

TREPANIER CREEK GREENWAY CROWN LAND ACQUISITION PLAN



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EXECUTIVE SUMMARY

The *Trepanier Creek Greenway Regional Park Plan* was developed in part as a requirement for a crown land acquisition application being submitted under the 'license of occupation' section of the Land Act, 2009, to the Ministry of Community Development.

Trepanier Creek Greenway Regional Park is designated as a trail/greenway in the *Official Regional Parks Plan*. The primary objective of the park is to provide a variety of recreational opportunities while conserving the unique natural environment and its regional significance. The long term goal is to have a functioning regional greenway trail system connecting Okanagan Lake to Trepanier Provincial Park.

The proposed management plan is intended to meet both the ILMB Community and Institutional Use Requirements, the RDCOs Bylaw Requirements, and be consistent with the policies set out within the Regional Growth Strategy.

Using British Columbia's Biogeoclimatic Ecosystem Classification system, the proposed greenway park falls within the Ponderosa Pine very dry and hot (PPxh1) subzone. The dominant plant species and communities in this subzone are Ponderosa pine (*Pinus ponderosa*), Douglas fir (*Pseudotsuga Menziesii*), and grassland communities.

A gap analysis exercise of ecosystem representations among the RDCO's existing Regional Parks, has identified the possible existence of two under and/or not represented ecosystem categories within the proposed greenway park: Broadleaf Woodland- aspen seepage (BW:as) and Riparian-river (RI:ri).

In addition, the proposed greenway park provides habitat for several "at risk" plant and animal species, contains plant species of historical significance to local First Nations, and falls largely within a designated Old Growth Management Area (OGMA) within the Westbank First Nation Community Forest.

Key stakeholders and the general public were invited to an Public Information Session which was held at the Trepanier Creek Greenway Regional Park kiosk August 19th, 2009. Feedback was heavily in favor of the park with two exceptions being: 1) a local stakeholder expressed concern about the future expansion of the trail, as it might pass through their private land, and 2) another stakeholder expressed concern that the park may increase the possibility of a human caused interface forest fire.

The management actions that will be required to be completed within the proposed greenway park will be conducted in a series of phases. The following summarizes the key actions that will be necessary and their projected costs:

1. Trail Enhancement and Maintenance - \$55,000.00;
2. Park Enhancement and Public Parking Infrastructure - \$45,000.00;
3. Public Safety and Security - \$10,000.00;
4. Forest Health and Fire Management Planning - \$15,000.00;
5. Resource Inventories and Mapping - \$17,500.00; and
6. Education and Interpretation - \$15,000.00.

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1.0 INTRODUCTION

The Regional District of Central Okanagan's (RDCO) has hired Timberline Natural Resource Group Ltd (Timberline) to complete a crown land acquisition plan for Trapanier Creek. This document has been prepared as the final deliverable for the project and includes:

- the history and background information surrounding the Regional District of Central Okanagan's (RDCO) Regional Park Crown Land Acquisition Development Plan for Trepanier Creek, and overview of the Crown *lands of interest*, and the proposed Parks vision statement.
- A description of the location of the proposed Crown *lands of interest*,
- Geophysical properties, ecological, and other perceived natural values of the proposed park and immediate area are discussed.
- Various plant communities, potential presence of "at risk" plant and animal species, recreational values/uses, and the proposed parks ecological significance within the Regional District are described.
- The public and stakeholder consultation process and results are discussed. This section highlights who attended the public open house consultation session, and presents the general feedback/comments received from the attending public and stakeholders regarding the proposed greenway park trail.
- RDCOs legislative roles and responsibilities, and current funding sources that will help finance both the Crown land acquisition process, and maintenance and development of the proposed greenway park trail.
- The requirements of both the Integrated Land Management Bureau's (ILMB) Crown land acquisition process and RDCOs bylaws, as it pertains to the proposed greenway park trail, are also discussed.
- The management objectives, associated issues and actions that the RDCO will have to undertake in order to ensure the success of this proposed greenway park trail.
- And finally, a series of management plan implementation strategies are provided, along with their suggested implementation timelines and associated costs.

2.0 BACKGROUND AND VISION STATEMENT

2.1 History - RDCO Regional Parks and Greenways Plan for the Central Okanagan

A report entitled "A Regional Parks Plan" was presented to the Board of the Regional District of Central Okanagan (RDCO) in 1971 which provided strategic recommendations for the establishment of a "Regional Parks System". The report described the importance of establishing a regional parks system. After several years of debate and discussion between the Regional Board and member municipalities, a Regional Park function was granted to the Regional District by supplementary Letters Patent issued on October 25, 1974 and amended on December 19, 1986. The Regional Parks "function" was converted to an "extended service" on January 22, 1990 through the adoption of Bylaw #410.

In 2007, the RDCO Board approved a ten year Regional park land acquisition strategy. The RDCO has identified seventy properties of interest. In 2007 the RDCO Board supported planning initiatives which included the acquisition and 'License to Occupy' on several priority properties that would support the development of significant Central Okanagan greenway park systems in the Lebanon Creek, Bellevue Creek, Mill Creek, *Trepanier Creek*, Mission Creek and Powers Creek corridors.

Identification of the Trepanier Creek Greenway Trail Plan has been a collaborative effort between the RDCO Board and the Province of British Columbia. The goal will be to formalize the currently unsanctioned and unofficial use of the existing trail through the crown land portion as part of the Trepanier Creek Greenway Regional Park (Figure 2.1). Future management of these interest areas will require a cooperative management (and possibly co-management) approach involving First Nations cultural interests, water utilities, local community groups and other resource management groups.

The focus of the regional park service is to provide benefit to all residents of the Central Okanagan, through the identification, establishment, enhancement and maintenance of "regional" parks or parks and greenway systems that are "regionally significant".

Regionally significant is defined as follows:

"Central Okanagan Regionally Significant Areas are geographic areas that exemplify natural and/or cultural attributes from the region which are considered important to all the residents of the region. These areas must provide opportunities for appropriate outdoor activities that will attract people from throughout the Central Okanagan."



Figure 2.1 Proposed Trepanier Creek Greenway Regional Park *lands of interest*.

This plan proposes to meet the objectives of the *Regional Parks and Greenways Plan* for future regional park land acquisition and management planning will:

... strive to develop a "Greenway Network" of park spaces which represent and help conserve a diverse range of Central Okanagan natural environments. Central Okanagan Greenways will contribute to livability in the region by providing citizens with opportunities to recreate, commute and prosper through the protection of a complete range of area ecosystems.

Guiding principles for implementation of the RDCO Regional Parks and Greenways Plan include:

The RDCO and Municipal Partners regional parks management relationship for greenways will continue to provide for flexibility based on the level of improvements identified for the greenway, geographic character of the trail(s), proximity to intensive urban land uses, and proximity to urban / rural boundaries.

The Plan also states that:

The Regional Trail (Greenways) classification will be established to link provincial, regional and major municipal parks throughout the Central Okanagan. Development of the Regional Trail System will require collaboration with municipal and provincial park partners as well as non-government organizations in the acquisition and development of "greenway" systems that provide both recreational and habitat links to other open spaces.

The *Right to Occupy* the lands of interest will help the Regional District fulfill its short-term goal of providing a greenway network that links Trepanier Creek Greenway Regional Park to Okanagan Lake.

2.2 VISION STATEMENT

The Trepanier Creek Greenway Regional Park provides local residents and visitors with the opportunity to view rare Okanagan forest and riparian ecosystems via a network of natural greenway trails. The greenway park trail is a physical expression of the Regional District's vision for a sustainable future in which the environmental, social, and economic benefits are harmonized. It is an integral component of the Central Okanagan Regional Park system which links regionally significant public spaces throughout the

Regional District of the Central Okanagan. The park is managed by the RDCO and is enjoyed and cared for by the people of the region, and shared with visitors.

Within the regional park system of the Central Okanagan, the Trepanier Creek Greenway Regional Park is designed as a "Greenway Trail Park". The ultimate purpose of the Trepanier Creek Greenway Regional Park is to enhance opportunities for public recreation, connect regionally significant public spaces, and foster public awareness regarding the local environment and the valuable forest and grassland ecosystems, and wildlife that occur in their region.

3.0 BACKGROUND

3.1 Trepanier Creek Greenway Regional Park – Location Map

Figure 3.1 illustrates the location of the Trepanier Creek Greenway Regional Park, *lands of interest*, and surrounding land uses.

