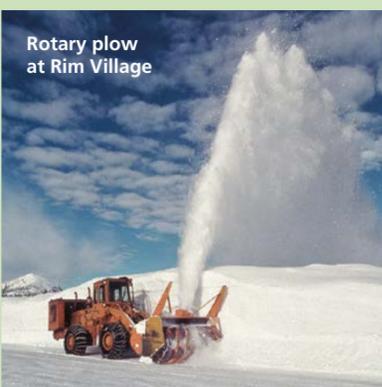


Crater Lake

National Park Service
U.S. Department of the Interior



Reflections Visitor Guide Winter/Spring 2018-2019



Rotary plow
at Rim Village

Keeping the Park Open is “Snow” Easy Task

What were you doing at 4:00 am this morning? If you were a member of the Crater Lake roads crew, you might have been reporting for duty!

Trying to keep Highway 62 and the road to Rim Village open year-round is no easy task. Each day, the park's heavy equipment operators work from 4:00 am to 8:00 pm, in two different shifts, clearing snow and sanding roads. During heavy storms, snow removal becomes a 24-hour operation, with crews working 12 hours at a time.

Snow plows were first used at Crater Lake in 1930. Prior to that, crews used shovels and dynamite to clear the roads each spring. Today, the park employs 6 operators and 2 mechanics who use both push plows and rotary plows. The rotary plows are equipped with a fan that can shoot snow 75 to 80 feet (24 meters) into the air. To control where the snow lands, the operator can vary the angle and volume of output.

The amount of snow moved each winter by the park's roads crew is astounding. With it, you could create a ski trail 3 feet (91 cm) wide, 6 inches (15 cm) deep, and long enough to circle the Earth at the equator!

Steve Thomas, the park's most experienced equipment operator, will be retiring this winter after nearly 40 years on the job. Even now, he still finds the work challenging. *(continued on back page)*

A Winter Wonderland But for How Much Longer?



Straddling the crest of the Cascade Mountain Range, Crater Lake National Park is one of the snowiest inhabited places in America. Storms from the Pacific Ocean dump an annual average of 43 feet (13 meters) of snow at Park Headquarters. Since 1931, however, when rangers began keeping track, totals have been trending downward. Snowfall has been below average for 8 of the past 10 years.

At first blush, warmer winters might seem to be good news, since deep snow makes life difficult. Many animals, including deer and elk, must leave the park in order to survive. Park employees must work hard to keep roads plowed and facilities functioning. And for the public, storms often lead to disappointment—Crater Lake is completely hidden by clouds almost 50% of the time in the winter and early spring.

But consider the bounty that blizzards bring. A thick blanket of snow provides protection and warmth for “subnivean” (below the snow) mammals such as shrews, voles, and pikas. It serves as a water reservoir for the park's old-growth forests, insulating trees from drought and fire. It provides visitors with opportunities to ski, sled, snowshoe, and marvel at winter's beauty. And it also benefits people outside the park, since most of the melted snow eventually feeds the Rogue, Umpqua, and Klamath Rivers. Snowy winters are good news for downstream farmers, ranchers, cities, and wildlife. Above all, it's thanks to snow that a lake exists here at all! This mountaintop caldera receives no water from rivers or streams. Its water comes straight from the sky.

Worryingly, less snow in the winter is having negative consequences in the summer. It's leading to longer and more severe fire seasons, a rise in insect epidemics and invasive species, and hardship for native plants and animals, as they struggle to survive in a climate to which they're not adapted. So, despite the challenges that long and snowy winters can impose on the park, they are ultimately a cause for gratitude, delight, and celebration. Let it snow—please!

Rangers use a giant ruler—21 feet tall—to measure snow depth at Park Headquarters. They have measured snowfall, snow depth, and precipitation here since 1931.

While the amount of precipitation hasn't changed over time, the type of precipitation has. Warmer weather is causing more of it to fall as rain and less as snow.

Average Annual Snowfall at Park Headquarters, by Decade:

1930s	–	614 inches (1,560 cm)
1940s	–	623 inches (1,582 cm)
1950s	–	572 inches (1,453 cm)
1960s	–	507 inches (1,288 cm)
1970s	–	495 inches (1,257 cm)
1980s	–	475 inches (1,207 cm)
1990s	–	493 inches (1,252 cm)
2000s	–	455 inches (1,156 cm)
2010s	–	409 inches (1,039 cm)



Snowshoe with a Park Ranger

Ranger-led snowshoe walks are a fun way to experience the winter wonderland of Crater Lake National Park. This winter, walks will take place on Saturdays, Sundays, and holidays from December 8 through April 28. They will also be offered daily (except on Christmas Day) from December 15 through January 6. Snowshoes are provided free of charge and no previous snowshoeing experience is necessary.

The walks start at 1:00 pm, last 2 hours, and cover 1 to 2 miles (1.6–3.2 km) of moderate-to-strenuous terrain. The route is up to the ranger, but most walks begin at Rim Village and explore the forests and meadows along the rim of the caldera. Along the way, participants discover how winter affects Crater Lake and the park's plants and animals.

Space on each tour is limited, and advance reservations are recommended. You can sign up at the Steel Visitor Center or by calling 541-594-3100. Participants must be at least 8 years old, in reasonably good physical condition, and have warm clothing and water-resistant footwear.

