

Buffalo Lake

Integrated Shoreland Management Plan



BLISMP Synopsis

Government
of Alberta ■



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Preface

This booklet was prepared to give readers a general overview of the Buffalo Lake Integrated Shoreland Management Plan (BLISMP) and key recommendations. Readers are encouraged to consult the full plan, which is available as a printed document, or which can be accessed online (see page 20 for further information).

BLISMP is the outcome of a lengthy planning exercise. The plan was developed through the cooperative efforts of provincial and federal government agencies with the involvement of a local municipal committee and a local advisory body. BLISMP identifies the Government of Alberta's policies for managing the public shorelands around Buffalo Lake. The plan was adopted by the Government of Alberta in the summer of 2009.

Introduction

As one of central Alberta's large recreational lakes, Buffalo Lake continues to grow in popularity. The lake is being discovered by increasing numbers of recreational users and is under growing pressure for lakeshore subdivision development. Managing the lake and its shorelands requires a balanced and integrated approach which allows reasonable public use while protecting those resource values which draw people to the lake.

The Buffalo Lake Integrated Shoreland Management Plan (BLISMP) was developed to manage human activities, maintain biodiversity, and promote environmental quality on Buffalo Lake's shorelands in anticipation of increasing visitor use and development pressures.

BLISMP was approved by Alberta Sustainable Resource Development and Alberta Environment in 2009. The plan provides direction for managing the water management Right-of-Way (ROW) which surrounds Buffalo Lake and the emergent vegetation found within the lake's littoral zone (up to 100 metres from the bank). The plan outlines how public land and natural resources in the planning area will be managed to achieve provincial government objectives while recognizing the interests and needs of local authorities, residents and lake users. BLISMP addresses a number of existing and anticipated resource management



challenges that have been identified within the planning area. It is important to note adjacent private land is not addressed in this plan and BLISMP is not a “lake management plan”.

In addition, BLISMP will assist the five municipalities which border the lake in updating and implementing the statutory Buffalo Lake Inter-municipal Development Plan (IDP) – which pertains to private lands along the ROW. BLISMP will also provide guidance for the Buffalo Lake Management Team (BLMT), a ministerially appointed body responsible for advising Alberta Environment on lake operational matters and mitigation actions pertaining to the Parly Creek-Buffalo Lake Water Management Project. Accountability for implementing BLISMP rests primarily with Alberta Sustainable Resource Development (ASRD) and Alberta Environment (AENV).



Why was an Integrated Shoreland Plan Prepared?

The need for a lakeshore plan at Buffalo Lake emerged when the Government of Alberta established a water management Right-of-Way (ROW) around the lake as part of the *Parlby Creek-Buffalo Lake Water Management Project*. This water management project was undertaken to:

- stabilize water levels in Buffalo Lake – thereby improving its recreational potential;
- provide a reliable water supply for the villages of Mirror and Alix;
- enhance fish and wildlife habitat; and
- provide agricultural flood control.

BLISMP identifies how the lake's public shorelands (i.e., the ROW) will be managed in the future.



Buffalo Lake is Surrounded by a Right-of-Way

Buffalo Lake is unique in Alberta. This shallow lake is a “managed” water body which means water levels are maintained within a specified range to minimize the impacts of water level fluctuations. A water management ROW (i.e., a strip of provincial Crown land) surrounds the entire lake, varying in width from several meters to several hundred meters. ROW lands were surveyed and purchased by Alberta Infrastructure in the mid-1990s. Buffalo Lake’s ROW corresponds to and contains all of the immediately adjacent shorelands that fall within the lake’s 1:100 year flood zone. This flood zone also coincides with the lake’s riparian areas. *“Riparian areas are the lands adjacent to streams, rivers, lakes and wetlands, where the vegetation and soils are strongly influenced by the presence of water. Although they make up only a small fraction of the land, they are among the most productive and valuable of all landscape types and have been the focus of conflicts between resource users”* (Alberta Riparian Habitat Management Society).

