

Seeley Lake Community Council

CONNECTING THE COMMUNITY
Trail and Pathway Management Handbook



Contact the Council if interested in receiving notices and information about the community pathways and trails, or to volunteer for development and maintenance projects:

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Seeley Lake Community Council

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October 2011

CONNECTING THE COMMUNITY

Trail and Pathway Management Handbook

Seeley Lake Community Council

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CONNECTING THE COMMUNITY

Trail and Pathway Management Handbook

Introduction

Trails and pathways are an important element for the lifestyle of many residents of our local communities. This handbook is offered as guidance to assist our local officials, residents and volunteers establish and maintain a network of recreational travelways.

A primary purpose of the recreation/trail committee is to preserve, maintain and enhance the "Connecting the Community" trail system as directed by the proposed Seeley Lake Regional Plan. For convenience we'll refer to the travelways as "trails." The term "trail" includes a wide variety of routes -- everything from a paved 5-foot wide bikeway, to a low standard path in the forest, to a route along the edge of a road. Routes may be used by a wide variety of users including pedestrians, equestrians, bicyclers, ATVers, skiers, snowshoers, snowmobilers or others.

A multi-use network is preferred. However, types of use may be restricted by land owners or managers on a case-by-case basis, and marked by signs or posters.

The Council coordinates activities with the Missoula County Public Works Department, Missoula County Parks Department, the Seeley Lake Ranger District, Montana Department of Natural Resources and Montana Department of Fish Wildlife and Parks. Plus a long-standing collaboration with the Seeley Lake Area Chamber of Commerce

“Trail Corridors can be as short as connecting two streets by a pathway or as long as a pathway paralleling Highway 83 to fulfill transportation needs and commuter trails connecting subdivisions to community services. Trails may also be recreational such as accessing the lakeshore, circling a lake, or providing access to other recreational opportunities.”

(Seeley Lake Regional Plan, Chapter 7: Land Uses. Pg 7-20)

Primary Considerations.

Trail management activities should consider three general aspects:

1. User safety,
2. User Convenience/satisfaction, and
3. Resource Protection.

“The **Seeley Lake Regional Plan**.” provides good background and in particular the plan contains:

Goals and Action Strategies for Trails

Goal: Enhance trail connectivity within the Plan Area.

Action Strategies:

1. Continue to develop trail systems that connect neighborhoods, businesses, schools, and open spaces around Seeley Lake and throughout the Plan Area.
2. Continue to develop trail systems for a variety of users including walkers, cyclists and motorized users.
3. Encourage new developments in the Plan Area to provide connections to existing trail systems and opportunities to connect to trail systems through future adjacent development.
4. Provide, map, and clearly mark routes that provide ingress and egress to developed areas of the Plan Area from surrounding public lands.
5. Keep motorized trails away from critical habitat.
6. Review and update trail design standards in the “Connecting the Community” trail guide.
7. Continue to develop trail systems that provide the opportunity to connect the Seeley Plan Area with adjacent communities and surrounding public lands.

(Chapter 6, Page 54)

Among the list of community Action Strategies we have:

Goal: Enhance trail connectivity within the Plan Area

- Continue to develop trail systems that connect neighborhoods, businesses, schools, and open spaces around Seeley Lake and through the Plan Area.
- Continue to develop trail systems for a variety of users including walkers, cyclists and motorized users.
- Encourage new developments in the Plan Area to provide connections to existing trail systems and opportunities to connect to trial systems through future adjacent development.
- Provide, map and clearly mark routes that provide ingress and egress to developed areas of the Plan area from surrounding public lands.
- Keep motorized trails away from critical habitat.
- Review and update trail design standards in the "Connecting the Community" trail guide.
- Continue to develop trail systems that provide the opportunity to connect the Seeley Plan Area with adjacent communities and surrounding public lands.

(Appendix C, Pgs 20-21)

http://www.co.missoula.mt.us/rural/SeeleyLake/2010-10_SeeleyLakePlan-FINAL.htm

The “**Missoula County Parks and Trails Master Plan**” offers strategic principles and objectives of general and specific application to Seeley Lake.

<http://www.co.missoula.mt.us/rural/Parks/ParksTrailsPlan.htm>

SEELEY LAKE COMMUNITY TRAIL DESIGN CRITERIA

To minimize resource damage

- Keep users on the trail, while keeping water off it.
- Use existing natural features (rocks, logs, elevation change) to add variety and challenge.

To minimize Liability

- Mark trails clearly
- Build trail features well; must be durable, predictable and designed to minimize injuries when they occur.
- Make landowners and users aware of Montana's "Recreation Use Statute."

To maximize Safety

- Don't surprise trail users with unexpected features.
- Make entrance to trail a little more difficult than the general trail difficulty.
- Design proper 'flow' into trails (e.g., avoid abrupt transition from open to tight)
- Offer technical clinics (riding techniques, responsible, low-impact tips, safety)

To reduce user conflicts

- Trailhead education signs and clear communications among clubs, users, managers and other visitors to keep relations positive.
- Develop a large, varied trail system that disperses visitors and reduces user conflict.
- Produce accurate trail maps and signage that gives visitors a clear sense of what to expect
- Design and promote for shared-use trails nearer town, with purpose-built away from areas that are most popular with other users.
- Where new trails aren't an option, get creative use signage, clinics and collective problem-solving to improve trail harmony.
- Allow off-trail use only in appropriate, designated special areas.