Scout troops, hiking clubs, and other organized groups of 10 or more people may be able to arrange for their own ranger-led walk (staff permitting). Group walks are available on weekdays as well as weekends.

Park Profile

Crater Lake National Park protects the deepest lake in the United States. Fed by rain and snow (but no rivers or streams), the lake is considered to be the cleanest and clearest large body of water in the world.

The lake rests inside a caldera formed 7,700 years ago when a 12,000-foot-tall (3,600-meter) volcano collapsed following a major eruption. The eruption may have been the largest in North America in the past 640,000 years. Later eruptions formed Wizard Island, a cinder cone near the southwest shore.

The park is central to the cultural traditions of local American Indian tribes, whose ancestors witnessed the lake's formation.

Today, old-growth forests blanket the volcano's outer slopes, harboring a wide variety of plants and animals, including several rare species. The park provides unique opportunities for scientific study and public enjoyment.

- Park established: 1902
- Size: 183,000 acres (74,060 hectares)
- Annual visitation: 700,000 people
- Lake depth: 1,943 feet (592 meters)
- Lake volume: 5 trillion gallons (19 tr. liters)
- Last time the lake froze over: 1949

Watch the Park Film

Curious to learn more about Crater Lake? Stop by the Steel Visitor Center to watch the park's 22-minute introductory film, shown every half hour. It explores the park's significance and the wonder that Crater Lake has inspired for generations. The film, entitled *Crater Lake: Into the Deep*, includes dramatic underwater footage along with state-of-the-art animation that depicts the lake's violent, volcanic past.





National Park Service
U.S. Dept. of the Interior

Crater Lake Visitor Guide Winter/Spring 2018-2019

This is the official trip-planner and newspaper of Crater Lake National Park. It is published twice a year and funded by the Crater Lake Natural History Association through sales made in the visitor center bookstore.

Park Mailing Address:
Crater Lake National Park
PO Box 7
Crater Lake, OR 97604

Phone: 541-594-3000
Website: www.nps.gov/crla
Email: craterlake@nps.gov

Accessibility

The Steel Visitor Center and Rim Village Café & Gift Shop are accessible to people with mobility impairments. Weather permitting, partial views of Crater Lake can be enjoyed from the top floor of the gift shop, accessible via elevator.

Drinking Water

There is a drinking fountain and bottle-filling station inside the Steel Visitor Center.

Drones

The operation of remote-controlled aircraft in the park is prohibited. Please report violators to the nearest park employee.

Emergencies

Dial 911 to report any emergency, 24 hours a day. An emergency phone is located outside the "snow tunnel" entrance to the administration building at Park Headquarters. First aid is available at the Steel Visitor Center or nearby Ranger Station.

Entrance Fee

In the winter (November 1 through May 21), the park's entrance fee is \$15 per car, good for 7 days. You can pay by cash, check, or credit card. Your fees are put to work improving services and facilities. Thank you for supporting your national parks!

Gasoline

Gasoline is not available in the park in the winter. Gas is available in the nearby communities of Chiloquin, Prospect, and Diamond Lake. Charging stations for electric vehicles may be available; inquire at the visitor center.

Lodging & Camping

There are no lodging or camping facilities open in the park in the winter. Overnight camping in pullouts and parking lots is prohibited. Primitive backcountry camping is allowed (see next page). Ask at the Steel

Visitor Center for a list of accommodations outside the park.

Lost & Found

Report lost & found items to the Steel Visitor Center or call the park's lost & found office at 541-594-3060.

Park Features

Leave rocks, plants, animals, and artifacts undisturbed for others to enjoy. It is prohibited to collect, deface, disturb, or destroy natural or cultural features.

Pets

Pets on a leash (or otherwise physically restrained) are allowed in the park, provided they stay within 50 feet (15 meters) of plowed roads and parking lots. Dogs on a leash are also allowed on the Pacific Crest Ski Trail, but not on other trails, or off-trail. Pets are not allowed in park buildings. Solid waste must be picked up immediately and disposed of properly, in a trash can or toilet.

Phones

Cell phone reception in the park is unreliable. You may have luck at Rim Village. There is a 24-hour emergency land-line outside the "snow tunnel" entrance to the administration building at Park Headquarters.

Post Office

A U.S. Post Office is open Monday through Saturday in the visitor center. Winter hours are 10:00 am–2:00 pm.

Recycling

Aluminum cans and plastic bottles are accepted at the Rim Village Café.

Wildlife

Do not feed wildlife, including birds and squirrels. Exposing them to our food alters their behavior, is bad for their health, and can be dangerous for you. Approaching, touching, feeding, and disturbing wildlife are prohibited.



Roads & Travel

The park is open year-round, 24 hours a day. Some roads, trails, and facilities, however, are closed seasonally due to snow.

The North Entrance Road and Rim Drive are closed to cars in the winter. They close for the season on November 1 (or earlier if there is significant snowfall). Crews begin removing snow from these roads in April, but opening dates vary. The North Entrance Road and West Rim Drive tend to open in early June. The East Rim Drive typically opens in early July.

Highway 62 is plowed daily and open year-round, as is the 4-mile road from Highway 62 to Park Headquarters. The 3-mile road from Park Headquarters to Rim

Village is also kept open as much as possible (typically about 80% of the time in the winter), but it's sometimes closed for days or weeks at a time during periods of heavy snow. When the road is open and weather permits, Rim Village offers spectacular views of Crater Lake. For current road and weather conditions, call 541-594-3100.