Buffalo Lake’s ROW lands are provincial Crown land – and are also referred to as public land. Public lands and the natural resources which are found on them are managed by provincial agencies for the benefit of Albertans. BLISMP outlines the Government of Alberta’s intentions for managing the public land which forms a continuous ROW around the entire lake.

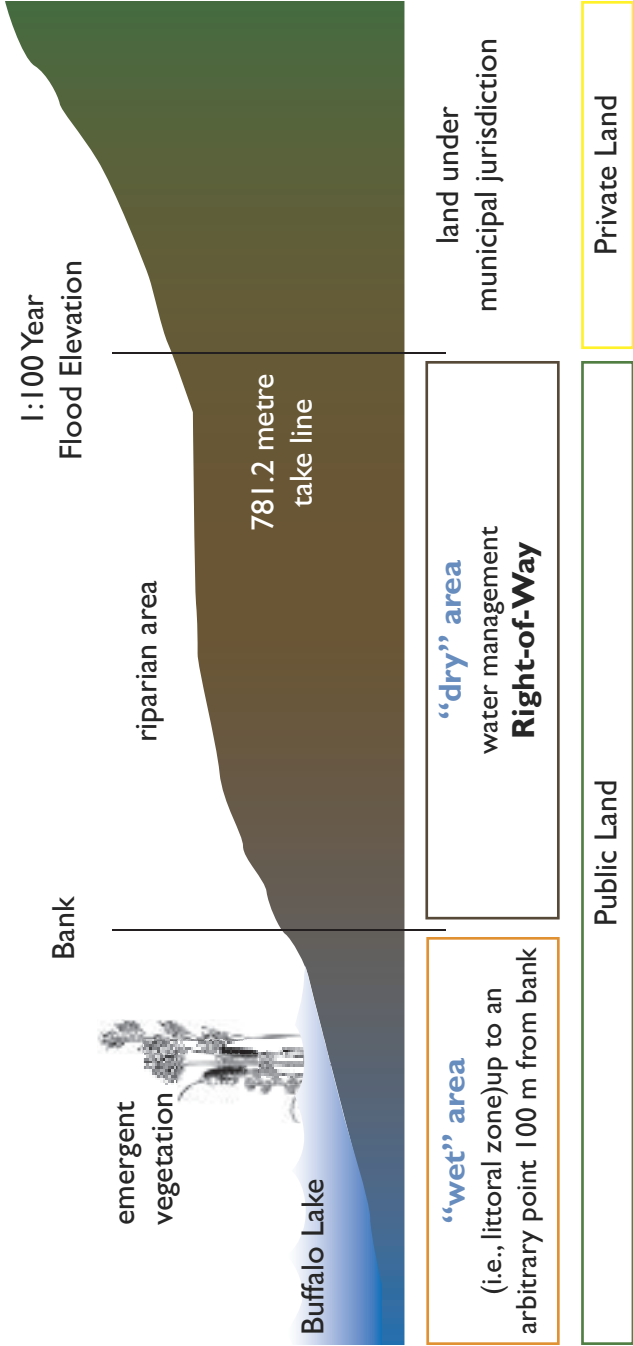


The outer boundary of the ROW (i.e., the “take line”) has been surveyed, but in many locations ROW markers are no longer visible to help people determine where the ROW boundary falls. The BLISMP planning area is comprised of the entire ROW and the initial stretch (the first 100 meters) of the lake’s littoral zone (as shown in the illustration on page 6). The littoral zone is that portion of a fresh water body extending from the shoreline lake-ward to the limit of occupancy of rooted plants (i.e., often to a depth of several meters).

A complete map series on the ROW can be accessed online at www.blmt.ca/blismp.htm



Summer Village of Rochon Sands



Buffalo Lake Integrated Shoreland Management Plan

Inter-Municipal Development Plan

Access to the Right-of-Way

The public can access Buffalo Lake by using existing public roads or by using road allowances where access is permitted.