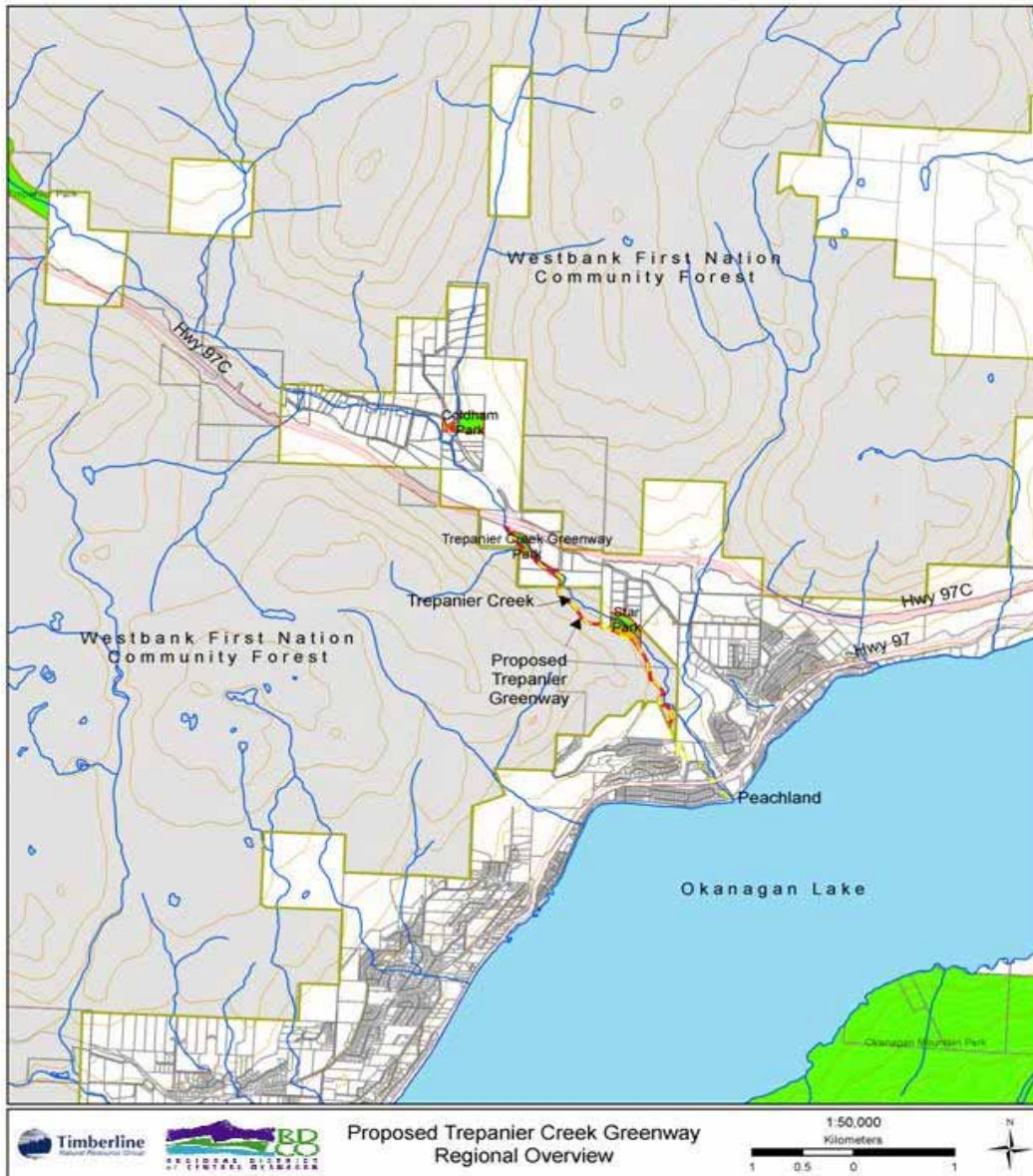


Figure 3.1 Trepanier Creek Greenway Regional Park overview map.

3.2 The Regional District of the Central Okanagan Park System

The Regional District of the Central Okanagan is located in the central section of the Okanagan Valley. The Region encompasses an area of approximately 2,956 km². The unique combination of climate, physical landforms, and ecological landscapes creates a natural environment rich in species diversity and ecosystem variety.

Since 1974, the Central Okanagan Regional Parks and Greenways service program has gradually evolved into a system of 28 regional parks and greenways totaling approximately 1,100 ha. The services are now considered an integral part and important contributing factor to the quality of life and sustainability of the Central Okanagan. The Regional park service is delivered for the benefit of all residents of the Central Okanagan, and emphasizes the landscapes and properties that are regionally unique and significant. This has proved to be a key factor in differentiating the Central Okanagan Regional Parks system from other Regional, Provincial, and Municipal parks and recreational facilities.

The regional system of parks and greenways is classified into the following four classes:

- Conservation;
- Natural;
- Recreation/Cultural/Waterfront; and
- Trails/Greenways.

Regional Conservation Parks are managed for the protection and enhancement of habitat values, vegetation, wildlife, and related ecosystems. The Regional Natural Parks provide opportunities for increased awareness and knowledge of the natural environment within the Central Okanagan. The Regional Recreation/Cultural/Waterfront parks provide varied forms of more active recreation. The Regional Trails/Greenways are established to link provincial, regional and major municipal parks throughout the central Okanagan.

3.3 Historical and Regional Contexts of the Trepanier Creek Greenway Regional Park

Within the Central Okanagan there are a number of major creeks and streams that flow into Okanagan Lake. These natural corridors provide the following opportunities: habitat areas and migration routes for wildlife; the potential to create off-street commuter trails and alternative transportation routes; and, protection of streamside riparian areas.

The Central Okanagan Regional Parks Legacy Program is a ten year land acquisition strategy (2007-2017) that has identified approximately 55 kilometers of creek/stream corridors as potential trails and greenway interests. The expansion of the Trepanier Creek Greenway Regional Park is one of the RDCO's top priorities.

The existing Regional Park encompasses approximately 4.35 ha of land and 900 meters of trail system, and is situated in the suburban and rural

landscape of the District of Peachland. The parkland was purchased using Regional Park Legacy Reserve Funds and has been managed by the RDCO.

There is an existing trail which runs parallel to Trepanier Creek and expands from the south end of 6th Avenue, near the Peachland Mall, south to Okanagan Lake. The existing trail on Crown land is currently managed by the District of Peachland and is being utilized in an unsanctioned and unofficial manner.

The RDCO has a strong commitment to sustainable development practices and this is evidenced by the adoption of "A Central Okanagan Regional Parks Legacy Program – Ten Year Park Land Acquisition Strategy (2007-2017)", which outlines a strategic plan for future regional park development and land acquisition throughout the Central Okanagan. The Crown lands of interest are located along Trepanier Creek and will eventually form part of the Trepanier Creek Greenway Regional Park. By formalizing the existing trail as part of Trepanier Creek Greenway Regional Park it will provide Central Okanagan residents and tourists excellent recreation opportunities. The Trepanier Creek corridor is abundant with natural features that meet the criteria and objectives set out in the Legacy Program and Regional Parks and Greenways Plan for the Central Okanagan.

Phase 1 of the Regional District's goals is to connect a linear greenway from Hwy 97C to the existing trail in the south, which is currently managed by the District of Peachland. The long term goal is to have a functional greenway that connects Okanagan Lake to Trepanier Provincial Park.

3.4 Purpose of the Land Acquisition Plan

In order for the Regional District to acquire crown land in the Central Okanagan West Electoral area, an application must be made to the Ministry of Community Development for sponsorship. The Ministry of Community Development requires that the Regional District provide necessary information on the location and legal description of the land, proposed use of the land, proposed length of tenure, and how the proposal meets the province's standard selection criteria.

The purpose of this document is to provide a development plan that outlines the goals, objectives, guidelines, and strategies for park management and operations. The scope of the plan includes providing rationale and substantiating evidence that addresses the primary objectives.

The *Regional District's Official Regional Parks Plan* sets the direction for management planning of all Regional Parks. This acquisition development/management plan focuses on issues and policies that relate specifically to the Trepanier Creek Greenway Regional Park.

The plan is to establish a set of policies and actions that will define a logical rationale for making management decisions during the development and evolution of the park. To achieve this, the plan will:

1. Focus on the key issues and policies that relate to this regional park, and provide park management direction based upon the best information available;

2. Set out park management goals and objectives for promoting recreational opportunities, while conserving and protecting the natural environment and existing recreational and cultural features of the park;
3. Establish boundaries for the Trepanier Creek Greenway Regional Park;
4. Address issues relating to access (i.e. for recreation, utility maintenance, land management and emergency access) and parking, planned future development(s) beyond park boundaries, and the recognized rights of neighbouring landowners; and
5. Prioritize management actions and implementation strategies.

3.5 The Regional Park Land Acquisition

The Crown *lands of interests* are located along Trepanier Creek. Figure 2.1 illustrates the location of the Crown *lands of interest* in relation to Trepanier Creek, Trepanier Creek Greenway Regional Park, the District of Peachland, Highway 97C (connector), and Okanagan Lake.

The proposed greenway trail will be 10 metres in width, 4.4 km long, and the trail and additional *lands of interest* will comprise an area of 6.5 hectares.

4.0 ECOLOGICAL CONTEXT OF THE DEVELOPMENT PLAN

4.1 Surrounding Lands and Infrastructure

The Trepanier Creek Greenway Regional Park and the proposed Greenway Trail are adjacent to and/or in close proximity to a variety of land uses, which include the following: Trepanier Creek, Highway 97C connector, Highway 97, forested crown land with timber harvesting (Westbank First Nation Community Forest), small private residential acreages, a residential subdivision, community camp grounds and trailer parking, Ponderosa golf course, agricultural operations, such as vineyards and farming operations. The majority of the urban impacts will be realized in the lower reaches of Trepanier Creek, where several commercial and residential areas are located and subject to continued residential growth and development pressures.

There are several multi-purpose natural parks and ecological reserves in close proximity to the Crown *lands of interest*: Trepanier Provincial Park, Darke Lake Provincial Park, and Eneas Lakes Provincial Park. The management objectives of these Provincial Parks are primarily focused on natural environment conservation and public recreation. Both the *Right of occupation* and development of the proposed Greenway Trail will help fulfill both the short-term and long-term goals of the RDCO which are as follows:

- **The short-term goal:** to connect the existing Trepanier Creek Greenway Regional Park to the existing trail South of Highway 97, which is currently managed by the District of Peachland; and
- **The long-term goal:** to have a functional greenway that extends from Okanagan Lake to Trepanier Provincial Park.

4.2 Landform and Physical Attributes

The valley landform of Trepanier Creek Greenway Regional Park and the proposed Greenway Trail is dominated by glacial fluvial materials and, to a lesser extent, by glacial lacustrine materials deposited over 10,000 years ago during the last period of de-glaciation. The landscape was further modified by post-glaciation erosion and deposition via stream hydrological activity. Exposed bedrock faces and deep gullies are visible along a significant portion of the southern extent of Trepanier Creek towards Okanagan Lake (Figure 4.1). Active fluvial deposition is prominent along the Trepanier Creek bottom, producing sensitive riparian ecosystems of high diversity and productivity.