Even when plowed, park roads can be snow-packed and icy. Drive slowly, be alert for plows, and come prepared with tires that have good traction. Carrying chains is advisable during snow storms. Before visiting, check the weather forecast. For your safety, do not stop or park in the roadway. Parking is allowed only in plowed pullouts and parking lots.



Steel Visitor Center

Winter Closures

Many park facilities are closed in the winter and spring. Here are some approximate operating dates for 2019 (actual dates will depend on the weather).

May 17–Oct. 13	Crater Lake Lodge
May 24–Sept. 22	Mazama Village Cabins
May 24–Sept. 22	Annie Creek Restaurant
May 24–Sept. 22	Mazama Village Store
May 24–Oct. 14	Mazama Gas Station
May 24–Sept. 30	Rim Visitor Center
June 1–Sept. 30	Mazama Campground
June 21–Sept. 15	Boat Tours
June 21–Sept. 30	Trolley Tours
June 21–Oct. 31	Sinnott Overlook
July 1–Oct. 14	Lost Creek Campground

Facilities

Restrooms

There is a 24-hour restroom at Rim Village. Restrooms can also be found inside the Steel Visitor Center and Rim Village Gift Shop during business hours.

Rim Café & Gift Shop

The café & gift shop is open daily except on November 22, December 25, and on days when the road to Rim Village is closed due to snow. Winter hours are 10:00 am–4:00 pm, with expanded hours likely starting sometime in March.

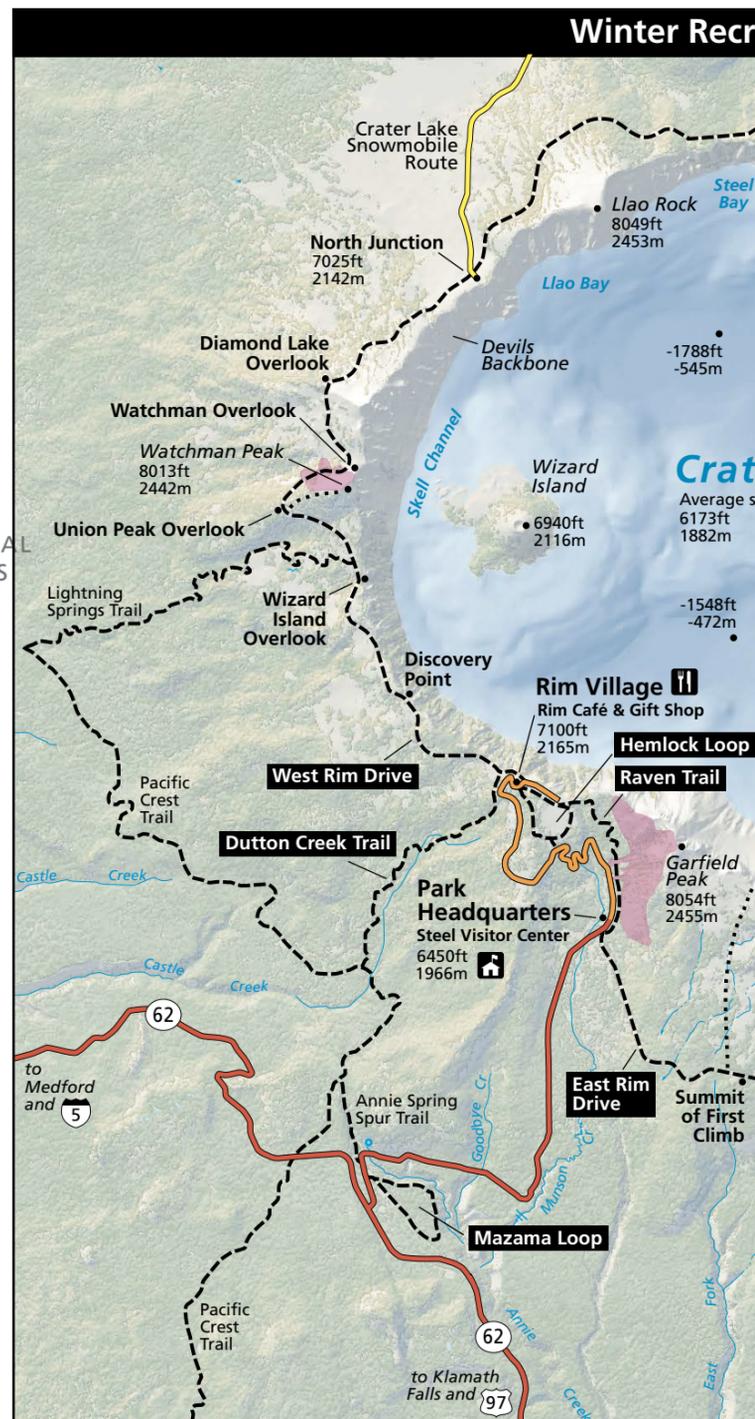
The café serves quick meals including hot sandwiches, chili, and soup. Beverages include hot chocolate, coffee, juice, and soft drinks. The large gift shop offers a wide selection of souvenirs, as well as winter clothing and snowshoe rentals (see next page).

An observation room on the top floor of the Café provides partial views of Crater Lake (weather permitting). It also features a few exhibits and an information desk staffed by volunteers most weekends.