When crossing over private land or provincial Crown land adjacent to or within the Right-of-Way, permission should be obtained from the property owner or lessee before entering.

The five municipalities which border Buffalo Lake have agreed to evaluate all existing access points and formalize those access points that will remain open to the public, as well as identify new access points to accommodate future public demand. Lake access needs and provisions will be addressed in future Area Structure Plans that will be developed by municipalities for five identified Growth Nodes around the lake. Lake users are encouraged to become familiar with the lake access map and associated access policies that are provided in the updated Buffalo Lake Intermunicipal Development Plan.



Key Direction in BLISMP

The following statements represent key management direction that is found in BLISMP.

Vision

Buffalo Lake, as a locally and regionally important recreational lake, continues to provide Albertans with: a high quality lake environment that supports natural landscape values; healthy and sustainable fish and wildlife populations and supporting habitats; publicly accessible shorelands; a variety of recreational activities; and residential development opportunities on adjacent private land, today and into the future.

Planning Principles

The following seven principles will guide plan implementation:

- 1) maintain a healthy lake system;
- 2) maintain ecosystem function and integrity (i.e., ecosystem sustainability);
- 3) pursue adaptive management;
- 4) adopt coordinated resource management;
- 5) foster stewardship and promote education and outreach;
- 6) observe the precautionary principle; and
- 7) promote compliance.

(See BLISMP for more information about these seven principles.)





BLISMP Broad Goals

Riparian Management	To maintain riparian areas around Buffalo Lake in a “healthy” condition.
Right-of-Way Management	To allow permitted/compatible activities to occur (with appropriate conditions) on the Right-of-Way surrounding Buffalo Lake while maintaining the ecological function and integrity of riparian areas.
Water Quality and Shoreline Protection	To maintain or enhance Buffalo Lake’s water quality. (It is essential that the lake’s littoral zone, the shoreline and riparian areas – and the ecological services they provide – are not significantly impacted if water quality is to be maintained.)
Fisheries Management	To return native fish populations in Buffalo Lake to their former productive capacity
Wildlife Management	To maintain a diversity of native wildlife species which depend on Buffalo Lake, Bashaw Bay and Parly Bay – and their associated shorelands – at sustainable population levels.
Recreation	To provide and manage recreation opportunities and activities at Buffalo Lake which support the protection and maintenance of “the ecological integrity (and natural quality) of the shorelands and a high quality lake environment.”
Public Access	To provide reasonable opportunities for public access to Buffalo Lake and use of the ROW while maintaining the ecological integrity of the lake and surrounding public land.

<p>Agriculture</p>	<p>To allow temporary agricultural activities in the planning area in a manner that minimizes impacts to the wet and dry areas, while having regard for other land uses and activities that are associated with this recreational water body.</p>
<p>Mineral Resources</p>	<p>To ensure that the natural gas, oil, and minerals sectors do not introduce or leave an industrial footprint in the wet and dry areas of the planning area so as to maintain the integrity and aesthetics of Buffalo Lake, the shoreline, and the Right-of-Way.</p>
<p>Surface Materials</p>	<p>To exclude the exploration and development of all surface materials in the planning area to maintain the integrity and aesthetics of Buffalo Lake and the Right-of-Way.</p>
<p>Utility Lines</p>	<p>To route new utility corridors around the planning area to minimize surface disturbances.</p>
<p>Awareness and Stewardship</p>	<p>To use education, outreach and communications tools to raise awareness among lake users, residents, adjacent landowners, developers and decision makers informing them of resource management challenges in the planning area and actions they can take to achieve desired plan outcomes. To encourage and support local stewardship initiatives and promote positive behavioural changes which advance the aims of this plan.</p>
<p>Inter-jurisdictional Cooperation and Integration</p>	<p>To promote ongoing inter-jurisdictional cooperation among BLMT, IDP Steering Committee, local municipalities, and the BLISMP initiative to achieve mutual aims and to further the health of Buffalo Lake and surrounding public land.</p>

Management Areas and *Table of Compatible Activities*

To achieve greater clarity on where certain resource management objectives will be achieved and where particular land uses and human activities can occur, the BLISMP planning area has been divided into 4 Management Areas (MAs). The management intent for each MA is provided below.

