrial purposes.

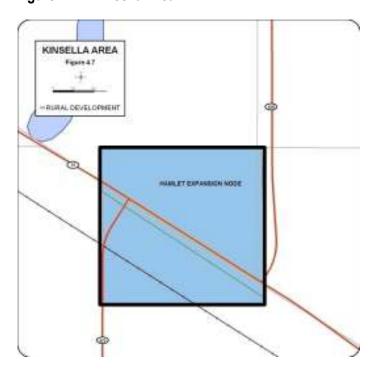
- ⇒ Expansion within these areas provides a logical extension of the municipal boundaries of Viking.
- ⇒ Water and sanitary services are available from the Town of Viking.



- ⇒ Emergency fire and medical response to this area is currently provided from the Town of Viking.
- ⇒ An Area Structure Plan will be required prior to development within this node.
- ⇒ The lands further south of the South of Viking Node have been identified for potential rural residential expansion. There is the ability to take advantage of a former water line running from this area north to Viking to service lands with municipal water from the regional water line.

7.7 Kinsella Area Issues and Opportunities

Figure 4.7 – Kinsella Area



"Highway 14 runs through the Kinsella Hamlet Expansion Node. Determining future highway access will be important to both the County and Alberta Transportation."

Hamlet Expansion Node

The Hamlet of Kinsella has been identified by Beaver County as a growth hamlet. This community provides important social and commercial functions to the agricultural community. The intent of the County is to promote growth and development in Kinsella. The lands adjacent to Kinsella have been identified as a **County Development Area** for **industrial** purposes.

⇒ There are current industrial uses within this node, and the potential exists for additional development.



- ⇒ An intersectional analysis may have to be undertaken within the Kinsella area, as there are many intersections accessing Highway 14 within the hamlet.
- ⇒ All new developments will be required to utilize the existing water and sanitary services. Emergency fire response to this area is currently provided by the Kinsella Fire Department, while emergency medical services come from Viking.
- ⇒ An Area Structure Plan will be required prior to development within this node.

Part Three: Land Use Policy

The future land uses within the Highway 14 Corridor identified in Figures 4.1 to 4.7 were developed after reviewing existing land use patterns, plans for transportation improvements, natural, environmental and manmade constraints, and extensive stakeholder and public consultation. To determine the future land use concept, the following planning principles were developed by the Highway 14 Corridor Plan Committee with input from the public consultation process:

- Ensure orderly, efficient, and environmentally sound land use patterns;
- Create a land use planning framework that strengthens the local economic base;
- Maintain Highway 14 as safe, efficient, free-flowing transportation route;
- Encourage 'nodal' development;
- Promote a high standard of design and aesthetics for development along the corridor and along the "gateways" to the urban communities; and
- Mitigate development impacts on traditional land uses such as farming.

Further to these principles, general 'location criteria' were established to guide future land use decisions along the corridor. Each criterion represents a factor that must be considered before any municipal approval for development occurs. General 'location criteria' for the Highway 14 Corridor Plan are:

- Suitability of land for development (avoiding steep slopes and lands prone to flooding or subsidence) identified through detailed geotechnical analyses;
- Compatibility of surrounding land uses (buffers between residential and business/industrial to reduce noise and nuisance effects);
- Compatibility and proximity to environmentally sensitive areas and traditional land uses;
- Provision of piped and treated water and sanitary sewer facilities, on-site drainage and stormwater management facilities;
- Availability of safe highway access points, determined with input from Alberta Transportation; and
- Proximity to police, fire, emergency and hospital services, quantified by response times.

Section 8: Land Use Policies for the General Plan Area

Based on the future land use concept objectives that have been established for each type of development, this section outlines corresponding policies that have been formulated to support each objective. The proposed pattern of future land uses are shown in Figures 4.1 to 4.7. This section of the Plan provides the general land use policies to help guide the future residential, commercial and industrial development along the Highway 14 Corridor.