Steel Visitor Center

The Steel Visitor Center at Park Headquarters is open every day of the year except December 25. Winter hours are 10:00 am–4:00 pm, becoming 9:00 am–5:00 pm in mid-April.

Rangers are available to answer questions, provide weather forecasts, issue backcountry permits, and help plan your visit. Postcards, maps, books, and other educational materials are available for sale (see back page). Kids ages 6 through 12 can earn an official Junior Ranger badge by completing a free activity book. A 22-minute film, *Into the Deep*, is shown every half hour. The film explores the park's significance and the lake's volcanic past.



Activities

Lake Viewing

When skies are clear, excellent views of Crater Lake can be enjoyed at Rim Village. During storms, however, the lake is typically obscured by clouds. The lake is completely "invisible" about 50% of the time in the winter and early spring! To avoid disappointment, check the weather forecast before you leave home. To check visibility at Rim Village, visit the park's website (www.nps.gov/crla) to view a webcam pointed toward the lake.

A partial view of Crater Lake can usually be obtained from an observation room on the top floor of the Rim Village Café & Gift Shop. The observation room is accessible via elevator. For a better view of the lake (and when deep snow blocks the view from the observation room), you'll need to climb up a snowbank and take 20 to 30 steps across the snow. A "snow ramp" across from the Rim Village restroom building provides the easiest access to the top of the snow, which can be 10 to 15 feet (3 to 4.6 meters) deep. Be careful—the snow ramp can be icy and slippery, and dangerous snow cornices overhanging the rim of the crater may be difficult to spot. Stay back from the edge!

Snowmobiling

In the winter, the park's North Entrance Road is groomed for snowmobiles, which may travel as far as the rim of Crater Lake. Snowmobiles must stay on the groomed and marked route; they are not allowed on the Rim Drive, and off-route travel is prohibited.

The snowmobile route is open as conditions permit, typically from December through March.

Diamond Lake Resort, located 5 miles (8 km) north of the park, offers snowmobile rentals and guided tours into the park. Renting a 1- or 2-person snowmobile costs \$120 for 2 hours, \$170 for 3 hours, \$220 for 4 hours, or \$350 for 8 hours, plus the cost of fuel. Significant discounts are available for overnight guests. Guided tours into Crater Lake National Park are available with 48 hours advance notice. Guide service costs \$55 per hour. Most guided trips to the rim of Crater Lake last 3 hours. For more information, call 541-793-3333 or visit www.diamondlake.net.

Backcountry Camping

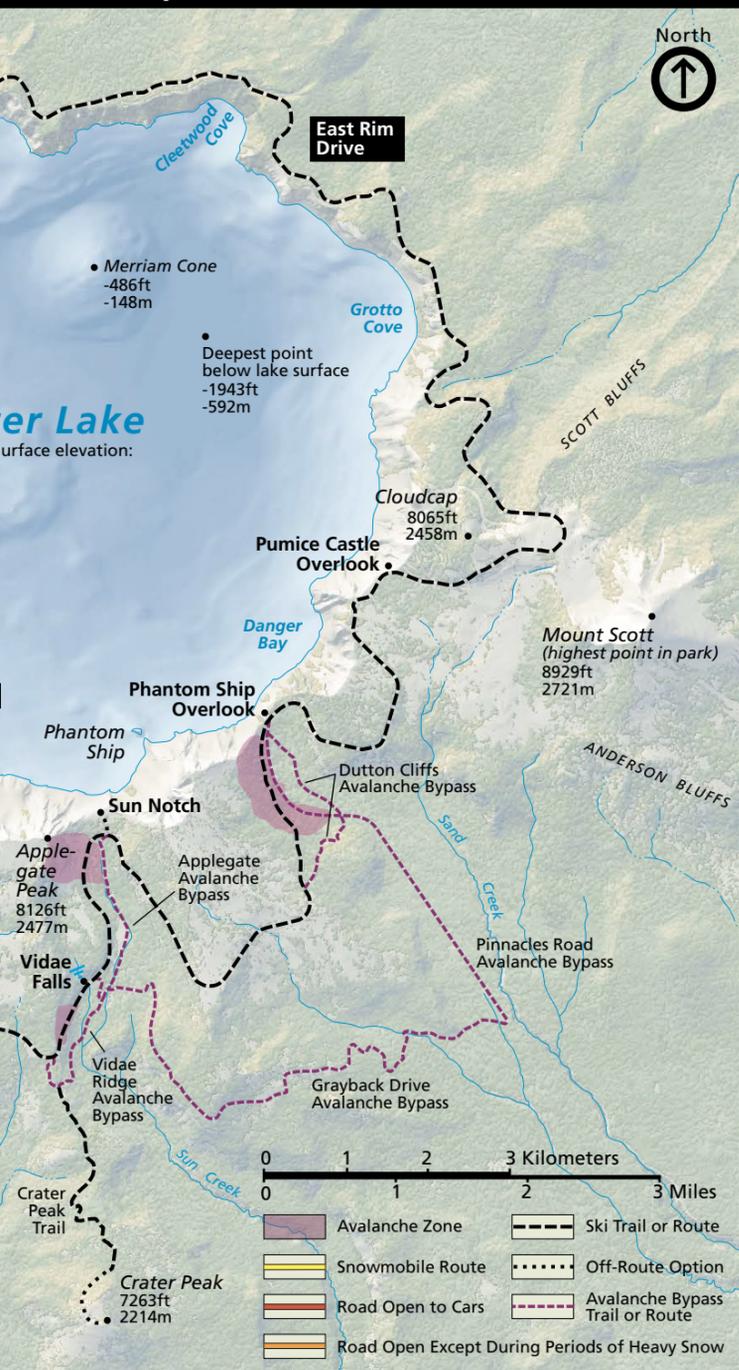
Backcountry camping is allowed in the park year-round. Winter offers well-prepared skiers and snowshoers opportunities to experience occasions of unique beauty and solitude. All campers must obtain a free backcountry permit, in person, from the Steel Visitor Center or nearby Ranger Station during business hours.