To improve communication and partnerships

- Users should be encouraged to participate in club activities and decision-making.
- Support all types of use as long as its responsible and sustainable.
- Planners should consult with users and incorporate their suggestions into trail management decisions to help develop trail systems that have broader appeal.
- Bust the stereotypes! Recognize the common ground of all trail users. Be positive... and inclusive. Broad-based partnerships are stronger and last longer.

Common Trail Mistakes

1. Not getting landowner/manager approval.
2. Falling for the fall line
3. Guessing the grade.
4. Going against the flow.
5. Half bench is half baked.

Situations for less than full bench 1) Sideslope so steep that the backslope exceeds six feet.; 2) close to the downhill side of a large tree. In these cases a proper crib wall should be built.

6. Climbing Turns. Only on side slopes less than 10 percent
7. Building house of straw. Do it right, use the best materials.
8. Finishing a line before its rime. Finish one section before starting a new.
9. Building a pathway to Grandma's House - i.e. lining the trail with logs. A properly built trail shouldn't need them.
10. Ignoring old wounds. Rehab old trails, reclaim eroded areas, conceal old corridors.



TRAIL SIGN LOGO



Route Marker



Direction Marker

Sign Plan

DIRECTIONAL SIGNS

- To be located at decision points (intersections, change of direction, etc.) along the route.
- Logo on top half; message blank on bottom half.
- Dimensions: 12"x12"
- Color: Dark blue on gray
- Reflectorized.

REASSURANCE MARKERS

- Dimensions: 5"x7" diamond shaped
- Color: Reflectorized gray.
- Location: intervisible or 1/8 mile intervals along route

YOU ARE HERE MAPS

- Dimensions: 11'x17"
- Key locations along trail, plus motels and other interested businesses.
- Map will have intersections identified by letters.
- Field locations will indicate which junction (letter) "You Are Here" with a separate poster below the map.

INFORMATION BOARD

- Dimensions: 4 ft. x 6 ft.
- Content: Map, trail etiquette, special notices, seasonal reminders.
- Will be located at a central, high traffic location in or near the business district

Leave No Trace Principles

Plan Ahead and Prepare ** Travel and Camp on Durable Surfaces **
Dispose of Waste Properly ** Leave What You Find ** Minimize Campfire
Impacts ** Respect Wildlife * Be Considerate of Other Visitors

PLAN AHEAD AND PREPARE

- Know the regulations and special concerns for the area you'll visit.
- Prepare for extreme weather, hazards, and emergencies.
- Schedule your trip to avoid times of high use.
- Visit in small groups when possible. Consider splitting larger groups into smaller groups.
- Repackage food to minimize waste.
- Use a map and compass to eliminate the use of marking paint, rock cairns or flagging.

TRAVEL AND CAMP ON DURABLE SURFACES

- Durable surfaces include established trails and campsites, rock, gravel, dry grasses or snow.
- Protect riparian areas by camping at least 200 feet from lakes and streams.
- Good campsites are found, not made. Altering a site is not necessary.

In popular areas:

- Concentrate use on existing trails and campsites.
- Walk single file in the middle of the trail, even when wet or muddy.
- Keep campsites small. Focus activity in areas where vegetation is absent.

In pristine areas:

- Disperse use to prevent the creation of campsites and trails.
- Avoid places where impacts are just beginning.

DISPOSE OF WASTE PROPERLY

- Pack it in, pack it out. Inspect your campsite and rest areas for trash or spilled foods. Pack out all trash, leftover food, and litter.
- Deposit solid human waste in catholes dug 6 to 8 inches deep at least 200 feet from water, camp, and trails. Cover and disguise the cathole when finished.
- Pack out toilet paper and hygiene products.

- To wash yourself or your dishes, carry water 200 feet away from streams or lakes and use small amounts of biodegradable soap. Scatter strained dishwater.

LEAVE WHAT YOU FIND

- Preserve the past: examine, but do not touch, cultural or historic structures and artifacts.
- Leave rocks, plants and other natural objects as you find them.
- Avoid introducing or transporting non-native species.
- Do not build structures, furniture, or dig trenches.

MINIMIZE CAMPFIRE IMPACTS

- Campfires can cause lasting impacts to the backcountry. Use a lightweight stove for cooking and enjoy a candle lantern for light.
- Where fires are permitted, use established fire rings, fire pans, or mound fires.
- Keep fires small. Only use sticks from the ground that can be broken by hand.
- Burn all wood and coals to ash, put out campfires completely, then scatter cool ashes.