8.1 Residential Development

The demand for housing in Beaver County may grow due to the municipality's proximity to Edmonton and due to the influx of industry, particularly in the manufacturing and resource sectors.

The County encourages residential development to take place within its urban municipalities. All of the urban municipalities (Tofield, Ryley, Holden and Viking) have ample lands available to provide additional residential growth, and all municipalities have servicing capacity to accommodate additional residences in their communities.

Residential development in close proximity to the urban centres of Tofield, Ryley, Holden and Viking must conform to the requirements of the associated Inter-municipal Development Plan.

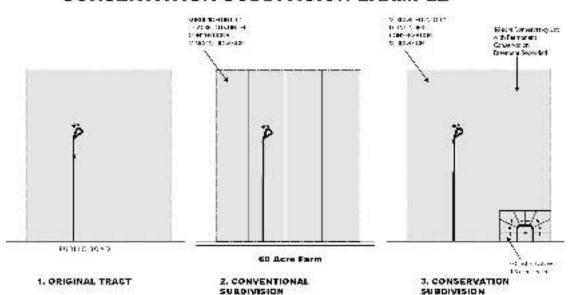
Priority for residential development within the County will be directed towards the following areas: Highway 833/630 Development Node; South Tofield Node; South of Ryley Node; and Bruce Hamlet Expansion Node.

These nodes offer proximity to municipal and community services. Directing residential development towards these nodes will strengthen local markets for existing and future commercial and employment services. Requirements for additional access points to Highway 14 are to be minimized, ensuring the safe and efficient operation of the highway.

The Highway 833/630 Development Node has the best prospects for rural population and housing growth given its close proximity to Edmonton, proximity to the regional water line, and proximity to more desirable natural landscapes which complement country residential living. The Tofield South Node provides an opportunity for country residential development around an expanded golf course, while further opportunities exist for this form of development around local water bodies. The South of Ryley node has been identified as a priority area for residential expansion. The Bruce Hamlet Expansion Node has modest prospects for additional development; however given that the hamlet has some services and an existing residential and commercial base, further growth is a possibility.

Trends in other municipalities indicate that the traditional large lot subdivisions are not environmentally, socially or economically appropriate. A "best practice" approach to development promotes conservation (cluster) subdivisions that are more environmentally sustainable, reduces costs for roads and municipal services, and maintains the rural landscape (Figure 5). Where communal water and sewer systems can be provided, it is recommended that estates residential subdivisions can occur (lot sizes ranging from 0.2 to 0.4 hectares).

Figure 5 – Illustration Showing Conservation Subdivision versus Conventional Subdivision



CONSERVATION SUBDIVISION EXAMPLE

Residential Policies

- 8.1.1 Prior to County consideration of any rezoning and subdivision applications, an outline plan shall be prepared. Residential outline plans must also address (but not be limited to) the following:
 - a) All areas deemed as being developable shall be confirmed with a geotechnical study prepared by a qualified engineer;
 - b) Access by an internal roadway is required.
 - c) For parcels to be serviced by a communal water and sewer service, it is recommended that County Council require the minimum parcel size to be 0.2 hectares and the maximum lot size to be 0.4 hectares.
 - d) Any on-site and off-site development costs associated with the development of the subdivision will be borne by the developer.
- 8.1.2 All country residential subdivisions shall also meet the location criteria listed in Part Three of this Plan, in addition to:
 - a) Providing information with regards to proximity to community services, quantified by distances and/or travel times to schools, medical care, recreation and social facilities; and
 - b) Priority shall be given to applications in areas contiguous to existing residential development.

8.2 Commercial Development

Several types of commercial development exist within the Highway 14 Corridor. The most notable trend in highway commercial development is the move towards large stores away from the downtown core. These stores are almost always found at high traffic locations.