Figure 4.1 Riparian habitat exhibiting bedrock exposure and deep gulleys along a southern extent of Trepanier Creek.

4.3 Recreational Values and Uses

The existing Trepanier Creek Greenway Regional Park covers 4.35 ha and has 1.25 km of walking trails (Figure 3.1). Since the Regional Parks inception, the park and associated trail system(s) have been used by various local and visiting recreational user groups. The recreational uses have been primarily focused upon hiking and walking, mountain biking, and occasional horse riding. The park has also been used by certain groups of naturalists, whose primary interest is viewing and appreciating wild birds, wildlife, and wild flowers, and picking berries.

The trail system within the existing Regional Park is managed and maintained by the Regional District of Central Okanagan (Figure 4.2a). Meanwhile, the trail system outside the Regional Park has been marginally maintained, and is currently being used in an unsanctioned and unofficial manner by local interest groups (Figure 4.2b). The purpose of the Trepanier Creek Regional Park Greenway Trail system is to enhance opportunities for public recreation and to connect regionally significant public spaces, such as Okanagan Lake to Trepanier Provincial Park.



Figure 4.2a Existing Greenway Trail (managed).

Figure 4.2b Existing Greenway Trail (unmanaged).

4.4 Ecological Values and Process

Trepanier Creek watershed falls within the Northern Okanagan Basin (NOB) Ecoregion of the 'Thompson –Okanagan Plateau' Ecoregion. The "ecoregion classification" system, adopted in British Columbia, describes the connection between biodiversity and the combination of landforms and climate processes that occur in a given ecoregion. The NOB is characterized by a wide trench located between the Thompson Plateau to the West and the Northern Okanagan Highlands to the East. Bunchgrass and Ponderosa pine zones are predominate on the lower valley slopes. The mountains and other landforms of this area, the glacial history, and prevailing weather patterns all help to explain the distinct vegetation types and ecosystems that exist in the central Okanagan.

According to the Biogeoclimatic Ecosystem Classification (BEC) system of British Columbia, the Trepanier Creek Greenway Regional Park and proposed Greenway Trail exists almost entirely within the Okanagan very dry and hot Ponderosa pine subzone (PPxh1). The Ponderosa Pine zone (PP) is both the driest and warmest, in summer, forested zone in British Columbia (BC Ministry of Forests, 1991). Ponderosa pine (*Pinus ponderosa*) and Douglas fir (*Pseudotsuga menziesii*) tree species dominate these forested landscapes. The dominant natural disturbance agents affecting the PPxh1 are wildfires, forest insect pests, and diseases. Anthropogenic disturbances affecting this forest ecosystem include the clearing of land for agricultural use, infrastructure development, and maintenance, timber harvesting, and human caused grassland and forest interface fires.

Based upon the landform and topography of the Trepanier Creek Greenway Regional Park and proposed Greenway Trail, the following plants and plant communities are likely to be encountered:

- **Mesic sites:** Ponderosa pine (*P. ponderosa*), minor occurrence of Douglas fir (*P. menziesii*), bluebunch wheatgrass (*Agropyron*)

spicatum), arrow-leaved balsamroot (*Balsamorhiza sagittata*), and Idaho fescue (*Festuca idahoensis*).

- **Drier than mesic sites:** Ponderosa pine (*P. ponderosa*), bluebunch wheatgrass (*A. spicatum*), arrow-leaved balsamroot (*B. sagittata*), Sandberg's bluegrass (*Poa sandbergii*), and big sagebrush (*Artemisia tridentata*).
- **Wetter than mesic sites:** Ponderosa pine (*P. ponderosa*), Douglas fir (*P. menziesii*), trembling aspen (*Populus tremuloides*), paper birch (*Betula papyrifera*), black cottonwood (*Populus balsamifera* spp. *trichocarpa*), common snow berry (*Symphoricarpos albus*), Nootka rose (*Rosa* sp.), birch-leaved spirea (*Spiraea betulifolia*), tall Oregon-grape (*Mahonia aquifolium*), Douglas maple (*Acer glabrum*), Saskatoon (Serviceberry) (*Amelanchier alnifolia*), water birch (*Betula occidentalis*), red-osier dogwood (*Cornus stolonifera*), bluebunch wheatgrass (*A. spicatum*), junegrass (*Koeleria macrantha*), pinegrass (*Calamagrostis rubescens*), star-flowered false Solomon's-seal (*Smilicina stellata*), and violets (*Viola* sp.)

The Trepanier Creek Greenway Regional Park and Greenway Trail is located predominately on the lower and toe mesoslope positions of the Trepanier Creek drainage. The slopes are moderate to steep, with a north east aspect, suggesting that these are typically cooler sites. Hence, the combination of mesoslope position, aspect, and close proximity to Trepanier Creek, would suggest that the wetter than mesic sites, riparian ecosystems, will be more prevalent than the drier than mesic sites within the project area.

In addition, a significant portion of the land base that lies within and adjacent to the Trepanier Creek Greenway Regional Park and proposed Greenway Trail has been classified as both an Old Growth Management Area (OGMA) and Environmentally Sensitive Area (ESA) by the Ministry of Forests and Range (MoFR) and the Ministry of Environment (MoE) (Figure 4.3). OGMAs are areas that have been identified across portions of the provincial landscape that could be used to promote the conservation of old growth forest biodiversity elements within our forest ecosystems. OGMAs form an important part of the Landscape Unit Planning Guide (LUPG) and Land and Resource Management Plans (LRMPs) planning process requirements, which attempt to balance biological sustainability, community stability, and economic security.

The Trepanier Creek drainage has also been designated as a community watershed, providing domestic drinking water and irrigation supply to the residents of the District of Peachland (District of Peachland, 2009). The water resources include both surface water (streams) and ground water. The maintenance and protection of water quality and associated riparian ecosystems are potential management issues to address within this plan.

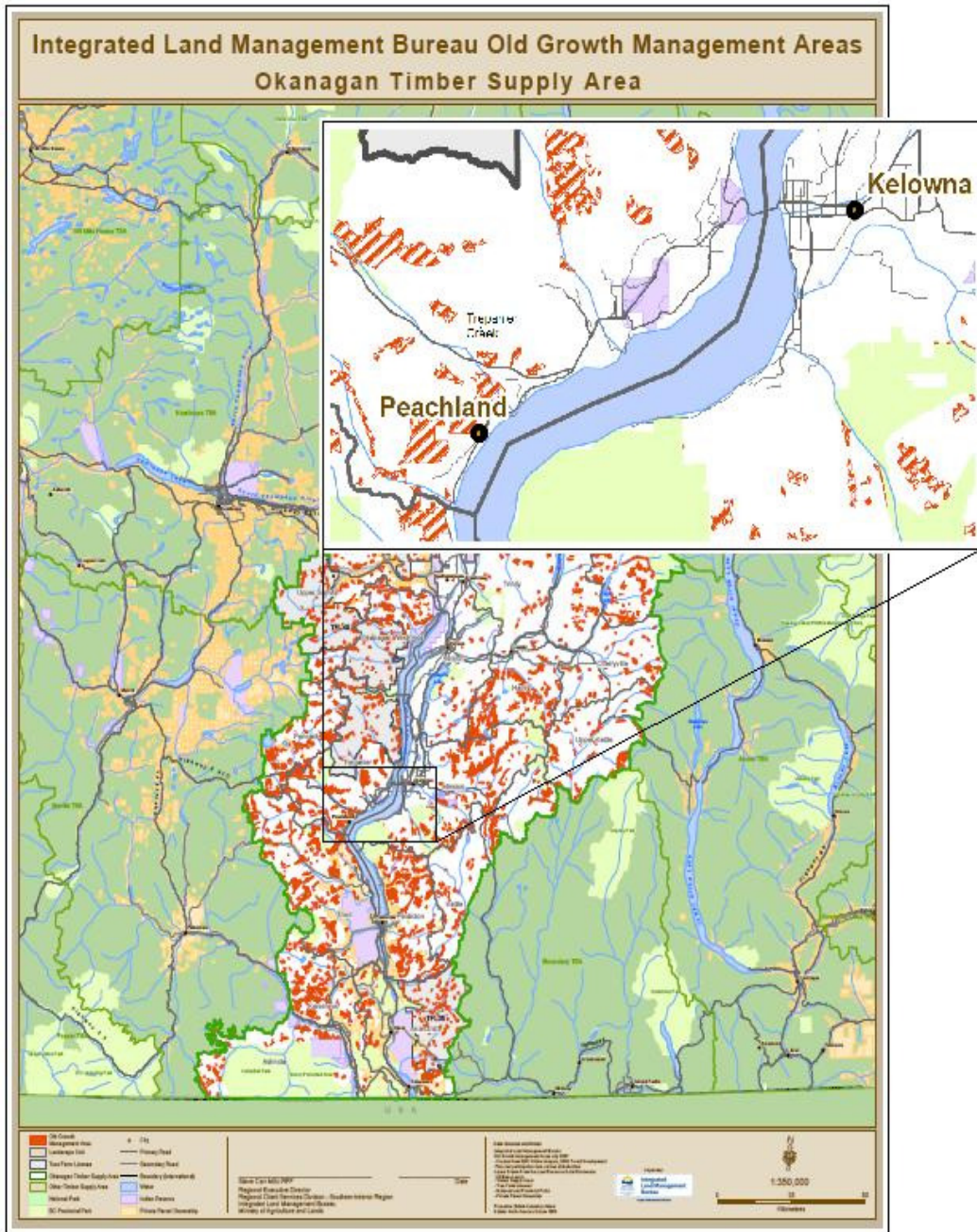


Figure 4.3 Old Growth Management Areas in the Okanagan Timber Supply Area (Note: red cross-hatched areas have been identified as OGMAs) (Source: Integrated Land Management Bureau, 2007).