RESPECT WILDLIFE

- Observe wildlife from a distance. Do not follow or approach them.
- Never feed animals. Feeding wildlife damages their health, alters natural behaviors, and exposes them to predators and other dangers.
- Protect wildlife and your food by storing rations and trash securely.
- Control pets at all times, or leave them at home.
- Avoid wildlife during sensitive times: mating, nesting, raising young, or winter.

BE CONSIDERATE OF OTHER VISITORS

- Respect other visitors and protect the quality of their experience.
- Be courteous. Yield to other users on the trail.
- Step to the downhill side of the trail when encountering pack stock.
- Take breaks and camp away from trails and other visitors.
- Let nature's sounds prevail. Avoid loud voices and noises

PLEASE

PLAN AHEAD AND PREPARE

- Know the regulations and special concerns for the area you'll visit.

TRAVEL ON DURABLE SURFACES

- Durable surfaces include established trails, rock, gravel, dry grasses or snow.

DISPOSE OF WASTE PROPERLY--

- Pack it in, pack it out.

LEAVE WHAT YOU FIND

- Preserve the past: examine, but do not touch, cultural or historic structures and artifacts.

RESPECT WILDLIFE

- Observe wildlife from a distance.
- Control pets at all times, or leave them at home.

BE CONSIDERATE OF OTHERS

- **Respect** other visitors and protect the quality of their experience.
- **Be courteous.** Yield to other users on the trail.
- **Take breaks** away from trails and other visitors.
- **Let nature's sounds prevail.** Avoid loud voices and noises

TRAIL COURTESY

Remember, you are one of many traveling these pathways. If you meet other people, be considerate and courteous. It will make everyone's outing safer and more enjoyable.

Show respect for the land. Our natural beauty is one of our greatest assets. Trails are one of the best ways to get out and experience our town and its surroundings. Don't let misuse of trails diminish the quality of this opportunity for your and others in the future.

Here are a few simple "rules" of trail etiquette:

- Make your contacts with others pleasant, no matter how brief.
- Tread lightly and leave no trace. Don't litter. Stay on the trail.
- Always be willing to yield the right of way. This is a matter of safety as well as courtesy.
- Bicyclists -- speak up or ring your bell. Try not to startle people or livestock. When you approach oncoming livestock on narrow trails, speak, slow down and don't make sudden motion or loud noises. If possible, move off the trail to the downhill side. When approaching livestock from the rear, speak out and ask any nearby people for instructions.
- If you smoke, do so only where you can be sure there is no chance of starting a fire -- and don't litter the ground with cigarette or cigar butts.
- Observe rules posted at trailheads regarding permitted use of trails.
- Respect private property and route closures. Don't trespass!
- Try not to disturb wildlife.

Rules of the Trail

The way we act today shapes trail access tomorrow. Do your part to preserve and enhance our access and image by observing the following rules of the trail.

1. Ride On Open Trails Only.

Respect trail and road closures (ask if uncertain); avoid trespassing on private land; obtain permits or other authorization as may be required. Federal and state Wilderness areas are closed to cycling. The way you ride will influence trail management decisions and policies.

2. Leave No Trace.

Be sensitive to the dirt beneath you. Recognize different types of soils and trail construction; practice low-impact use. Wet and muddy trails are more vulnerable to damage. When the trailbed is soft, consider other options. This also means staying on existing trails and not creating new ones. Don't cut switchbacks. Be sure to pack out at least as much as you pack in.

3. Control Your Bicycle or ATV!

Inattention for even a second can cause problems. Obey all regulations and recommendations.

4. Always Yield Trail.

Let your fellow trail users know you're coming. A friendly greeting or bell is considerate and works well; don't startle others. Show your respect when passing by slowing to a walking pace or even stopping. Anticipate other trail users around corners or in blind spots. Yielding means slow down, establish communication, be prepared to stop if necessary and pass safely.

5. Never Scare Animals.

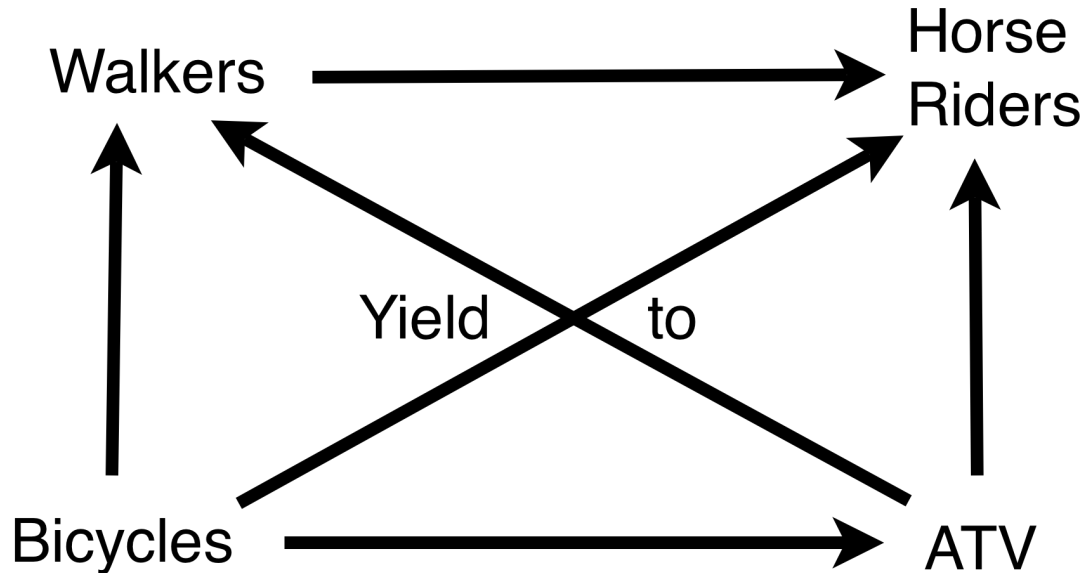
All animals are startled by an unannounced approach, a sudden movement, or a loud noise. This can be dangerous for you, others, and the animals. Give animals extra room and time to adjust to you. When passing horses use special care and follow directions from the horseback riders (ask if uncertain). Running cattle and disturbing wildlife is a serious offense. Leave gates as you found them, or as marked.