The most popular overnight trip is out-and-back along the West Rim Drive. The most popular extended trip is the 31-mile (50-km) circuit around Crater Lake (see box, top right). Snow camping is required; there are no public huts or shelters. Campers must be at least 1 mile (1.6 km) from the nearest plowed road and out of sight of any ski trail or route. Vehicles must be left at Park Headquarters (not at Rim Village). For trip-planning advice and a complete list of regulations, stop by the Steel Visitor Center or call 541-594-3060.



Stay back from the edge of the crater! Unstable ledges of snow, called cornices, extend beyond the rim.

Location Map



Skiing

The park features a variety of marked trails and unmarked routes for cross-country skiing (see list on right). The trails are not groomed, so skiers will often need to break trail, sometimes through deep snow. Conditions vary greatly, from powder to slush to ice. Ask at the Steel Visitor Center for trail recommendations.

Skiing is prohibited on Highway 62, the road to Rim Village, and in parking lots. Skiing inside the caldera is also strictly prohibited. The park does not rent skis. Ask at the Steel Visitor Center for a list of rental locations outside the park.

Sledding

There are no designated sled hills or snow-play areas in the park, but many opportunities for sledding can be found. For your safety, sledding, innertubing, and tobogganing are prohibited on Highway 62, the road to Rim Village, and in parking lots. Please select areas that have gentle slopes, are free of trees and other obstructions, and that provide a safe, flat runoff area. Several such locations exist near Rim Village; a popular spot is the open meadow south of Crater Lake Lodge.

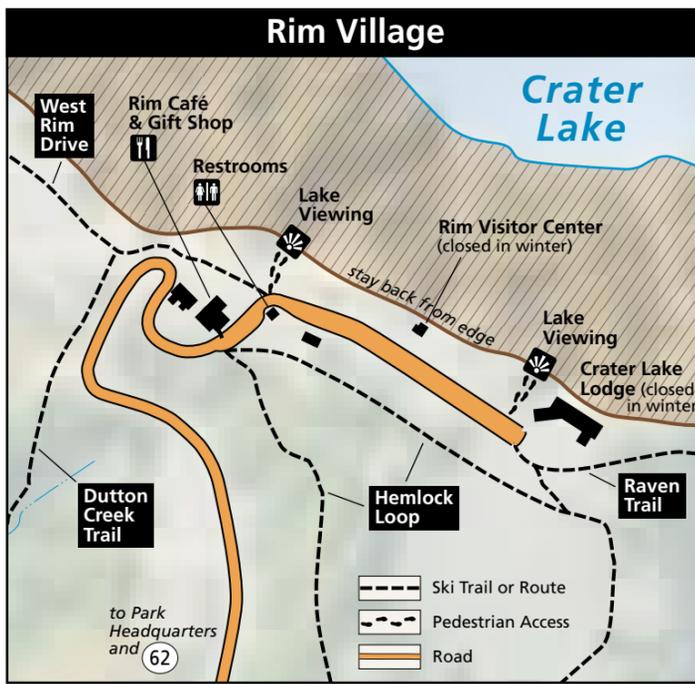
Snowboarding

Snowboarding is allowed in the park, but extreme caution should be used. Snowboarders should be experienced in avalanche safety and winter backcountry travel. Snowboarding inside the caldera is strictly prohibited. Snowboarding is also prohibited on roads and parking lots that are open to automobile traffic.

Snowshoeing

Crater Lake National Park is a snowshoer's paradise. To avoid getting lost, first-time visitors are advised to follow one of the park's ski trails. As a courtesy to skiers, please refrain from walking on ski tracks. Snowshoeing is prohibited inside the caldera, on Highway 62, and on the road to Rim Village.

Snowshoe rentals are available at the Rim Village Gift Shop (unless the road to Rim Village is closed). Adult snowshoes are \$16 day, kids snowshoes are \$12.50 per day, and hiking poles are \$4 per day. Overnight rentals are allowed; the rental price is good for a 24-hour period. Renting snowshoes is not necessary for the park's ranger-guided walks (see page 1), for which snowshoes are provided free of charge.



Ski Trails

Crater Lake National Park features many miles of marked ski trails and unmarked routes. The most popular are described here. The trails are not groomed and some may be hard to follow; ask at the Steel Visitor Center for more information.

EASIER TRAILS

Mazama Loop

Distance: 1.7 mi. (2.7 km) loop trail
Recommended for beginning skiers, this flat trail loops through Mazama Village Campground and provides views into Annie Creek Canyon. It is marked with blue diamonds attached to the trees and, from December through March, orange snow poles in the clearings. **Trailhead:** 4 mi. (6.4 km) south of Park Headquarters, just north of the summer fee booth and Highway 62.