4.5 Plant and Animal Species at Risk

The British Columbia Conservation Data Center (CDC) tracking lists indicate that there are potentially 12 natural plant communities that are considered to be "at risk" (red or blue listed by the CDC) in the Trepanier Creek area (i.e., PPxh1). It is anticipated that six of these "at risk" plant communities could be found within the Regional Park and proposed Greenway Trail area, given the landform, topography, soil, and micro-climate conditions that exist. The likely occurring plant communities 'at risk' include the following:

- Ponderosa pine – bluebunch wheatgrass - Idaho fescue;
- Ponderosa pine - red three-awn;
- Ponderosa pine - bluebunch wheatgrass - rough fescue;
- Douglas-fir - common snowberry – pinegrass;
- Douglas-fir - common snowberry - birch-leaved spirea; and
- Douglas-fir - water birch - Douglas maple.

In addition to the above listed provincial plant ecosystems 'at risk', the RDCO has identified a list of environmentally sensitive areas and valued ecosystem components that they wish to have represented in their Regional Park system, which include riparian ecosystems, alluvial forests, old growth forests, and connective wildlife movement corridors. A gap analysis exercise of ecosystem representations among the RDCO's existing Regional Parks, identified that 4 out of 20 sensitive and important ecosystem categories in the Regional District were under and/or not represented, and include the following:

- Broadleaf Woodland – aspen seepage (BW:as);
- Grassland – shrubland (GR:sh);
- Riparian – River (RI:ri); and
- Wetland – swamp (WN:sp).

Timberline conducted both a site visit and reviewed 1:20,000 colour stereomimagery (circa 2008) in the softcopy environment in the *lands of interest* area, and have determined that two categories of under represented ecosystems, Broadleaf Woodland – aspen seepage (BW:as) and Riparian – River (RI:ri), were highly likely to occur within the Trepanier Creek Greenway Regional Park and proposed addition to Trepanier Creek Greenway Regional Park (Figure 4.4a and Figure 4.4b).



Figure 4.4a Trepanier Creek – (RI:ri).

Figure 4.4b Broadleaf riparian ecosystem (BW:as).

The presence and distribution of "at risk" wildlife species in the Trepanier Creek Greenway Regional Park and proposed Greenway Trail has not yet been determined. The habitat types present within the Regional Park and proposed trail system suggest that both large and small mammal, reptile, amphibian and bird species may reside here and/or forage in the area. There are approximately 60 "at risk" CDC-listed wildlife species in the Okanagan Region. The following is a list of potential "at risk" (blue and red listed) wildlife species that could be found residing and/or foraging within or around the Regional Park and proposed Greenway Trail:

- Yellow-breasted chat (*Icteria virens*) – red listed (Figure 4.5a),
- Spotted bat (*Euderma maculatum*) – blue listed;
- Fringed myotis bat (*Myotis thysanodes*) – blue listed;
- White-headed woodpecker (*Picoides albolarvatus*) – red listed;
- Lewis's woodpecker (*Malanerpes lewis*) – red listed;
- Western rattlesnake (*Crotalus viridus*) – blue listed;
- Yellow bellied racer snake (*Coluber constrictor* spp. *mormon*) – blue listed;
- Gopher snake (*Pituophus catenifer*) – blue listed;
- Western small-footed myotis bat (*Myotis ciliolabrum*) – blue listed;
- Tiger salamander (*Ambystoma tigrinum*) – red listed;
- Western harvest mouse (*Reithrodontomys megalotis*) – blue listed; and
- Flammulated Owl (*Otus flammeolus*) – blue listed (Figure 4.5b).

While large mammals, such as black bear, coyote, moose, and deer, are not listed species, they are considered to be of particular interests in park use and management. The park area has been known as a very productive area for mule deer winter range due to its natural and old growth forest structure.



Photo: George Peck

Figure 4.5a Yellow-breasted chat.



Photo: Rick and Nora Bowers

Figure 4.5b Flammulated owl.

4.6 Other Resources and Cultural Values

Initial field reconnaissance found that a number of indigenous plant species such as Saskatoon (*A. alnifolia*) and red-osier dogwood (*C. stolonifera*) are prevalent within and around the Regional Park and proposed Greenway Trail. These indigenous species were considered culturally important to the local indigenous First Nations population.

5.0 PUBLIC AND STAKEHOLDER CONSULTATION

5.1 Public Information Process

The public information process involved identification of key stakeholders. Information regarding the RDCO's Regional Park Crown Land Acquisition Plan for the crown *lands of interest* on Trepanier Creek within the Regional District boundaries was forwarded to the key stakeholders. Follow-up phone calls were then made to key stakeholders to solicit feedback and ensure that they were aware of the upcoming public information session. The public information session was advertised in the local paper, and information boards were developed, which outlined the background, goals and objectives of the proposal. A map (Figure 2.1) illustrating the spatial location of the proposed *lands of interest* (i.e. the Greenway Trail and the additional parcel of land adjacent to Star Park) was produced to ensure the following:

- provide a medium so that all stakeholder's could visually see the spatial location of the proposed *lands of interest*;
- to enable all stakeholders to identify whose interests and/or land holdings may be affected by the spatial location of the proposed *lands of interest*; and
- to stimulate stakeholder discussion and/or concerns that they might have regarding this Trepanier Creek Regional Park Crown Land Acquisition Development Plan/Management Plan.

5.2 Participating Members

The following is a list of key stakeholders (See Appendix I) that attended the public information session:

- Peachland Recreation Director
- Westbank First Nations
- District of Peachland
- Central Okanagan Naturalists Club
- Central Okanagan Land Trust
- BC Horsemen Association
- Mountain Bikers of the Central Okanagan
- Community Recreational Initiative Society
- Fish and Game Club
- Central Okanagan Search and Rescue
- ATV Club
- Outback ATV Club of Kelowna
- Canadian Earthcare Society

- Kelowna Prospectors
- Adventure Racing Club
- Alpine Club of Canada
- Central Okanagan Hiking Club
- Volkssport Walking Club Peachland
- Lonely Loons Fly Fishing Group
- Peachland Sportsmen Association
- Okanagan Collaborative Conservation Program
- Kelowna Dirt Bike Club
- Okanagan Basin Water Board
- Telemark Cross Country Ski Club

The stakeholders listed above were a combination of unsolicited guests (i.e. they attended the meeting based on personal interest and were not contacted via the community engagement process) and solicited guests, via the community engagement process.

5.3 Key Stakeholder & Public Response

Interviews with the key stakeholder groups were conducted via the phone and at the public information session. The key question asked was:

"Do you support this proposal to formalize the existing trail system into the Trepanier Creek Greenway Regional Park system through the implementation of a Regional Park Crown Land Acquisition Plan?"

The overwhelming response was positive with little or no negative responses to the proposed plan. Many of the representatives at the Public Information Session were speaking on behalf of the members of their respective community organizations. Private landowners expressed concern about the fact that a small portion of the proposed Greenway Trail passes through their private property.

The Westbank First Nation Community Forest has also expressed concern regarding the location of the proposed trail through their operational landbase. They fear that increased recreational traffic, via foot, bike, horse, and motorized vehicle (i.e. dirt bikes and ATVs) could increase the risk of a human caused interface fire.

Due to the limited time permitted, a direct survey was not conducted.

5.4 Key Stakeholder & Public Information Feedback

Please refer to Appendix II for a complete list of stakeholder and general public responses that were recorded at the Public Information Session held at the Trepanier Creek Greenway Regional Park kiosk on August 19th, 2009.

6.0 PARK BOUNDARIES

6.1 Park Setting, *lands of interest*, and land status

The Trepanier Creek watershed area is approximately 25,800 hectares in size, and is predominately located upon Crown lands. The creek's headwaters originate from the Peak of Mount Gottfriedsen in the Thompson Plateau, and flows south into Okanagan Lake, just north of the community of Peachland. The headwater reaches of Trepanier Creek are deeply incised relative to the other streams and tributaries in the Trepanier Landscape Unit (TLU).

The proposed Greenway Trail is approximately 2 km in length. The trail originates approximately at Trepanier Creek / Highway 97C overpass running south as part of the Trepanier Creek Greenway Regional Park for 1km, then joining an existing trail on crown land (area of interest) that ends approximately 175 m north of 6th Avenue in Peachland (Figure 2.1). The trail then continues from 6th Avenue, descends the slope exiting on Clement Avenue next to Peachland Elementary, then following Clement Avenue and passing under a Highway 97 heading towards Okanagan Lake and ending at Beach Avenue in Peachland. The portion of the Greenway Trail between Beach Avenue and Highway 97 is currently operated and maintained by the District of Peachland.

The proposed Greenway Trail acquisition plan predominantly includes Crown tenured land. The proposed trail is contiguous with the exception of a 60 metre section which is located on private land adjacent to Star Park (Figure 6.1).

Current and prior identified interests in the proposed *lands of interest* include:

- Forestry;
- Mining;
- Grazing;
- Agriculture (range, vineyards, orchards, pasture, and crops);
- Recreation; and
- Urban (commercial, industrial, and residential)

Urban development is likely to have the biggest future impact on the proposed Trepanier Creek Greenway Trail system. Population growth in the immediate area is expected to increase by 65% over the next 20 years.



Figure 6.1 Private land (Note: the pink line illustrates the extent of the 60m section of proposed trail located on the private land parcel just west of Star Park).

(NOTE: A series of digital shapefiles will be provided with the *Lands of Interest*, and private land parcel identifiers – See Figure 2.1).

Table 1 outlines the prior interests, stakeholders, parcel ID, and the parcel administrator of the Crown *lands of interest*. Figure 2.1 illustrates the parcel identifier numbers (PID) associated with each section of private property affected by the proposed trail.

Table 1. Interests.