6. Plan Ahead.

Know your equipment, your ability, and the area in which you are treading -- and prepare accordingly. Be self-sufficient at all times, keep your equipment in good repair, and carry necessary supplies for changes in weather or other conditions. A well-executed trip is a satisfaction to you and not a burden to others. Always wear a helmet or appropriate safety gear.

Keep trails open by setting a good example of environmentally sound and socially responsible behavior.

SHARE THE TRAIL



RESPECT -

- OTHER USERS -

- Slow down and communicate when passing

- **THE LAND AND WILDLIFE** - Leave no trace

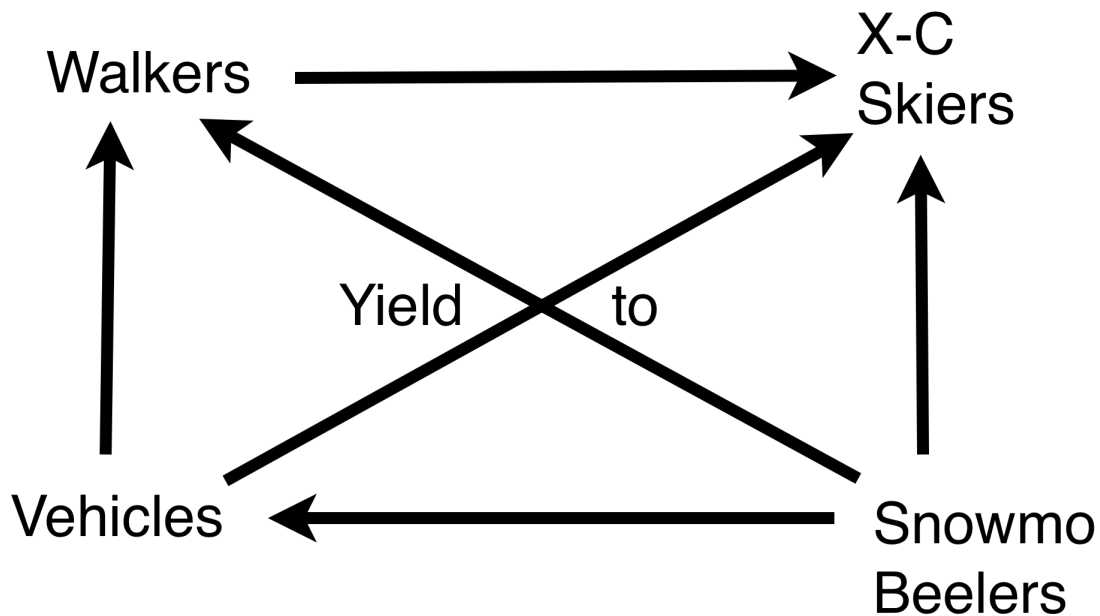
- **TRAIL RULES** - Be responsible

“Connecting the Community”

Working together works

Seeley Lake Community Council

SHARE THE TRAIL



RESPECT -

- OTHER USERS -

Slow down and communicate when passing

- THE LAND AND WILDLIFE - Leave no trace

- TRAIL RULES - Be responsible

“Connecting the Community”

Working together works

Seeley Lake Community Council

Risk Management Primer

Answering the Questions Every Land Manager Asks

Written by Woody Keen, IMBA Board Member, Trail Dynamics

The word risk has several meanings as it relates to trail management. The first meaning is in the relationship of the trail user to the risks involved (both perceived and real risk) of traveling in an un-controlled environment. The second and perhaps more important meaning in trails management is the risks (incurred by land managers and private land owners) of providing access to recreational trails for a variety of uses.

Please note that I will try and avoid the terminology "liability", this term assumes guilt before any has been assigned. I prefer to use the term legal exposure. Our actions or lack thereof can increase or decrease our exposure to lawsuits.

Another important premise is that we cannot eliminate all risks (both definitions of the word); we can however identify them, reduce them (if desired) and create a management plan for dealing with them. A good management plan should be proactive instead of reactive. An ounce of prevention is worth a pound of cure.