West Rim Drive

This is the park's most popular ski route, providing spectacular views of Crater Lake and Wizard Island. It follows the West Rim Drive, which is unplowed from November to mid-April. The route is not marked, but the path of the underlying road is generally apparent. The route features gently rolling terrain and is suitable for skiers of all abilities. Be aware, however, that conditions are often icy and windy. Occasional forested areas provide some protection from the wind. Trips of varying lengths are possible. Most skiers attempt to reach one of the following destinations before turning back to Rim Village. **Trailhead:** Snow ramp across from the Rim Village restrooms.

Discovery Point

Distance from Rim Village: 1.2 mi. (1.9 km)
Discovery Point is a popular summer pull-out on the West Rim Drive. The overlook offers a fine view of Wizard Island and marks the spot where gold prospector John Hillman first set eyes on Crater Lake in 1853. The overlook is not signed but is fairly obvious as a broad, level viewpoint.

Wizard Island Overlook

Distance from Rim Village: 2.3 mi. (3.7 km)
This small, unmarked viewpoint provides an even better bird's-eye view of Wizard Island. The island is a cinder cone that erupted out of Crater Lake around 7,300 years ago.

Union Peak Overlook

Distance from Rim Village: 3.1 mi. (5.0 km)
The next road segment is a steady climb, gaining 240 feet (73 meters) in elevation. On a clear day, the ascent is worth the effort: just before the road curves sharply to the right, a small, unmarked viewpoint on the left offers long-distance views of the Cascade Mountain Range. Union Peak, the core of an old volcano, stands 8 miles (13 km) to the south. To the left of Union Peak is Mt. McLoughlin, 35 miles (56 km) away. The views often extend as far as Mt. Shasta, 100 miles (161 km) distant.

Beyond Union Peak Overlook

Distances from Rim Village—
Watchman Overlook: 3.9 mi. (6.3 km)
Diamond Lake Overlook: 4.6 mi. (7.4 km)
North Junction: 6.0 mi. (9.7 km)
Exploring further requires caution. Just beyond Union Peak Overlook, the road is cut into a cliff. When this roadcut fills with snow, it may be advisable to leave the road and bypass the cliff higher up on the slope. Next, the road traverses the north face of Watchman Peak, an avalanche-prone slope that is sometimes dangerously icy. Do not hesitate to remove your skis

or turn back if conditions warrant. If you continue, possible destinations include Watchman Overlook, Diamond Lake Overlook, and North Junction. Another option, popular with snowshoers, is to attain the summit of Watchman Peak via its western ridge. Atop the peak is a fire lookout, built in 1932 and still used each summer.

INTERMEDIATE TRAILS

Hemlock Loop

Distance: 1.3 mi. (2.1 km) loop trail
This enjoyable loop trail offers a lot of variety. It explores a forest of mountain hemlock trees punctuated by meadows that provide distant views to the south and east. It can be skied in either direction, but traveling counterclockwise provides more interesting downhill slopes and turns. In this direction, the trail begins by climbing 45 feet (14 meters) to its high point. It then drops 200 feet (61 meters) in elevation before gaining 155 feet (47 meters) on its return to Rim Village. The trail is marked with blue diamonds in the trees and, from December through March, orange snow poles in the meadows. **Trailhead:** Snow ramp across from the entrance to the Rim Village Café & Gift Shop. The trail can also be accessed from a snow ramp near Crater Lake Lodge and a roadside pullout approximately 1.5 mi. (2.4 km) south of Rim Village.

East Rim Drive

The East Rim Drive is a good alternative to the West Rim Drive on windy days. The forested route provides protection from the elements and, upon reaching Sun Notch, a spectacular view of Crater Lake and the Phantom Ship. The route is not marked, but skiers should have no trouble following the path of the underlying road, which is unplowed from November to mid-June. The route is rated "intermediate" because it features longer and steeper climbs than the West Rim Drive and crosses several areas prone to avalanche. Trips of varying lengths are possible. Most skiers attempt to reach one of the following destinations before returning. **Trailhead:** Roadside pullout 150 yards (137 meters) south of Park Headquarters.

Summit of First Climb

Distance from trailhead: 1.8 mi. (2.9 km)
The road dips gently for the first half mile (.8 km), losing 115 feet (35 meters) of elevation while passing the park's residential area. Then begins a steady climb, which in 1.3 miles (2.1 km) gains 436 feet (133 meters). The climb is popular with skiers looking for a short, invigorating workout. Views from the summit are limited, but on the return trip Crater Lake Lodge is visible on the skyline straight ahead.

Vidae Falls

Distance from trailhead: 3.1 mi. (5.0 km)
Vidae Falls is a spring-fed cascade that drops 100 feet (30 meters) over a series of ledges on the west side of the road. In the winter, it is sometimes a beautiful lattice of ice. Other times, it is completely buried by snow. From the summit of the first climb, the road descends gradually to Vidae Falls, losing 191 feet (58 meters) of elevation. Along the way, it traverses a potential avalanche area, which, if conditions warrant, can be avoided by taking the marked Vidae Ridge Avalanche Bypass Trail. (A detailed map of the bypass trail is available at the Steel Visitor Center.)