Management Area	Intent
Existing Developed Recreational Use	<ul style="list-style-type: none"> • accommodate existing recreational facilities and development • disturbances that comply with provisions in this plan and which meet existing regulatory requirements are allowed for the purpose of providing additional recreational opportunities
General Use	<ul style="list-style-type: none"> • “small footprint” disturbances are allowed to accommodate “permitted” and “compatible” activities • approved disturbances will be accommodated in less sensitive areas • some habitat loss may be accommodated in accordance with Fisheries and Oceans Canada Policy for the Management of Fish Habitat • maintain, and where necessary, restore riparian areas to a “healthy” condition, except for sites where ROW disturbance is allowed
Limited Use	<ul style="list-style-type: none"> • disturbances must be minimized • approved disturbances will be accommodated in less sensitive areas • important natural habitat for fish, wildlife, and plant species will be maintained • habitat fragmentation must be minimized • maintain, and where necessary, restore riparian areas to a “healthy” condition

Restricted Use

- no disturbances will be allowed except those which promote or enhance native vegetation communities
- ecological integrity and function will be maintained
- critical habitats, sensitive or unique physical features, and historical resources will be protected
- habitat fragmentation will not occur
- maintain, and where necessary, restore riparian areas to a “healthy” condition
- maintain water quality
- prevent erosion and sediment transport



Table of Compatible Uses/Activities for BLISMP Management Areas

Use/Activity

1. Non-motorized recreation (e.g., wildlife viewing)
2. Serviced camping
3. Developed beach (mechanical beach maintenance / improvements allowed)
4. Boat launch (permanent)
5. Natural un-maintained trails – foot access only
6. Established, maintained trails – non-motorized (walking, bicycle)
7. Summer - Off-highway vehicle use (random) “wet area”
8. Summer - Off-highway vehicle use (random) “dry area”
9. Winter - Off-highway vehicle use (random) “wet area”
10. Winter - Off-highway vehicle use (random) “dry area”
11. Scientific study (necessitating some level of impact)
12. Domestic livestock grazing on the ROW
13. Livestock watering in Buffalo Lake
14. Agricultural cultivation / gardening
15. Utility corridors (pipelines, electrical, gas and other transmission lines)
16. Oil/natural gas/CBM “low impact” exploration (seismic activity)
17. Oil/natural gas/CBM development and facilities (e.g., pipelines)
18. Coal exploration and development
19. Mineral exploration and development excluding oil/gas/coal (e.g., minerals, clay, marl)
20. Surface materials exploration and extraction (e.g., sand, gravel)
21. Commercial use (marina, boat rental)
22. New commercial buildings – temporary or permanent

B L I S M P M a n a g e m e n t A r e a s

Existing Developed Recreational Use	General Use	Limited Use	Restricted Use
P	P	P	C
NP	NP	NP	NP
P	C	C	NP
P	P	C	NP
P	P	P	P
P	P	C	C
NP	NP	NP	NP
C ¹	C ¹	C ¹	NP
P	P	P	P
C	C	C	NP
C	C ²	C ²	C ²
APO	APO	APO	APO
APO	APO	APO	APO
NP	NP	NP	NP
NP	NP	NP	NP
C	C	C	C
NP	NP	NP	NP
NP	NP	NP	NP
NP	NP	NP	NP
NP	NP	NP	NP
C	C	C	NP
NP	NP	NP	NP