We talk all the time in land management about managing many different things. Several management prescriptions/modalities include: natural resource damage (limits of acceptable change), cultural resources management, timber management, fuels buildup and hazard management, job hazard analysis, etc. So it would follow that we also need to manage our trail systems and part of that plan would include a risk management plan.

In many ways, outdoor recreation users are in fact looking for some risks when we play outdoors. This concept can be identified by the introduction and popularization of terms like "adrenaline or extreme sports". Certainly no one wishes to be seriously hurt or killed when recreating, but we often want the thrill of feeling like some danger is present. This is certainly not a new concept as it relates to current trends in mountain biking. In fact, all forms of outdoor recreation have gone through an evolution in the last 10-15 years, and in many ways we are playing catch up in the realm of management. Whitewater kayakers are paddling much more difficult rivers (with much higher risks) than they were 5 years ago, rock and ice climbers are pushing the limits of human gymnastic skill, adventure racers are pushing the limits of mental and physical ability including very few hours of sleep over a 4 day expedition style race, trail runners are traveling 100 miles (and beyond).

Many recreation forms that we manage on public lands which have high inherent risks include: rock climbing, adventure racing, ice climbing, alpine climbing, mountaineering, whitewater kayaking and canoeing, sea kayaking, horseback riding, caving, backcountry skiing and snowboarding and many others.

Land managers are faced with an increasingly diverse range of recreational trail users and desired trail experiences. There certainly is a high need to begin the education process and the following is an introduction into terminology that pertains to risk management.

Recreational Use Statutes

Most states have these to protect land owners and land managers for allowing recreational use of lands (Recreational use statutes for all 50 states.) On private lands the key concept is duty of care- if no fees are charged the duty of care is no more than if the person were trespassing. On public lands the key concepts are due diligence vs. gross negligence. Many states also have an Equine Liability Statute which recognizes that any and all activities involving horses are inherently dangerous.

Assumption of Risks/Perception of Risk

These are somewhat different in concept. Perception of risk is something that happens more on site, perceiving a big drop-off on a trail as being dangerous and therefore not getting too close to the edge. Assumption of risk is the legal concept that you assumed and perceived an activity was potentially dangerous and you willingly assumed those risks and participated anyway.

Failure to Warn

This is the classic McDonald's Hot Coffee case. The basic concept is that when someone gets hurt and was not forewarned that there was any risk some level of responsibility can be placed on certain responsible parties. Warning language can be important for high-risk trail areas, especially if the users themselves cannot perceive the risks present. There are many examples of warning language signs at trailheads that deal with all kinds of risks (i.e. signs at the Grand Canyon warning of hot and dry climates, so carry plenty of water, signs that state that you could die). If on the other hand, the risks are very evident perhaps the urgent need for warning language signs are reduced. An example of this would be the lack of warning signs at the base of rock climbing routes, which are in reality nothing more than vertical trails.

Attractive Nuisance

The concept of something that is very attractive yet carries a high level of risk. Examples: Swimming pools, Sliding boards. This principle is mostly a problem for children. The important key here is: if things are high risk, they need to appear that way. Never disguise risks.

Duty of care

This concept was introduced earlier when talking about Recreational Use State Statute. The duty of care expected can vary greatly according to several variables. As perceived risk of a recreational activity goes up, the level of duty of care expected should go down. A good example of this is the ski industry.£ The duty of care expected skiing in the patrolled area is quite different from that expected "out of bounds". Within the patrolled area, the ski patrol and risk management team try to identify most hazards and alert the skier, however when skiing out of bounds the skier is very much on his/her own. The buffer between patrolled area and out of bounds needs warning language indicating a change in management strategies.

In the trail world, the expected duty of care also changes as trail users get further away from a point of entry (trailhead and the car). A great example of this concept is as follows: the top of Niagara Falls has a full handrail height retainer to buffer people from the edge because it is close to the parking lot. In contrast, the top of Half Dome in Yosemite has no such handrail retainer due to the length and seriousness of travel required to get to that point. Bridges in front country trails and urban trail systems look quite different that bridges located further in the backcountry and even more primitive in wilderness areas.

Foreseeable hazards

Hazards that we as trail professionals and managers might perceive, but the average user would not see. The classic example of this is dead snags that serve as hazard trees close to trails.

Due Diligence

This concept refers to whether or not land management agencies are identifying and addressing problems with "due diligence". There must be a system for identifying and solving problems, short-term and long-term. In the short-term, it may be a quick fix to minimize the potential hazard; however, the long-term plan should address the source of the problem. Due diligence relates closely to foreseeable hazards. Due diligence is tied to a good management plan the that is followed. The opposite of this is gross negligence, ignoring a problem that has been identified.

Montana Recreational Use Statute

The Montana legislature has enacted a “Recreational Use Statute” to encourage owners and managers to allow public access for recreation use on their lands, free of charge.