Parcel #	Acquisition Rationale	Prior Interests	Comments	Purpose – Stakeholder	ID	Administrator
		Statement of Intent		Treaty – Westbank First Nation	n/a	
Trepanier	Greenway	Notation of Interest	entire AOI – interests: deer winter range, parkland, lack of public access id'd	Green space – on behalf of DoP	File 3408502	ILMB
		Statutory R/W		Waterline – DoP	File 3403010	ILMB
		Land Act Reserve	Likely MoT consent req'd	Planning Coquihalla Phase III	File 3405304	ILMB
		Grazing License		Grazing – Mackenzie, Kathleen	RAN73272	MoFR
		Occupant LTC		Maintenance – MoT	YK576	MoFR
		Community Forest Agreement		Community Forest – WFN	K1P	MoFR
		Trapline		Trapping	TR0808T038	MoE
		Map Note		see e-mail from Bernie in Park file (Status)	MN0821	MoFR
		Guide Outfitting Permit		Guide Outfitting – Marc Hubbard	800419	MoE

The majority of the *lands of interest* are managed by the provincial Crown. The areas adjacent to the proposed *lands of interest* are administered by the District of Peachland, Westbank First Nations Community Forest, the newly formed District of West Kelowna, and RDCO.

The RDCO has previously purchased a parcel of land (i.e. the Trepanier Creek Greenway Regional Park) at the northern extent of the *lands of interest* as outlined within the plan. The previously purchased lands are referred to as part of the Trepanier Creek Greenway Regional Park. Another small portion of land, that lies directly adjacent to and south of Star Park has also been identified as Crown *lands of interest* (Figure 2.1). Although mention of further acquisitions has arisen through the public consultation process, the RDCO has not identified any further parcels as *lands of interest* for acquisition. The guidelines and criteria for the acquisition of regional parks

and trails are outlined in the *RDCO Official Regional Parks Plan*, and apply to all areas of interest.

The regional parks acquisition guidelines are as follows:

- Acquire land for regional parks and trails based on fair market value, and a willing buyer and seller;
- Whenever possible, RDCO Parks will work in partnership with community groups, land trusts, and other levels of government to acquire land;
- Acquire property in accordance with the Official Regional Park Management Plans, giving careful consideration to operating and program needs, RDCO Parks' financial position, and timing factors that affect the sale of the property; and
- Before acquiring land or land rights, RDCO Parks will prepare an acquisition evaluation for the proposed land, based on the best available information, to determine its consistency with *the Official Regional Parks Plan* or park management plan and its suitability as an addition to the regional parks and trails system.

As stated earlier in the Vision Statement, the goal is to create a contiguous Greenway Trail network which links Trepanier Provincial Park to Okanagan Lake. Future lands of interest will be identified in subsequent applications.

6.2 Legislative Roles and Responsibilities

A Regional Parks and Greenways Plan was adopted through Letters Patent on October 25, 1974. The proposed guiding principles for implementation of the Plan state that:

"The RDCO and Municipal Partners regional parks management relationship for greenways will continue to provide for flexibility based on the level of improvements identified for the greenway, geographic character of the trail(s), proximity to intensive urban land uses, and proximity to urban / rural boundaries."

The Trepanier Creek Greenway Regional Trail was identified as a future municipal greenway to be managed through a RDCO and municipal partner relationship in order to meet the guiding principles described above.

The goal of this report is to develop a Regional Park Crown Land Acquisition Development Plan/Management Plan for Crown lands on Trepanier Creek within the Regional District boundaries for the purpose of establishing a formal greenway trail. This report will accompany the Crown Land Tenure (License of Occupation) application to be submitted by the Regional District to the British Columbia Integrated Land Management Bureau (ILMB).

Under the British Columbia Land Act (RSBC 1996) the minister poses broad powers for approval. The Land Act states that the:

Minister may dispose of Crown land:

(1) Subject to compliance with this Act and the regulations, the minister may dispose of surveyed or unsurveyed Crown land by any of the following means, as the minister considers advisable in the public interest, to a person entitled under this Act:

- (a) application;*
- (b) public auction;*
- (c) public notice of tender;*
- (d) public drawing of lots;*
- (e) public request for proposals;*
- (f) listing with a brokerage licensed under the Real Estate Services Act;*
- (g) land exchanges.*

(2) The minister may, under subsection (1),

- (a) sell Crown land,*
- (b) lease Crown land,*
- (c) grant a right of way or easement over Crown land, or*
- (d) grant a license to occupy Crown land.*

(3) In a disposition of Crown land under this section, the minister may impose the terms, covenants, stipulations and reservations the minister considers advisable, and without limiting those powers, the minister may impose some or all of the following terms:

- (a) the applicant must personally occupy and reside on the Crown land for a period set by the minister;*
- (b) the applicant must do that work and spend that money for permanent improvement of the Crown land within that period the minister requires.*

The planning of the Trepanier Creek Greenway Trail has also been taken into consideration within the Okanagan-Shuswap LRMP (Land and Resource Management Plan) and the Trepanier Landscape Unit Water Management Plan.

Other applicable Provincial acts include:

- Forest and Range Practices Act;
- Park Act; and
- Wildlife Act.

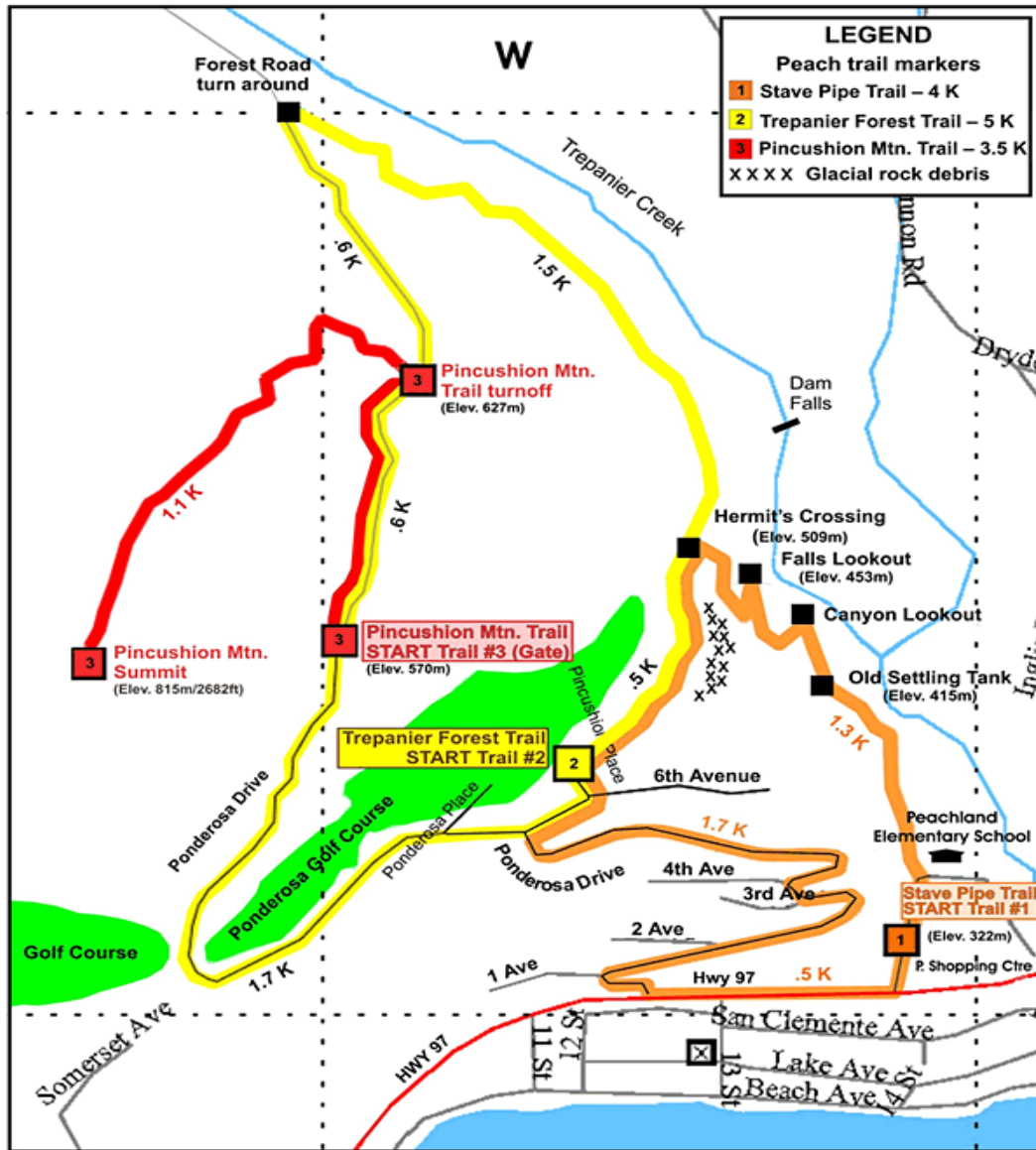
As stated in the Trepanier Landscape Unit Water Management Plan, the benefits of creating legal management directions include:

- Provides certainty;
- Protects sensitive resource values;
- Reduces conflict; and
- Helps to maintain a balance between ecological and economic values.

The District of Peachland has produced a map which illustrates the existence of several informal trails that currently exist within the vicinity of the Crown *lands of interest* (Figure 6.2). Granting the *license to occupy* for the Crown *lands of interest*, as identified within this report, will allow the continuation of the existing trail network planning and creek enhancement programs that are currently being carried out by the District of Peachland and local community groups.