The second type of commercial activity is the truck stop with accompanying mechanical repair centre, restaurant and sufficient parking for large trucks. These developments require traffic volumes in excess of 2,500 vehicles per day. Smaller truck stops, such as card locks, require traffic volumes of 500 vehicles per day. The most important location factors for truck stops are proximity to high traffic highways, good access and good visibility. Large parcels of 6.0 hectares and larger; are desired.

In addition to infilling and intensification of designated commercial areas within the Inter-municipal Development Plans, a number of other commercial nodes has been identified to serve the needs of local residents, including:

- ⇒ Tofield South Node;
- ⇒ Viking/Beaver Business Park; and
- ⇒ Equity Industrial Park.

The Tofield South Node offers good access to Highway

14, and offers the potential for large highway commercial lots requiring little or no municipal services. There is an opportunity for the golf course to expand to 18 holes, providing an expansion of services at the existing facility.





The Equity Industrial Park provides an opportunity for unserviced commercial activities adjacent to Highway 14 as well as Highway 854. The Viking/Beaver Business Park, adjacent to Highways 14 and 36 offers the opportunity for commercial and industrial businesses servicing the travelling public.



Commercial Policies

- 8.2.1 Prior to County consideration of any rezoning and subdivision applications, an outline plan shall be prepared. Commercial outline plans must also address (but not be limited to) the following:
 - a) All areas deemed as being developable shall be confirmed with a geotechnical study prepared by a qualified engineer;
 - b) Access by an internal roadway is required.
 - c) Development must adhere to the provisions of the Beaver County Light Industrial District requirements contained within its Land Use Bylaw.
 - d) Any on-site and off-site development costs associated with development of the subdivision will be borne by the developer.
- 8.2.2 All commercial development shall also meet the location criteria listed in Part Three of this Plan, in addition to providing evidence of a local market to support the proposed development.
- 8.2.3 Beaver County shall encourage retail and personal service businesses to locate within existing urban municipalities.
- 8.2.4 Direct highway access will be permitted at the authority of Alberta Transportation.
- 8.2.5 Parking and loading areas for the commercial development shall be paved and signage shall be provided where appropriate.

8.3 Industrial Development

Most industrial development in the Plan area will be linked to industries associated with the manufacturing and resource extraction industries. As these industries grow, so does the demand for industrial land.

Potential industrial nodes have been identified. These include the following:

- ⇒ Tofield West Node;
- ⇒ Equity Industrial Park;
- ⇒ South of Holden Node;
- ⇒ Viking/Beaver Industrial Park; and
- ⇒ Kinsella Hamlet Expansion Node.



Industrial Policies

- 8.3.1 Prior to consideration of any rezoning and subdivision applications, an outline plan shall be prepared. Industrial outline plans must also address (but not be limited to) the following:
 - a) All areas deemed as being developable shall be confirmed with a geotechnical study prepared by a qualified engineer;
 - b) Access by an internal roadway is required.
 - c) Development must adhere to the provisions of the Beaver County Light Industrial District and Rural Industrial District requirements contained within its Land Use Bylaw.
 - d) Any on-site and off-site development costs associated with development of the subdivision will be borne by the developer.
- 8.3.2 All industrial development shall also meet the location criteria listed in Part Three of this Plan, in addition to providing evidence of:
 - a) Proximity to resource development requiring complementary industrial uses:
 - b) Proximity to suppliers, service providers and urban centres;
 - c) Proximity to labour market; and
 - d) Suitable separation distances from residential land uses to avoid conflict.

8.4 Aesthetics and Gateway Function

Some of the first impressions of a municipality are formed by the attractiveness of a highway corridor entrance. Design guidelines and standards for lands adjacent to Highway 14 will be addressed in the Land Use Bylaw. It is also important to preserve the scenic rural landscape for the enjoyment of local residents and visitors.