The encouragement takes the form of protecting the land owner from legal liability for any accidents that may happen when the user is on the property for recreational purposes. The only exceptions are for intentional harms and for gross negligence.

Recreational uses include a wide variety of activities. Of course, the land owner retains the right to deny access to the public and the right to eject any member of the public who misbehaves while on the property.

Communities and trail groups are working hard to create a system of trails for recreation, health, and commuting.

Issues arise when the optimal or only route for a trail crosses privately owned land.

Trail users are highly appreciative of landowners allowing trail use on their land. They want to work with landowners to assure the best experience for both groups.

Many landowners are willing to allow people to pass through their property, enjoying the pleasant scenery, but they can have some valid concerns.

The foremost questions the private landowner asks:

- ‘What risks I do I as a landowner face when allowing access through my property?’
- “Can I as a landowner be held liable if a person using a trail is injured on my land? “

Landowners can be any of the following – owner, tenant, lessee, occupant, or person in control of the premises. The Statute defends both private and public land managers.

Land can include physical land, roadways, water, watercourses, structures, buildings, machinery or equipment attached to the land.

Landowners are not required to keep their premises safe or to warn visitors of hazardous conditions, structures, or activities on their property. However, landowners cannot deliberately endanger people who enter for recreational purposes.

People entering and using privately owned lands for recreational purposes are responsible for exercising due care in their use of the land.

This liability protection is not valid if the landowner collects fees or rent for the use of the land. Exceptions can be, but not limited to payment for land leased to a government agency that then manages the property or nominal gifts to the landowner.

If you have neighboring land on which you would like permission to use, tell the owner about your state's recreational use statute. Or, better yet, print it out and give it to him. Relieving his fear of legal liability may tip the scales in favor of his giving you permission.

If you as a landowner allow a trail to cross your property, let the trail organization know that you want to be contacted immediately to address concerns before they have a chance to develop into problems. Addressing it promptly will make a better situation for all.

Montana Recreational Use Statute

MONTANA CODE

TITLE 70 PROPERTY

CHAPTER 16 RIGHTS AND OBLIGATIONS INCIDENTAL TO OWNERSHIP IN REAL PROPERTY

Part 3 Gratuitous Permittee for Recreation

70-16-301. Recreational purposes defined

"Recreational purposes", as used in this part, includes hunting, fishing, swimming, boating, water skiing, camping, picnicking, pleasure driving, biking, winter sports, hiking, touring or viewing cultural and historical sites and monuments, spelunking, or other pleasure expeditions.

70-16-302. Restriction on liability of landowner

(1) A person who uses property, including property owned or leased by a public entity, for recreational purposes, with or without permission, does so without any assurance from the landowner that the property is safe for any purpose if the person does not give a valuable consideration to the landowner in exchange for the recreational use of the property. The landowner owes the person no duty of care with respect to the condition of the property, except that the landowner is liable to the person for any injury to person or property for an act or omission that constitutes willful or wanton misconduct. For purposes of this section, valuable consideration does not include the state land recreational use license fee imposed under 77-1-802 or other funds provided under 77-1-815..

(2) As used in this part, "landowner" means a person or entity of any nature, whether private, governmental, or quasi-governmental, and includes the landowner's agent, tenant, lessee, occupant, grantee of conservation easement, water users' association, irrigation district, drainage district, and persons or entities in control of the property or with an agreement to use or occupy property.

(3) As used in this part, "property" means land, roads, water, watercourses, and private ways. The term includes any improvements, buildings, structures, machinery, and equipment on property.

(4) The department of fish, wildlife, and parks, when operating under an agreement with a landowner or tenant to provide recreational snowmobiling opportunities, including but not limited to a snowmobile area, subject to the provisions of subsection (1), on the landowner's property and when not also acting as a snowmobile area operator on the property, does not extend any assurance that the property is safe for any purpose, and the department, the landowner, or the landowner's tenant may not be liable to any person for any injury to person or property resulting from any act or omission of the department unless the act or omission constitutes willful or wanton misconduct.

Amended in 1995.

Reviewed by AAHS in July 2001.

Accessible Trail Design

Commonalties Between Accessibility, Resource Protection and Sustainable Trail Design

1. Curvilinear alignment produces a good sustainable trail and more moderate linear grades.
2. Moderate linear grades have less erosion, easier upkeep and higher access potential.
3. Firm, stable and uniform tread surfaces promotes good sheet drainage, reduces tread deformation, soil saturation and improves access.
4. Tread surfaces with a good coefficient of friction provide a safer and more pleasurable hiking experience and improve accessibility.

Solutions and/or Mitigations to Maximize Resource Protection and Sustainable Trails

1. Linear trail grades are kept moderate—between 5 and 8 percent, with short runs up to 10 percent.
2. Layout of trail maximizes side hill construction to provide a fuller native trail bench for better durability, drainage and sustainability.
3. Trails located on flat terrain are turnpiked to provide drainage and protect tree roots.
4. Trail structures such as retaining walls, bridges and drain lenses are kept to a minimum and are used to protect resources and maintain good linear grades.
5. Trail cross slope is kept at five percent but may be up to eight percent depending on the liner grade, tread width and type of tread surface.
6. Edge protection is provided when conditions warrant it, and is installed in a manner to facilitate sheet flow. Native vegetation and natural features such as rocks and logs can serve as edge protection.
7. Trail tread widths are designed to be a minimum of 36 inches and are widened only to mitigate conditions affecting accessibility.
8. Tread surfaces need only to be firm, stable and have a good coefficient of friction.
9. Mobility assistive devices that have a greater capability of traversing recreation trails need to be made available.