Use/Activity

23. Temporary structures on the ROW/shoreline (e.g., docks, boat lifts, diving rafts)
24. Permanent structures on the ROW/shoreline
25. Golf course, miniature golf course
26. Aquatic vegetation management - removal or alteration of plants
27. Terrestrial vegetation management - removal or alteration of plants
28. Shoreline/ROW modification (e.g., shoreland tilling, bank stabilization, dredging)
29. Parking of vehicles on the ROW
30. Storage of personal property on the ROW

P Permitted Use/Activity - Uses that are considered to be compatible with the intent of a Management Area following existing provincial guidelines, policies and regulations and direction contained in this plan

C Compatible Use/Activity - Uses that may be compatible with the intent of a Management Area under certain circumstances or when special conditions and controls are observed

NP Not Permitted Use/Activity - Uses that are not compatible with the intent or capabilities of a Management Area

APO Activity to be Phased Out - The use is currently permitted but it is proposed that it be discontinued in the future to achieve water quality or other environmental objectives.

NOTE: Activities listed in this table are representative of the range of activities that occur at Buffalo Lake. Whether specified or unspecified in this table, human activities and land uses that are being considered must always be evaluated against the intent of each individual Management Area and other provisions in this management plan.

B L I S M P M a n a g e m e n t A r e a s

Existing Developed Recreational Use	General Use	Limited Use	Restricted Use
C	C	C	NP
NP ³	NP ³	NP ³	NP ³
C	NP	NP	NP
C ⁴	C ⁴	C ⁴	NP
C ⁵	C ⁵	C ⁵	C ⁶
C	C	C	NP
NP ⁷	NP ⁷	NP ⁷	NP
NP	NP	NP	NP

¹ OHVs can **cross** the right-of-way for legitimate reasons but cannot be used to travel **along** the right-of-way to minimize impacts to riparian areas

² scientific study proposals will be reviewed to assess potential impacts

³ all permanent structures require authorization

⁴ this activity requires an approval under the *Public Lands Act, Water Act* and *Fisheries Act* (Canada)