Aesthetics and Gateway Function Policy

Policies outlined below will control and promote the aesthetic appearance of the Highway 14 Corridor. Further objectives for aesthetics and gateway function include:

- 8.4.1 The County shall require a minimum of 41.0 metre development setback for all new developments. Where possible, this will be in the form of a natural or landscaped buffer.
- 8.4.2 All new developments shall conform to Alberta Transportation development setback requirements from highways.
- 8.4.3 A minimum of 10 percent of the site area shall be landscaped. In addition, all areas not covered by buildings and parking shall be landscaped.
- 8.4.4 All roads adjacent to a development site shall be seeded or sodded, excepting those ditch areas required for drainage.

8.5 Transportation

Description



Highway 14 is a critical piece of infrastructure for Beaver County. The integrity of this highway must be maintained. Policies in this section promote the development of Highway 14 and other highways as safe, effective, and efficient transportation routes.

The goal of policies in this section is to provide transportation for the safe, reliable and efficient delivery of goods, services and people in Beaver County. Further objectives for transportation include:

- ⇒ Work with Alberta Transportation to integrate land use and roadway requirements within the Plan area.
- ⇒ Implement access management requirements along Highway 14.
- ⇒ Develop internal roadways in accordance with established Beaver County development guidelines.

Transportation Policies

- 8.5.1 The County and urban municipalities shall work with Alberta Transportation to determine highway upgrades required to service new developments.
- 8.5.2 The County shall require, where possible, developers to be responsible for the cost of intersection improvements that are a result of their improvements. These include both intersections onto provincially and municipally owned roads.



- 8.5.3 All new developments along Highway 14 shall conform to Alberta Transportation development setbacks and guidelines.
- 8.5.4 All developments shall front onto a forced "rear" service road or onto a service road extending along the forced road.
- 8.5.5 No outdoor storage shall be permitted on the highway flanking lots.

8.6 Municipal Services

Description



Most of the Plan area within County growth nodes will have to be serviced to a rural standard with truck haul or private wells for potable water supply, and on-property septic fields or septic holding tanks with truck haul for sewage removal to the nearest sewage lagoon.

Stormwater management plans will be required to be prepared and approved by Alberta Environment and the County at the time of subdivision.

Another consideration in reviewing and approving plans for subdivision and development are fire protection provisions. Policies in this section guide the provision of municipal services for the Highway 14 Corridor.

The intent of this section is to provide municipal services and infrastructure in an effective manner, and to ensure that protective and emergency services are at an optimal level.

Municipal Services Policy

- 8.6.1 The County shall require all developers within the Plan Area to provide either individually or collectively, a water supply that meets Alberta Building Code standards for firefighting purposes.
- 8.6.2 The County shall encourage the exploration of the feasibility of implementing piped water and sewage collection systems within all identified growth nodes.
- 8.6.3 The County shall require as a condition of subdivision that post-development rates of runoff do not exceed pre-development rates to meet standards set out by Beaver County and Alberta Environment.
- 8.6.4 New subdivisions and development areas will be evaluated for their impacts on the provision of fire and emergency services.
- 8.6.5 Easements and Public Utility Lots will be identified and required by developers at the subdivision stage for shallow and overhead utilities such as gas, power, television, cable and telephone.



Part Four: Implementation

Section 9: Overview

The Highway 14 Corridor Plan is the planning framework to guide and evaluate future subdivision, rezoning and development applications in the Plan area. Future applications for amendments to individual municipality's Land Use Bylaws, plans of subdivision, and development applications in the Corridor Plan area will be based upon compliance with policies contained in this Plan. Amendments may be required to municipal statutory planning documents to ensure that land use policies align with those contained in this Corridor Plan.

Section 10: Objectives

Objectives regarding the implementation of the Highway 14 Corridor Plan include:

- Municipalities to implement policies in the Corridor Plan to guide decision-making regarding growth management, development and capital investment;
- Maintain the Corridor Plan as a current planning tool, updating it to reflect changing economic, social and physical conditions and opportunities; and
- Undertake further studies to identify costs and implementation schedules for capital improvements.