Solutions and/or Mitigation to Maximize Accessibility

1. Increasing the tread width and improving the coefficient of friction of the tread surface to mitigate steeper linear grades.
2. Widening the tread width, improving the tread surface and or providing edge protection to mitigate combinations of steeper linear grades, higher cross slopes and direction changes.
3. Widening the tread width and or installing edge protection mitigate locations with a steep drop-off.
4. Trail tread surfaces are well-shaped, compacted and constructed on fuller benches to provide better firmness and stability.
5. Native soils are augmented with crushed shale rock when additional strength and firmness is required.
6. Tread surfaces are constructed to be uniform but have enough roughness and texture to provide a good coefficient of friction.
7. Trail structures that create barriers are eliminated such as steps, and water bars.
8. Trail tread widths are designed to be a minimum of 36 inches.
9. Tree roots protruding into the trail tread are covered with native soils or a combination of crushed shale rock and native soil.
10. Rocks protruding into the trail tread are removed or covered with soils or crushed rock.
11. Vertical obstruction are either removed or mitigated by installing features that warn trail users that are visually impaired.

By Don Beers in "Parks & Recreation" June 2006

From: “a design guide, universal access to outdoor recreation”

Signs & Interpretation

- * Displays. Important artifacts, labels, and graphics should be placed at comfortable viewing levels relative to their size, with important text positioned so that it is viewable by all visitors. Display cases should be designed so that short or seated people can easily view the contents and labels. A mounting height of 24 to 30 inches with a 30 to 45 degree inclination toward viewers will make displays and video monitors accessible to most visitors.
- * Information Desks. Information desks and sales counters should be designed to facilitate use by visitors and employees in wheelchairs. Information about the accessibility of the exhibit and any adjoining recreation site should be available at the information desk.
- * Multi-Sensory and Participatory Signs. Whenever possible, signs systems should be designed to communicate to all the senses and should be understandable without having to read text. Bold graphics and colors can be used on maps and other displays to communicate simple messages and directions. Tactile and participatory elements can be included on signs and in exhibits to enhance other forms of communication and allow visitors who do not speak English, people with visual limitation, and people with learning disabilities to more fully enjoy and understand the exhibit. In developing the text for signs and exhibits, it is best to avoid unnecessarily complex and confusing topics as well as unfamiliar expressions and technical terms. Where appropriate, it is helpful to provide pronunciation aids for unfamiliar words.

Signs

- * Character Height. Signs mounted higher than 66 inches above the floor – 3 inches; within 66 inches of floor – 1 inch minimum.
- * Character Proportion. Width-to-height ratio between 3:5 and 1:1.
- * Line Weight. Stroke-width-to-height ration between 1:5 and 1:10.
- * Finish and contrast. The characters and background of signs must have an eggshell, matte, or other non-glare finish. In addition, characters and symbols must contrast with their background –either light characters on a dark background or dark characters on a light background.

Trailhead Information. Data on trail attributes and features should be posted at information areas and trailheads to assist all trail users in determining the extent to which the trail is within their range of ability and interest. At a minimum, posted data should include the trail’s average and maximum slope, cross slope, and width. When possible, a route map and grade profile should also be provided. Trailhead information signs can also be useful in lesser developed settings where the trails area dot designed to accessibility guidelines.

Snowmobile Use on Roads

Snowmobiles may be legally ridden on County roads by licensed drivers if machines are properly registered, stay in single file on the right edge of the road and do not exceed 15 mph.

Underage drivers need a State Snowmobile certificate and must travel with an adult

Riding off road is not allowed on private property within residential areas, except by permission.

Always ride under control, be considerate and yield to others.

A checklist to...

Make Your Snow Machine More Environmentally Friendly

- use proper jets, keep engines tuned and clutches adjusted properly for the elevation where machines operate
- use oxygenated fuels such as "gasohol" to reduce pollution
- use synthetic low-particulate lube oils to reduce particulates and smoke
- use synthetic biodegradable lube oils to reduce carbon monoxide
- check with your dealers, outfitters, and/or retailers for availability of these and similar products

ATV / ORV Use in the Clearwater Valley.

REGULATIONS

All terrain vehicles (ATV) and off highway vehicle (OHV) use in the Seeley Lake area is currently restricted to designated roads. Please do not leave these designated routes or their adjacent parking lots on your OHV.