The combined Trepanier Creek Greenway Trail, consisting of the existing and proposed sections of the Greenway Trail, would fall within the jurisdictions of both the RDCO and District of Peachland. The District of Peachland's Official Community Plan (Bylaw # 1600, 2000) contains goals, objectives and policies pertaining to trails, parks and natural areas. The associated powers of an Official Community Plan are derived from Section 875 of the Local Government act, which allows for among other things, the municipal/regional district government to develop a "*general statement of broad objectives and policies of the local government respecting form and character of existing and proposed land use and servicing requirements in the area covered by the plan.*"

The District of Peachland would maintain jurisdiction over the portion of the Greenway Trail that it currently maintains between Highway 97 and Okanagan Lake, while the RDCO would maintain jurisdiction over the remainder of the proposed trail that extends north of Highway 97 to Highway 97C.



Pincushion & Trepanier Trails– Peachland BC
Figure 6.2 Existing trail networks in the District of Peachland.

6.3 Tools and Future Financing for the Regional Parks and Greenways System

Financing for the establishment, improvement, management, and maintenance of the proposed Greenway Trail will be provided through general taxation for the Regional Park service. Future financing for the Regional Parks and Greenways System will be planned for through five year annual financial plans and a performance based service delivery review via the following management goals and program activities:

Management Goals:

- Provide region-wide leadership in conservation and environmental stewardship through partnership, education, advocacy and management practices;
- Conserve a complete range of ecosystems and regionally significant natural areas;
- Provide and protect regionally significant park and trail opportunities that cross jurisdictional boundaries;
- Provide and protect access to Crown properties, Okanagan lakes and valley trails; and
- Conserve regionally significant human heritage features.

Program Activities:

- Protect and maintain our assets;
- Provide more outdoor opportunities close to home;
- Enrich the park experience;
- Conserve ecosystems for life – together;
- Build partnerships and alliances;
- Keep our parks safe, clean, and well maintained; and
- Secure today for tomorrow.

6.4 ILMB – Community and Institutional Use Requirements

The application for the *License of Occupation* for the Trepanier Creek Greenway Trail to the Ministry of Community Development and Integrated Land Management Bureau involves submission of the following information:

- The proposed activity/activities;
- Where and when the activity/activities will occur;
- Other users on the same site;
- Resource and environmental values; and
- How any negative impacts can be minimized.

The information contained within this report addresses the requirements listed above. The Provincial Standard Selection Criteria includes, but is not limited to, the following criteria:

- **Proposal meets regional, local or first nations community priorities:**

Identification of the Trepanier Creek Greenway Trail Plan has been a collaborative effort between the RDCO Board and the Ministry of Transportation and Infrastructure (MOTI). The District of Peachland has been a strong advocate of this greenway trail initiative. In addition, the Regional Board supports proposed greenway trail as it fulfills two of their main goals, to secure greenways and properties that possess ecosystem representations identified in gap analysis exercises. The Regional Districts commitment to the Trepanier Creek Greenway Trail Plan involves securing land that extends north of Highway 97 to the existing Trepanier Creek Greenway Park.

- **Generates local or regional economic benefits:**

One of the key economic generators for the District of Peachland has been the draw of tourists to their revitalized waterfront. Formalization of the Trepanier Creek Greenway Trail system builds upon the nature oriented community amenity currently existing within the community. Upon completion of the Trepanier Creek Greenway Trail Network, a draw for safe, educational and nature oriented recreation will attract people from across the region and beyond to participate in culturally and ecologically informed walking/hiking activities.

- **Contribution to community health, safety or education:**

By linking the existing lower portion of the Trepanier Creek Greenway Trail Network to the existing Star Park, and the purchased lands at the northern extent of the Crown *lands of interest*, a managed trail system free of hazards and clear signage will raise the awareness and usage of the walking/hiking trail network by both local residents and tourists alike. There is a significant level of man made history and ecological history within the area and a managed greenway will provide the opportunity to inform more people of these histories as well as providing the opportunity for co-management of the trail network itself. Included within the management /operational plan will be a bear aware (safety) initiative to further increase the safety of future users.

- **Supports sustainable infrastructure development:**

By formalizing and managing the unauthorized use of the trail, opportunities arise to provide both connectivity to the existing unmanaged trails within the area as well as the 'off-site' infrastructure, sidewalks, cul-de-sacs, and existing park facilities.

- **Contribution to environmental quality:**
As outlined in Section 4.0, several rare and endangered species may exist within or adjacent to the proposed Crown *lands of interest* due to the uniqueness of Trepanier Creek and the surrounding forest. By formalizing the Greenway Trail system, access to these ecologically sensitive areas will be more controlled and limited where necessary. The trail will be operated and maintained to enhance and improve site conditions and where required restore natural areas previously disturbed due to unsanctioned activities.
- **Other support (\$or in kind) contingent on access to Crown lands:**
Additional support may be provided by the Central Okanagan Land Trust. This organization has helped with the purchase and acquisition of Regional Park land via in-kind and financial donations. Approval of the current application will move the Greenway Trail planning closer to achieving the goal of establishing a regionally significant park / greenway for the entirety of the Trepanier Creek.

6.5 RDCO Bylaw Requirements

Growth management within the Central Okanagan is governed and directed by the *Growth Management Strategy for the Regional District of Central Okanagan* – Bylaw No. 851, 2000. The Regional Statement on Growth Management is the statement of regional goals, and indicates how local governments within the Central Okanagan will contribute to the achievement of the 20/20 Vision. The Bylaw contains many guiding policies and strategies related to the establishment of a Regional Greenway Trail Network System including, but not limited to, the following:

- We are committed to taking purposeful action to retain and enhance the quality of life within the Central Okanagan through effective planning and the management of growth;
- We will work cooperatively to develop governance structures that require and allow us to deal, in a timely manner, with regional issues at a regional level. We recognize that all local governments must have a meaningful role in regional decision making. We recognize that all local governments must pay a fair share of the cost of addressing regional issues;
- We will ensure that tax dollars and public funds are spent wisely. Development and governance decisions will consider our ability to provide, and pay for community services and facilities;
- We recognize that economic development is a responsibility shared among governments, industry and communities. We will work with other levels of government, industry and our residents to create more sustainable urban and rural communities;

- We recognize that our environment is fragile and our natural resources are limited. Our growth management decisions will respect the carrying capacity and quality of our water, air and land;
- We recognize that much of the Growth Management Strategy is about providing for our children. Our development decisions must respect their right to a healthy, safe, and sustainable community. Our day-to-day decisions will work toward this transfer of stewardship by investing wisely in community services and facilities, preventing environmental harm to the greatest extent possible, and promoting long term economic development that is capable of sustaining our next generation; and,
- We recognize that we are a region within a region. As part of the larger Okanagan Valley, we are responsible stewards for the environment. We promote the on-going communication and cooperation with all our neighbours.

All local government bylaws, such as the District of Peachland's Official Community Plan, must adhere to the directives and direction set out within the Regional Growth Strategy. Development of a Regional Park function in 1974 and amended on December 19, 1986, the conversion of the "parks function" to an "extended service" on January 22, 1990 through the adoption of Bylaw #410, and the development of the Regional Parks and Greenways Plan For The Central Okanagan (2008-2020) are all consistent with the policies set out within the Growth Management Strategy.

7.0 TREPANIER CREEK GREENWAY REGIONAL PARK MANAGEMENT PLAN

7.1 Management Objectives

The Trepanier Creek Greenway Regional Park is designated as a Regional greenway trail based upon the existing park classification system. This designation defines, in general terms, the management objectives of the park. The primary purpose of the Regional greenway trail is to link provincial, regional, and major municipal parks throughout the central Okanagan, while providing benefits of recreational activities and natural environment conservation.

Although the park classification sets out the general context for the greenway trails management, each park/greenway has its own context in terms of trail development/maintenance, environmental conditions and sensitivities. The specific management objectives of the Trepanier Creek Greenway Regional Park are to:

1. Provide regional residents and visitors of all ages and interest groups with the opportunities for a range of outdoor experiences and activities;
2. Provide essential services and facilities that will have minimal impact on the natural environment, address public safety and security, and foster enjoyment and appreciation of the regional parks/greenways;
3. Identify sensitive features and ecosystems and promote the preservation and enhancement of natural resources in the park, and minimize negative impacts from human uses on natural environments, including riparian and upland habitat, endangered species, sensitive ecosystems, riparian habitat, and water quality;
4. Provide educational opportunities to park users and other interested groups about the natural environment, resource values and uses, and stewardship responsibilities, through the mediums of information pamphlets, kiosks, interpretation signage, and the regional park web page; and
5. Maintain and promote effective communication and working relationships with the park partners including the District of Peachland, First Nations, and other government agencies, and stake holders.

7.2 Management Issues and Actions

Several important management plan issues have been identified over the course of this project, and are summarized below:

1. Public Access and Parking;
2. Trail Enhancement and Maintenance;
3. Public Safety and Security;

4. Inventory and Mapping;
5. Protection of Natural Environment;
6. Forest Health and Fire Management Planning; and
7. Education and Environmental Interpretation.

Based upon a detailed analysis of the above stated management issues, a series of management actions/issue solutions have been proposed. These actions/solutions are described in the following sections.

7.2.1 Public Access and Parking

Adequate public access exists at either end of the proposed Greenway Trail system. The north end of the existing Trepanier Creek Greenway Regional Park, occurring at the intersection of Highway 97 C and Trepanier Creek, has existing parking and infrastructure already in place. Currently, a public information kiosk, a reasonable sized parking lot, and a creek bridge that connects the parking lot to the existing Regional Park exists. Depending on future public demand and use, the parking lot may have to be expanded. The expansion would require using RDCO jurisdictional lands directly adjacent to the existing parking lot.

The entrance to the south of the proposed Greenway Trail will need to be improved to promote better public access. In particular, a parking lot and public information kiosk should be built by the Peachland Mall, where the existing portion of the Greenway Trail already exists.