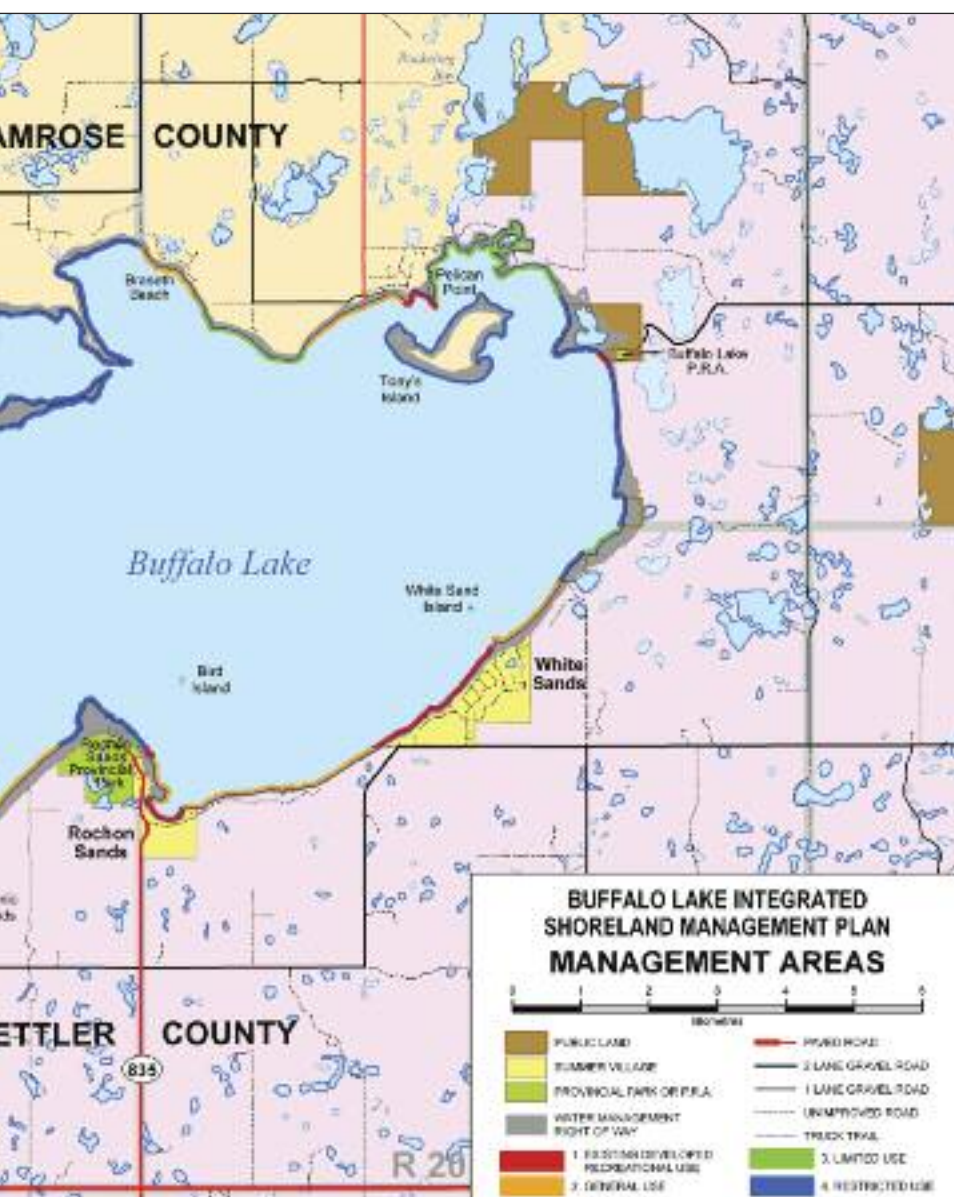
⁵ an authorization is required under the *Public Lands Act* to remove vegetation on the right-of-way

⁶ is compatible if the goal is vegetation rehabilitation, the planting of desirable native species, or the eradication of weeds and invasive plants

⁷ vehicles are only permitted on the right-of-way to drop off watercraft at designated access points and to access the lake during the winter months

Management Areas





BLISMP Webpage

To obtain more information on the development of BLISMP and the Government of Alberta's management efforts at Buffalo Lake, readers are encouraged to visit the BLISMP web page at: www.blmt.ca/blismp.htm

Materials that are available online include:

- approved BLISMP plan
- ROW map series – covers the entire lake (68 separate map sheets)



- BLISMP project Terms of Reference
- information on the planning process
- public consultation process and feedback that was received during Phase 1 and 2
- BLISMP project maps
- aerial riparian health assessment of Buffalo Lake's shorelands
- Government of Alberta contact information



BLISMP Implementation – Next Steps

An Inter-agency Implementation Work Team will be established to guide plan implementation activities over the coming years. The Work Team will, among other things, set priorities for putting the plan's provisions into effect, consider monitoring needs, pursue partnerships, and assess progress in achieving the plan's objectives and targets.



Get Involved!

The future of Buffalo Lake needs your help!

- Become familiar with the Buffalo Lake Management Plan.
- Attend local open houses, meetings and watch for information updates in your local paper or by visiting the BLISMP website at www.blmt.ca/blismp.htm
- Provide feedback to your local councils on the BLIMSP.
- Demonstrate your involvement by improving the health of the shoreland of your property and within your summer village.



Other Planning at Buffalo Lake

While BLISMP addresses the public shoreland surrounding Buffalo Lake, an Inter-municipal Development Plan (IDP), developed by the 5 municipalities bordering the lake, addresses issues affecting private land adjacent to the ROW. The Buffalo Lake IDP, originally prepared in 1997, was revised in 2010. The revised IDP provides direction on land use, appropriate activities, and development on private lands around the lake. This revised IDP can be obtained from the involved municipalities (i.e., Lacombe, Stettler and Camrose Counties, or the Summer Villages of Rochon Sands or White Sands).