Sun Notch

Distance from trailhead: 4.5 mi. (7.2 km)
To view Crater Lake, skiers must continue on to Sun Notch, gaining an additional 505 feet (154 meters) of elevation. Skiers must also cross—or bypass—a second

Circling the Lake

Each winter, approximately 80 skiers and 50 snowshoers travel all the way around Crater Lake. It's a trip that can be exceptionally rewarding, with unforgettable views. It can also be physically and mentally demanding—a test of endurance and outdoor skills.

When the weather is clear, the 31-mile (50-km) loop takes an average of 3 days to complete. Storms, however, force many parties to turn back or to spend extra nights. The route is unmarked, difficult to follow in places, and crossed by a number of avalanche paths. Those attempting the trip should be experienced in winter camping, backcountry travel, and avalanche safety. A backcountry permit is required.

Although the loop can typically be done any time between late November and early May, the most popular months are March and April. Spring provides more hours of daylight than the winter months and longer periods of clear weather.

avalanche zone. (A detailed map of the Applegate Avalanche Bypass Route is available at the Steel Visitor Center.) Sun Notch itself lies .25 miles (.4 km) north of the East Rim Drive. To find it, leave the road at the apex of the sweeping right-hand curve; the turnout is not marked. The view from Sun Notch is dramatic. Nearly 1,000 feet (305 meters) above the water, it directly overlooks a rocky island known as the Phantom Ship. Stay back from the edge of the caldera and its dangerous, overhanging snow cornices.

Garfield-Applegate Ridge

Distance from trailhead: 3.2 mi. (5.1 km)
Another lake-viewing option for snowshoers and advanced skiers is to attain the caldera's rim between Garfield Peak and Applegate Peak. This is an unmarked but straightforward ascent through open meadows and groves of trees. Leave the East Rim Drive near the summit of the first climb. The rim is 1.4 miles (2.3 km) due north, with an additional elevation gain of 950 feet (290 meters).

ADVANCED TRAILS

Raven Trail

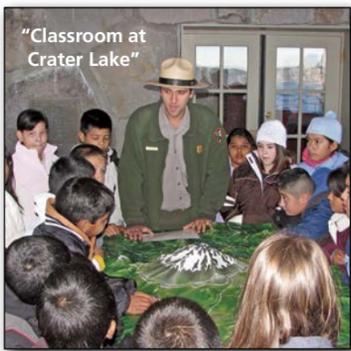
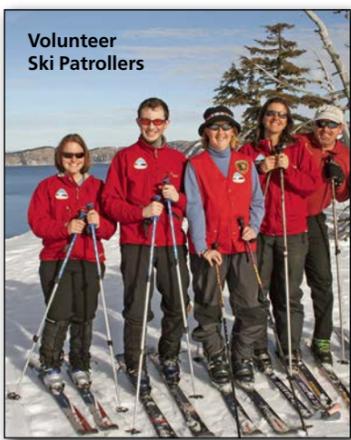
Distance: 1 mi. (1.6 km)
The Raven Trail is a favorite of park rangers after work. It descends steeply from Rim Village to Park Headquarters, dropping 610 feet (186 meters) in elevation. It is almost always skied one-way, downhill, which requires two vehicles or a shuttle to the top. When icy, the trail can be dangerously fast, with two very steep sections. It flattens out halfway to Park Headquarters, where it crosses the base of a large avalanche chute then runs parallel to the road to the lower trailhead. During times of heavy snow, when the road to Rim Village is closed, the trail is also used by snowshoers who hike up it to view the lake. **Upper Trailhead:** Snow ramp near Crater Lake Lodge. **Ski east along the rim, then follow blue diamonds down through the trees. Lower Trailhead:** Roadside pullout 150 yards (137 meters) south of Park Headquarters.



Dutton Creek Trail

Distance: 4.6 mi. (7.4 km)
This trail is little used but offers a fun and challenging backcountry experience. It is typically skied from north to south and therefore requires two vehicles or a shuttle. The top section, in places, is steep. It descends through a forest of mountain hemlock and red fir, dropping 1,000 feet (305 meters) in 2.5 miles (4 km) to meet the Pacific Crest Trail. The trail then climbs 250 feet (76 meters) to a junction. The left fork descends to Mazama Village; the right fork continues along the PCT to a trailhead on Highway 62. The trail is marked with blue diamonds and some older orange and red blazes, but skiers should carry a topographic map and a compass or GPS. **Trailhead:** Snow ramp across from the Rim Village restrooms. **Ski west, just past Rim Village, and look for the trailhead sign on the south side of West Rim Drive.**

Support Your Park—



Shop in the Visitor Center Bookstore

When you shop in the visitor center, all proceeds from your purchase are invested back into the park. The bookstore is operated by the Crater Lake Natural History Association, a nonprofit organization established in 1942 to support the park's educational and scientific programs.

The association funds a variety of projects, including the printing of this visitor guide. Some of the bookstore's offerings are described to the right. For a complete list of merchandise and to buy items online, visit www.craterlakeoregon.org. You can also order by calling 541-594-3111.

Buy Crater Lake License Plates

If you live in Oregon, consider choosing Crater Lake license plates for your vehicle. For a one-time charge of \$30, you can outfit your car with these beautiful plates while supporting park projects. You can purchase Crater Lake plates at any time, not just when buying a new vehicle or renewing your registration. Visit any Oregon DMV office or www.oregon.gov/odot/dmv for details.