- the development of a connector trail to join Star Park to the proposed Crown *lands of interest* (i.e. the Greenway Trail and additional parcel of land adjacent to Star Park);
- the development of a bridge that spans across Trepanier Creek, connecting Star Park to the Crown *lands of interest* on the west side of the creek;
- the installation of a public kiosk between Star Park and the Crown *lands of interest*; and
- the possible development of a parking lot in Star Park if deemed necessary.

The RDCO will install appropriate park signage at all major access points, including staging areas and trails heads. The park will discourage the entry of any motorized vehicles through appropriate fencing, information, and education.

7.2.2 Trail Enhancement and Maintenance

Sections of the existing and proposed Greenway Trail system will require the following enhancement activities:

- Widening of the trail and removal of vegetation and debris within the trail right of way;
- Assessing and removing danger trees and debris, such as large rocks, along the trail and at staged vantage points;

- Fencing should be constructed where required to protect the public and private lands; and
- Installation of benches at selected vantage points along the trails extent (Figure 7.1).



Figure 7.1 Viewpoint 1 – Potential viewpoint into the Trepanier Creek canyon (See Figure 2.1 for viewpoint location).

The guiding principle is to complete the construction of a 'clearly defined' multi-use trail system which minimizes trail "braiding" and compaction of natural soils in the park. Trails will be carefully designed near riparian areas and steep slope sections of the park for the purpose of protecting sensitive environments and ecosystems.

Continuing maintenance and improvements to the existing trail system and associated amenities (e.g., bear-proof trash cans, signage etc) will be needed to facilitate and enhance public use of the park. Additional new trails can also be developed to provide improved connectivity between the park and surrounding residential areas. The trail maintenance will also include

habitat restoration and reclamation in areas that have been damaged from unsanctioned park use.

Trail maintenance activities must be performed to minimize soil erosion, including maintaining drainage features on steep sections of the trail and closing down unauthorized "short-cut" trails that damage vegetation and disturb soils. Careful design of the trail system within the park is important to both the area's aesthetic and environmental integrity. Wherever possible, trails should be located outside of streambeds. Elevated trails, boardwalks, can be installed in wetter riparian areas to minimize soils and habitat impacts if necessary.

7.2.3 Public Safety and Security

The Greenway Trail can be an asset or a liability. If the trail is easy to secure and maintain, it will be an asset to the Regional District. However, if the design components are ill conceived, the trail could prove to be a liability, and a deterrent to the success of the park objectives.

Danger tree assessment and falling on either side of the trail remain critical components of hazard management and risk reduction for the park, in light of the current mountain pine beetle epidemic and tussock moth infestation. Hazardous tree assessments will be performed and trees felled where deemed necessary. Portions of the tree trunks may be retained as seedbeds/nurseries for future trees. Single trees or contiguous forest stands infected with disease and/or killed by insects may be vulnerable to windthrow and will require investigation for intervention, and possibly their removal if they are assessed as being hazardous to the public.

Sections of steeper and potentially slippery slopes may require gravels for trail surfacing or the installation of stairs.

The park will be operated and maintained with public safety as a primary consideration.

7.2.4 Resources Inventory and Mapping

It is difficult to prescribe management objectives for natural environment conservation without adequate baseline information regarding the specific resources and values that exist in the park. The completion of resource inventories and mapping of the Trepanier Creek area remain a priority. There are several resource inventories that could be completed and they include:

- recreational features and uses;
- plants and plant communities (i.e. Vegetation Resources Inventory, Predictive Ecosystem Mapping, and Terrestrial Ecosystem Mapping, to name but a few);
- invasive species;
- wildlife species and habitat;
- endangered species; and
- sensitive ecosystems.

All resources and values will be mapped using the most current mapping standards available in the province of British Columbia.

The current state of the natural environment and ecosystems will be determined by these detailed inventories. The inventories will provide the baseline/bench mark data for park management, and assist them with the maintenance, enhancement, and restoration of any areas damaged by human activity.

7.2.5 Protection of the Park Natural Environment

Environmental protection is the careful conservation, use, and planned management of a natural system(s) and its vital process, to prevent their depletion, exploitation, destruction or waste.

While recognizing the park's primary function as a greenway trail for recreation and as a wildlife corridor, protecting the natural environment is another core value of the RDCO park system. This encompasses all aspect of the natural environment, including land, air, water, plants and wildlife.

The Trepanier Creek Greenway Regional Park has extensive riparian ecosystems, which provide valuable habitats for a diverse array of plant and animal species. While the use of the park by visitors will undoubtedly increase, the natural environment, including species at risk and sensitive ecosystems, must be protected. Balancing these competing needs has always been a park management challenge.

The Trepanier Creek Greenway Regional Park potentially supports several endangered species and multiple plant communities at risk. Conservation of rare, threatened and endangered species of plants and animals and their natural habitats remains an important objective of park management. The Park will be managed using an ecosystem based approach, in that, all system components will be cared for in a way that promotes the natural process of system evolution. Alterations to the natural environment (i.e. removal of trees and other vegetation) in the park are permitted ONLY if the objective is to enhance ecological values such as plant and animal habitat, ensure public safety, minimize the risk of high forest and grassland wildfire fuel loads, and prevent damage to the park facility.

The park will endeavor to concentrate facilities and activities in areas that have low to moderate sensitivities. No off-leash dog areas or trials are planned in the park, due to site availability, concerns about impacts on vegetation and wildlife, and potential conflicts with other visitors.

7.2.6 Forest Health and Fire Management Planning

The Ponderosa Pine Biogeoclimatic unit (PPxh1) has a wildfire return interval of approximately 15-25 years. The fires are typically of high frequency and low intensity, burning up fuel loads on the forest floor and killing ladder fuels in the process. The native trees, such as *P. ponderosa* and *P. menziesii*, shrubs, grasses and herbs are well adapted to survive and regenerate after such fires.

The fires are a result of natural and anthropogenic causes. Natural wildfires are largely the result of a combination of lightning strikes and a general lack of moisture.

The current provincial fire suppression strategy has dramatically increased the fire hazard within the PPxh1 BEC unit. Fire suppression practices have allowed fuel loads on the forest floors to accumulate, and allowed the establishment of increased ladder fuels (i.e. the presence of more pole and sapling tree species in the forest understory). The fire risk is also exacerbated by the continued spread of the mountain pine beetle, which is expected to kill almost every mature pine tree in the existing and proposed Trepanier Creek Greenway Regional Park.

The increased public use of the park and surrounding areas, and the continued accumulation of forest floor fuel loads, will further increase the fire hazard risk both within and outside the park. Immediate efforts will be made to coordinate emergency fire response planning with other relevant agencies, such as the Ministry of Forests and Range, local District and Volunteer Fire Departments. A fire and forest health management strategy for the park will be developed prior to the 2010 fire season.

Continued efforts in fuel load management and fire risk reduction will be the key to achieve fire management objectives for the park. Education and awareness promotion on fire hazard, risk and prevention will be important components of fire management operations within the park. It is also imperative that adjacent property owners must continue to undertake "fire smart" initiatives within their own properties to assist in reducing fire risk.

7.2.7 Education and Environmental Interpretations

Public education will play a key role in minimizing the negative effects of human activities on the park's natural environment.

The Trepanier Creek Greenway Regional Park entrance will be designed in a manner that creates a focal point for park visitors to get sufficient information about the park environment, park use, and their park stewardship responsibilities. Signs will be installed at strategic locations in the park (Figure 7.2). The signs will be regulatory and informative, and educate park visitors about the fragile nature of the park lands, and why particular park management actions have become necessary. Interpretative signs of rare plant and animal species, and sensitive ecosystems will also be installed to provide knowledge/education to park visitors about the natural environment of the Regional Park. Other educational materials that explain the need for park management actions will be made available to the community and park visitors through park service offices and on the Trepanier Creek Greenway Regional Park web page.

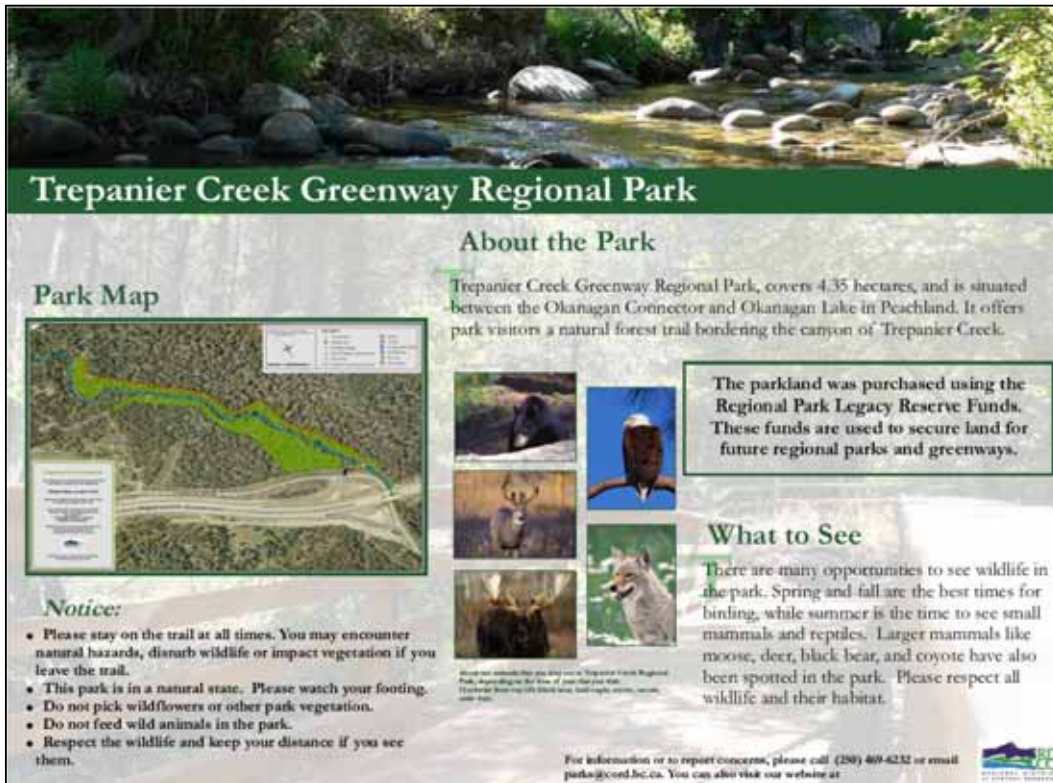


Figure 7.2 Existing Trepanier Creek Greenway Regional Park signage.