Section 11: Implementation Policy

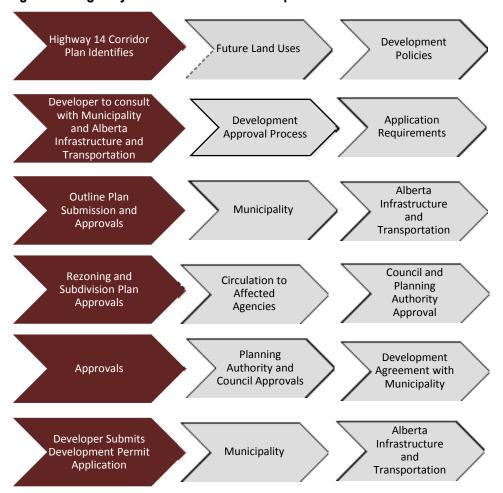
The County may require developers to prepare and submit Outline Plans for review and approval by the respective municipality prior to consideration of a rezoning and subdivision application being processed. Outline Plans must address, but are not limited to, the following: "All five municipalities within this Highway Corridor Plan require an Outline Plan to contain the same elements."

- 1. Compliance with the Inter-municipal Development Plan, Municipal Development Plan, Area Structure Plan, and any other statutory plans;
- 2. Confirmation through a geotechnical study prepared by an accredited professional that the proposed areas do not pose any geotechnical constraints to development;
- 3. A detailed examination of existing land uses and natural features such as vegetation, watercourses, and topographical features;
- 4. Identification of environmentally sensitive areas, hazard lands, historical or archaeological sites, and traditional land use areas.
- 5. A detailed land use plan illustrating proposed land uses (i.e. commercial, industrial, recreation, tourist) and any residential areas by location, type, and density;
- 6. Proposed locations for Environmental Reserve (ER) and Municipal Reserve (MR) or cashin-lieu provisions if appropriate;

- 7. Proposed roadway access points and internal circulation. A Traffic Impact Assessment may be required;
- 8. The proposed water supply and methods of sewage disposal, and a stormwater management plan;
- 9. Arrangements for the provision of shallow utilities;
- 10. Area calculations of various land uses and estimates of population and school generation estimates in tabular form where applicable; and
- 11. Development phasing plan.

Figure 6 outlines the Highway 14 Corridor Land Development Process. The municipalities may require that all future plans of subdivision and developments in the Plan area adhere to the future land uses proposed and policies contained in this Corridor Plan. The municipalities may require on-site and off-site costs associated with servicing new developments and roadway, utility and other infrastructure to be borne by the developer. This will be done through development charges and levies issued by the Development Authority in accordance with a specific development agreement.

Figure 6 – Highway 14 Corridor Land Development Process



Part Five: Recommendations

Section 12: Action Plan

Based on the goals, objectives, policies, and guiding planning principles, a number of recommendations have been determined beyond this document. They include, but are not limited to:

Undertake the following plans, updates and studies to facilitate implementation of the Highway 14 Corridor Plan:

- Prepare Area Structure Plans for the Hamlets of Bruce and Kinsella;
- Amend Municipal Development Plans to comply with the goals, objectives and policies of this Highway Corridor Plan. This may be done as part of any scheduled Municipal Development Plan review process.
- Amend the Beaver County Land Use Bylaw to reflect the future land use proposals and policies contained in this Highway Corridor Plan. Specific amendments are recommended to the following:
 - o Addition of a Rural Serviced Country Residential Land Use District;
 - o Addition of a Rural Serviced Conservation Subdivision Land Use District; and
 - o Addition of the Light Industrial Land Use District.
- Work with Alberta Transportation to Prepare and Adopt Design Guidelines for the Highway 14 Corridor.

Appendices

Schedule "A" Traffic Impact Assessment Guideline

Shown under a separate cover.