To ensure that BLISMP and the Buffalo Lake IDP complement and support each other, representatives from provincial government departments and local municipalities worked together during the development of these two plans. Furthermore, direction contained in BLISMP was considered as the Buffalo Lake IDP was updated to ensure that the lake's riparian areas, native species, and emergent vegetation found in the lake were adequately safeguarded.



Of Interest to Land Developers

Land developers are encouraged to obtain a copy of, and become familiar with, BLISMP before proceeding with the preparation of rezoning applications and subdivision design concepts around the lake. BLISMP outlines the Government of Alberta's policies for managing the public land ROW which lies between the lake's shoreline and adjacent private lands. It identifies what uses and activities are compatible with the ROW at different locations around the lake. Because this strip of public land falls within the lake's flood zone, development and permanent structures will generally be discouraged on the ROW.



Prospective developers should also consult the revised Buffalo Lake IDP to become aware of municipal policies relating to land development adjacent to the public land ROW.

The new IDP will provide a policy framework that will govern the preparation of subsequent statutory and non-statutory land use plans by the five involved municipalities.



How to Obtain a Copy of the Printed Plan

BLISMP is available online at:
www.blmt.ca/blismp.htm

Printed copies of the plan are available for viewing at:

- Lacombe, Stettler and Camrose County offices
- public libraries in Red Deer and Stettler

Individuals wishing to obtain a copy of the printed plan can contact Land Use Operations, Alberta Sustainable Resource Development (in Red Deer) at 403-340-5451.





Lake/Shoreland Stewardship – A Shared Responsibility

Stewardship has been defined as caring for the land and its natural resources to ensure healthy ecosystems can be sustained and passed on to future generations. Shared stewardship implies that all of the users in a given landscape will assume a level of responsibility for the well-being of that particular landscape. Buffalo Lake and the lake's shorelands are being used by adjacent land owners, lake residents, land developers, and by many visitors. Each of these user groups has an important role to play in “treading lightly”, in pursuing their activities in a way which minimizes harm to natural landscapes, and in reducing their environmental footprint. When all users do their part in protecting the lake ecosystem, every user will enjoy the benefits from such collective action; including, the presence of biodiversity; intact and functioning ecosystems; high levels of environmental quality, and inviting lakeshore aesthetics.