All infrastructure, such as kiosks, signage, and trails will be located and maintained in such a way that they enhance public safety awareness and support the conservation direction of the park.

8.0 MANAGEMENT PLAN IMPLEMENTATION

The Regional District, the District of Peachland, and other stakeholders will need to work together to achieve the aspiration of a high quality Greenway Trail that benefits all residents of the local community and the Regional District at large.

The management plan will be in effect when the application is approved by both the Integrated Land Management Bureau and the Regional District of Central Okanagan. For implementation, all tasks outlined in the plan will be carried out in a series of phases.

8.1 Implementation Priorities and Timeline

All actions outlined within this development/management plan will be implemented over a period of several years. It is expected that all actions will not be implemented simultaneously due to resource restrictions. Actions need to be scheduled into work plans and future budgets. However, some actions must be undertaken immediately, as they are directly related to the basic functionality of the park and do not involve excessively large sum of capital investment. Other actions require planning, scheduling and budget allocations. Actions that are easily implemented and related to basic functionality of the park will be given a higher priority.

8.1.1 Trail Enhancement and Maintenance

The basic trail enhancement and maintenance is part of the park functionality and is of high priority to implement. The trail enhancement includes the following activities:

- Widening of the trail and removal of vegetation and debris within the trail right of way;
- Assessing and removing danger trees and debris, such as large rocks, along the trail and at staged vantage points;
- Fencing should be constructed where required to protect the public and private lands; and
- Installation of benches at selected vantage points along the trails extent.

Ongoing maintenance and improvements to the existing trail system and associated amenities, such as the addition of bear-proof trash cans, and signage, will be needed to facilitate and enhance public use of the park. Additional new trails can also be developed to provide improved connectivity between the park and surrounding residential areas.

8.1.2 Park Entrance and Public Parking

The existing northern park entrance, at the intersection of Highway 97C and Trepanier Creek, may be sufficiently adequate in the short term, while the park entrances in the south and middle sections of the existing and proposed Greenway Trail will need improvements. The improvements include the development of parking lots, the creation of a connector trail and a creek

bridge that will join Star Park to the proposed Greenway Trail, and installation of park visitor kiosks at key entrance locations.

8.1.3 Public Safety and Security

Public safety and security is of prime importance. Prior to the park's opening to the public, all park facilities will be inspected according to the most current provincial safety standards and regulations. Actions will be taken immediately to rectify any and all issues that arise.

8.1.4 Forest Health and Fire Management Planning

Preparation of forest health and fire management plans is another priority item for the year 2010. The park plan will include the fuel load management, forest health risk reduction, public education on fire risk reduction management plans. Coordination with other agencies, such as the local fire department, Districts of Peachland and West Kelowna, and forest health and fire personnel with the Ministry of Forests and Range, and other stakeholders, such as the Westbank First Nations Community Forest, will be required. The Westbank First Nation Community Forest is currently developing a Fire Management Plan for the Community Forest, and it is expected that it will be completed by March 2010.

8.1.5 Resource Inventory and Mapping

The inventory of the park resources and values are necessary since it provides baseline data for park management planning and actions. It also provides bench mark data for a wide variety of values for park management to maintain, enhance, and restore if damaged in the future.

8.1.6 Education and Interpretation

Education and Interpretation are important aspects of the park management. The goal is to provide information regarding sustainability, natural and cultural history of the area, and environmental education and interpretation for groups and individuals. Immediate actions for the Trepanier Creek Greenway Regional Park include the installation and updating of signage and kiosks that provide park visitors with information and materials on the natural environment, recreational opportunities, and stewardship responsibilities of the park.

8.2 Budgetary Implications of the Plan Implementation

Table 2 summarizes the individual park management actions, their description, estimated budget, and the year in which the actions are to be completed.

The park is currently managed by the RDCO. Additional funding on the park facility construction, operation, and maintenance is expensive and has always been a challenge for the Regional District. The Regional District will continue to work with other agencies, partners, and the public for potentially more funding sources and management involvement.

Table 2. Proposed park management actions, activity description by phase, and associated costs.

Phase	Sub-phase	Activity Description	Estimated Cost	Total Phase Cost
1. Trail Enhancement & Maintenance	1	Clearing vegetation and trail widening	\$ 30,000.00	
	2	Fencing required sections	\$ 10,000.00	
	3	Vantage points, benches, etc.	\$ 5,000.00	\$ 45,000.00
2. Access and Parking	1	Star Park access development - parking	\$ 7,500.00	
	2	Star Park access development - trail connector	\$ 12,500.00	
	3	Star Park access development - wood bridge crossing	\$ 25,000.00	
	4	Peachland parking development	\$ 10,000.00	\$ 55,000.00
3. Public Safety & Security	1	Danger tree assessment and removal	\$ 5,000.00	
	2	other risk assessment and reduction (slope stability)	\$ 5,000.00	\$ 10,000.00
4. Fire & Forest Health	1	Management plan development and agency coordination	\$ 10,000.00	
	2	Risk reduction (fuel load management)	\$ 5,000.00	\$ 15,000.00
5. Resource Inventory & Mapping	1	Recreation feature inventory and mapping	\$ 3,500.00	
	2	Ecosystem and sensitive ecosystem inventory and mapping	\$ 10,000.00	
	3	Species at risk (plant and animal) inventory and mapping	\$ 4,000.00	\$ 17,500.00
6. Education & Interpretation	1	Kiosk, signage	\$ 12,000.00	
	2	brochure, website, etc.	\$ 3,000.00	\$ 15,000.00
GRAND TOTAL			\$ 157,500.00	\$ 157,500.00

8.3 Plan Monitoring, Evaluation, and Reporting

The RDCO will monitor the impact of facilities and programs occurring both within and outside the park, to ensure that the parks resources and values are not negatively impacted. Wherever and whenever necessary, and required, new policies and procedures will be developed and adopted to accommodate changes so as to minimize park or recreational user impacts.

Consultation with the park partners will be ongoing during the entire period of the development/management plan implementation. Criteria for specific future public consultation will be based on the size and scope of the implemented project, and potential environmental or economic impacts.

9.0 REFERENCES

BC Ministry of Forests. 1991. *Ecosystems of British Columbia –Special Report Series 6 (February 1991)*. D. Meidinger and J. Pojar (editors). Research Branch, Ministry of Forests. Victoria, BC. pp. 139-152.

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APPENDIX I

-Stakeholders-

- Peachland Recreation Director (Contact for booking the Open House)
- Westbank First Nations
- District of Peachland Central Okanagan Naturalists Club
- Central Okanagan Land Trust
- BC Horsemen Association
- Mountain Bikers of the Central Okanagan
- Community Recreational Initiative Society
- Fish and Game Club
- Central Okanagan Search and Rescue
- ATV Club
- Outback ATV Club of Kelowna
- Canadian Earthcare Society
- Kelowna Prospectors
- Adventure Racing Club
- Alpine Club of Canada
- Central Okanagan Hiking Club
- Volkssport Walking Club Peachland
- Lonely Loons Fly Fishing Group
- Peachland Sportsmen Association
- Okanagan Collaborative Conservation Program
- Kelowna Dirt Bike Club
- Okanagan Basin Water Board
- Telemark Cross Country Ski Club

APPENDIX II

-Stakeholder Comments-

- Central Okanagan Naturalists Club "100 Strong" – "Wonderful to have a place to hike through – would be well used – the naturalist club fully support this proposed plan – historical significance (mentioned several times)".
- Citizen comment – "Great positive development - Ecologically important to take care of - like the ideas of plaques and educational points of interest – would help with raising funding."
- Citizen comment- "Mountain bike use trail."
- Citizen comment – "Compares to a similar trail in Surrey – could it be added to Canada Trail?"
- Citizen comment - Good idea.
- Volkssport Walking Club, Peachland – 70 members – recommended trail maintenance – steps/stairs required to be built or installed, suggest fences for safety, benches to sit and connect to the Pincushion Mountain Trail (a locally significant Mountain hike).
- Citizen comment – "Why was more land not included in the request to provide more interconnectedness to existing trails – all for it, beautiful walk/hike."
- Citizen comment – "The area has significant history as is depicted on the story boards within the Trepanier Creek kiosk."
- Peachland Sportsman Association – "There has been a significant amount of volunteer work and donations already completed on the Trepanier Creek including tree plantings, fish counting etc. There have been lots of volunteers from the local community involved in enhancement of the Creek."
- Citizen comment - "Just make it happen" (reference to getting the Trepanier Creek Greenway/trail Network established and improvements started).
- Citizens comments – several local private landowners voiced concern about possibility of future trail networks going through private lands (north side of Highway 97 where Trepanier Creek flows through private lands, not crown lands) and concern that there already exists a "Queens Covenant" on private lands preventing the trail system to cross on private lands – "We don't want trails which are open to the public going through our backyards."
- Citizens comment – "There has been a problem with Tussock Moth further up the creek valley."
- Citizen comment - "Nothing fancy, just continuous with possible offsets for parking on public roads".
- Citizen comment - Concerns voiced with respect to existing bear populations within the area and increased interaction.
- Citizen comment – "Big rocks on trails should be removed."
- Land Trust – working with RDCO to find way to become involved.