- Operators 16 and older can ride on public roads if they are in possession of a valid driver's license.
- Operators ages 12 thru 16 are permitted on roads if they are in possession of a valid Safety Certificate and are accompanied by a licensed operator.
- In order to operate on designated roads, OHVs must be street legal (licensed). Vehicles must be equipped with at least one headlamp and one taillamp, which must be lighted at all times during operation, and with a suitable braking device operable by either hand or foot.
- In order to ride on public lands in Montana, all OHVs must be registered with the state and display a current registration decal.
- A license plate is required for use on public roads.

Important Note

The laws and regulations on this page are meant as a quick reference for ATV riders. For a complete list of OHV/ATV laws and regulations, please consult with the Montana Fish, Wildlife and Parks, the Seeley Lake Ranger Station or Missoula County Sheriff.

COURTESY AND APPROPRIATE USE

- Be considerate of others. Areas are shared with hikers, back-packers, horses, mountain bikers, moose, and bears. Yield the right of way whenever possible.
- Leave no trash; pick up any you find.
- Do not ride off the designated route, take short cuts, or ride into meadows or around lakes.
- This is high country and recovery from off-trail abuse takes decades.
- When riding through populated areas, slow down for safety and to reduce noise and dust.
- Most of all, enjoy this natural and beautiful country and help ensure that it remains so.

SAFETY

- Consult operator manuals and safety tips so you can continue riding and be with your friends and family.

Recreational use of State Land

Legally accessible state lands that are not closed or restricted are open to anyone possessing a valid Recreational Use License for "*General recreation*" use.

State land is colored light blue on most ownership and access maps produced by the USDA Forest Service (USFS) or the Bureau of Land Management (BLM). The Sperry Grade DNRC office can provide information on the location of state land.

"*General recreation*," by definition, includes most types of noncommercial and/or nonconcentrated activities, **except** cutting and gathering firewood, collecting valuable rocks/minerals, mineral exploration, or collection or disturbance of archaeological, historical, or paleontological sites (fossils, artifacts, dinosaur bones, old buildings, etc.) These excepted activities require separate authorization from DNRC.

Persons who possess a valid *Montana Conservation License* from DFWP will be authorized to engage in hunting, fishing, and trapping on legally accessible state trust land that is not closed or restricted to such use. Persons desiring to conduct all other types of noncommercial and/or nonconcentrated types of activities falling within the definition of "general recreational use," such as hiking, skiing, sight-seeing, day horseback use, etc., unless such activities are conducted in conjunction with and incidental to hunting, fishing, and trapping, will be required to possess a "*State Land Recreational Use License*," which is available from any authorized DFWP license agent.

A *Special Recreational Use License* which is available only from DNRC offices, is required for uses outside of the restrictions applicable to general recreational use. For example, overnight horseback use or overnight use (camping) more than 200 feet from a customary access point or for more than two days on leased/licensed state trust lands.

Access

Legally accessible state land is state land that can be accessed by dedicated public roads (roads usable by the public under state or federal law, or which are under the jurisdiction of the State Department of Transportation, or a county or municipal government); public rights-of-way or easements; by public waters such as rivers and streams that are recreationally navigable; by adjacent federal, state, county or municipal land if the land is open for public use, or by adjacent private land if permission to cross the private land is secured from the land owner.

Closures (All Recreational Use Prohibited)

Categorical Closures:

Lands leased or licensed for cabin sites or home sites are categorically (automatically) closed.

Site-Specific Closures:

After an opportunity for a public hearing, closures based on the disruption of livestock, weed control, wildlife protection, the presence of unique or special cultural or natural features, the presence of threatened, endangered or sensitive plant or animal species or communities, the presence of buildings, structures or facilities, or because recreational use would diminish the income generating potential of the state land. These closures can be seasonal, temporary, or permanent.

Lands Closed to Recreational Use Must be Posted At All Customary Access Points.

Restrictions

Motorized Vehicle Use is restricted to federal, state, and dedicated county roads or other roads regularly maintained by the county, or to other roads which have been designated open by DNRC. Off road travel is prohibited. Snowmobile use is allowed on roads

Parking by recreationists on state land is allowed within 50 feet of a customary access point; on federal, state and county roads in accordance with local traffic laws or regulations; or within 50 feet of a road designated open by DNRC.

Overnight Use (camping): (1) Outside of designated campgrounds on leased or licensed state land use must be conducted within 200 feet of a customary access point or navigable waterway, and must not exceed two consecutive days; (2) In designated campgrounds use is limited to 14 consecutive days; (3) On unleased or unlicensed state land, use is limited to 14 days within a calendar year. Overnight use outside of these restrictions requires issuance of a Special Recreational Use License from DNRC.

Pets must be kept on a leash or otherwise under the control of the recreationist.

Horseback Use is restricted to day use only. Horses may not be kept overnight on state land. Horseback use not in conjunction with licensed hunting may require prior notification to the lessee.

Interference with a lessee's or recreationist's legitimate use of state lands is prohibited.

Remember, respect each others' rights.

Disclaimer: The information presented here is for general informational purposes only and is not intended to provide legal advice to any individual or entity. Consult your own legal advisor before taking any action based on this information. Information presented here is public information and may be distributed and copied.