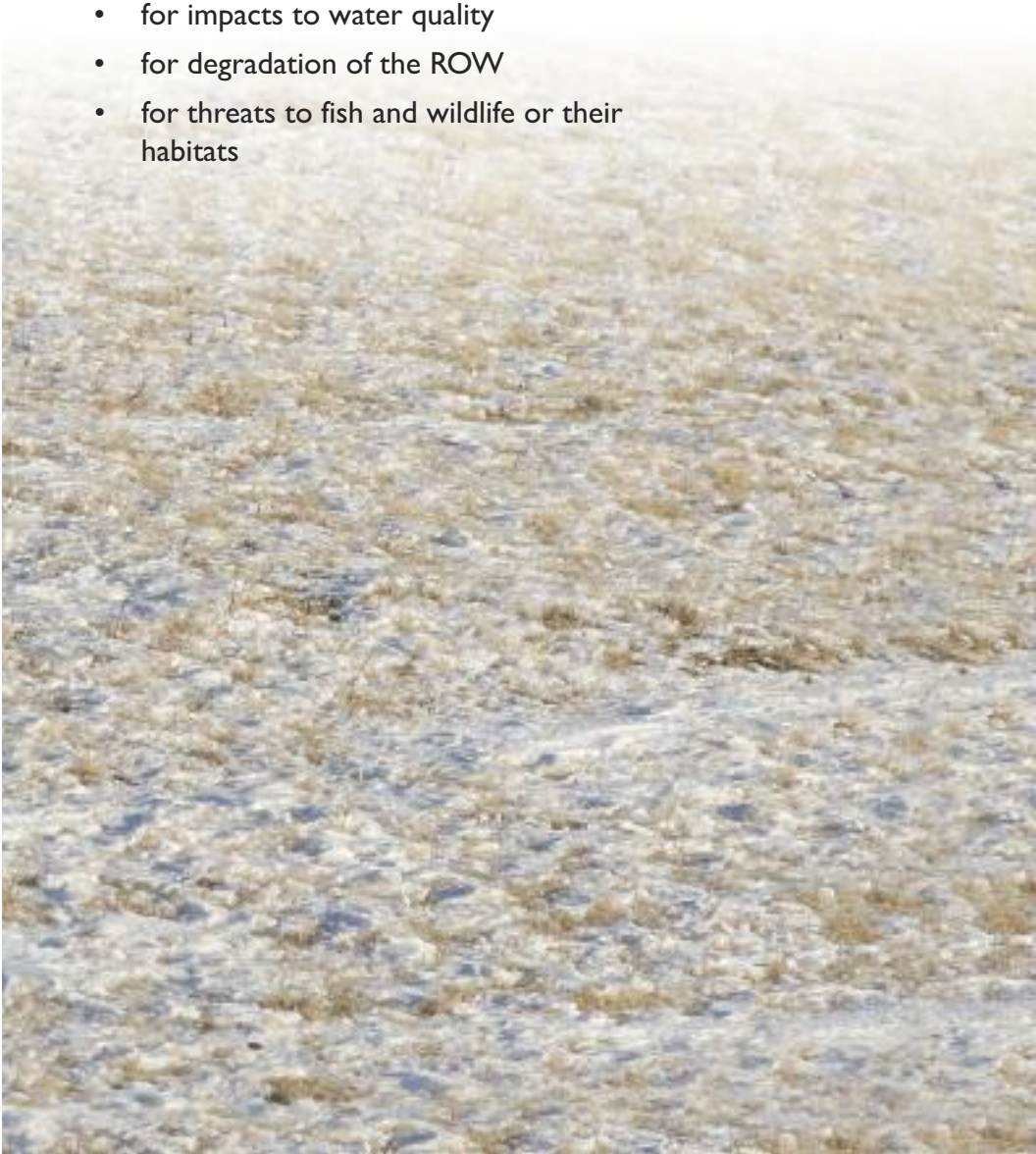
Do You Have Questions?

If you need additional information or have particular questions that you would like to have answered about BLISMP, please contact Land Use Operations, Alberta Sustainable Resource Development (in Red Deer) at (403) 340-5451.



If you observe any inappropriate activities or infractions occurring at Buffalo Lake or on the lake's public land ROW, call the Government of Alberta Environmental Hotline 1-800-222-6514. This is a 24-hour emergency line and your anonymity is guaranteed.

- for impacts to water quality
- for degradation of the ROW
- for threats to fish and wildlife or their habitats



Other Sources of Information on Lakeshores and Lakeshore Living

Interested readers are encouraged to expand their knowledge of living responsibly along Alberta's shorelines by consulting: *Caring for Shoreline Properties*. This useful booklet can be obtained at Alberta Conservation Association offices or accessed online at: www.ab-conservation.com

Readers who are interested in knowing more about the health of Buffalo Lake's shorelands can obtain a DVD, released by Alberta Sustainable Resource Development, which provides an aerial assessment of the lake's riparian areas at one point in time. The video imagery was obtained in June 2006 to allow provincial resource management agencies to complete a coarse riparian assessment of the lake's shoreline and the adjacent public land right-of-way. To request a copy of the DVD and the accompanying brochure, a *Users Guide to the Buffalo Lake Shoreline* video, please contact:

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