Proceeds go into an endowment that funds the operation of the park's Science and Learning Center. The center opened in 2006 and consists of two renovated historic

structures near Park Headquarters: the original Superintendent's Residence and Chief Naturalist's Residence. These buildings now provide living and working space for visiting scientists, teachers, and artists.

The Science and Learning Center draws researchers and educators to Crater Lake from around the world, encouraging them to use the park as an outdoor laboratory and classroom. For more information about the Science and Learning Center and its programs, visit www.nps.gov/rlc/craterlake.

Volunteer Your Time

Looking for a hands-on way to help the park? Consider sharing your time and talents as a Crater Lake VIP (Volunteer-In-Parks). Full-time volunteers are needed throughout the year to help staff visitor centers and present interpretive programs. Opportunities are advertised several times each year at www.volunteer.gov. Volunteers are provided free housing in exchange for 3 months of service.

To assist with special projects or volunteer periodically, join The Friends of Crater Lake, a non-profit organization founded in 1993. Members remove non-native plants, build

and maintain trails, contact visitors, operate a winter information desk at Rim Village, and assist with special events. Learn more at www.friendsofcraterlake.org.

The Crater Lake Ski Patrol has been assisting winter visitors and maintaining the park's cross-country ski trails since 1983. Members, identifiable by their bright red parkas, receive training in wilderness first aid, survival skills, search and rescue, map and compass use, and avalanche safety in exchange for at least 6 days of service. For more information, visit www.craterlakeskipatrol.weebly.com.

Contribute to the Crater Lake Trust

The Crater Lake National Park Trust is a nonprofit organization that raises private funds to support park projects and connect the park with surrounding communities. It helps fund, for example, field trips to the park for more than 5,000 grade-school students each year. In a program called "Classroom

at Crater Lake," kids engage in hands-on science and learn about wildlife, old-growth forests, and winter ecology. For most of the kids, it's their first visit to the park. To learn more about the Trust and its activities, visit www.craterlaketrust.org. Share your love of the park by making a tax-deductible gift.

Share Your Comments

Whether you have a compliment, concern, or suggestion, we'd like to hear from you! This is your national park, and we value your input on how best to manage it. You can provide feedback in several ways. Fill out

a comment form at the visitor center, send an email to craterlake@nps.gov, or write to: Superintendent, Crater Lake National Park, PO Box 7, Crater Lake, OR 97604.

Keeping the Park Open

(continued from page 1)



Steve Thomas, Equipment Operator

"It can be a hazardous job," reports Steve, "especially when it's dark and white-out conditions are occurring. On a winding mountain road, you never know what's around the next corner. It could be a tree across the road at windshield level, or a car stuck in the snow."

Despite the hazards—which also include rare, but potentially deadly, avalanches—Steve says the rewards are even greater. "It's very fulfilling to be able to provide a service to people that allows them to experience the incredible beauty of Crater Lake. And being able to ski and hike from the front door of my house is a nice fringe benefit."

The most challenging part of the job is "Spring Opening," when the equipment operators turn their attention to opening up the 30-mile (48-km) Rim Drive and 9-mile (14-km) North Entrance Road for the summer. They begin on the West Rim, departing Rim Village around the 3rd week in April. On average, the snow they encounter is 20 to 30 feet (6 to 9 meters) deep. In the vicinity of Watchman Peak, they meet drifts 45 to 50 feet (15 meters) thick.

The crews head slowly north, averaging .25 miles (.4 km) of road cleared per day. In a light snow year, they'll reach the park's North Entrance by mid-May. After a severe winter, it will take until mid-June. The East Rim Drive is their final leg. "If we can get all the way around the lake by the 4th of July," Steve says, "we're happy."

For your safety, when you encounter a snow plow in the park, please give it a wide berth. Passing a plow on the park's narrow roads can be dangerous. Wait until an intersection or until the plow comes to a stop and the operator waves you by. Until then, assume that the operator can't see you; visibility from inside the plows can be poor. Also, skiers and pedestrians should be sure to keep well away from the dangerous cascade of snow thrown by the rotary plows.

Thanks to the hard work, long hours, and dedication of the park's heavy equipment operators and mechanics, we can access and enjoy Crater Lake National Park every month of the year.

Climate Chart

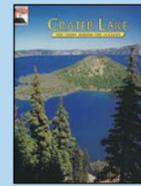
Crater Lake National Park is one of the snowiest inhabited places in America. Storms from the Pacific Ocean dump an average of 43 feet (13 meters) of snow at Park Headquarters. That's equivalent to 1.4 inches (3.6 cm) of snow every day for an entire year! The park's tremendous snowfall is a result of its position at the crest of the Cascade Mountains.

Data is from Park Headquarters, 1931-2017.

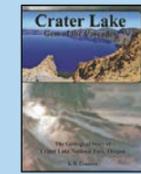
FAHRENHEIT	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Average Daily High (°F)	34	35	37	42	50	58	69	69	63	52	40	34
Average Daily Low (°F)	18	18	19	23	28	34	41	41	37	31	23	19
Average Snowfall (inches)	100	81	83	45	19	4	0.2	0.1	3	21	61	93
Avg. Snow Depth (inches)	79	101	115	111	76	24	1	0	0	2	16	47

CELSIUS	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Average Daily High (°C)	1	2	3	6	10	15	21	21	17	11	4	1
Average Daily Low (°C)	-8	-8	-7	-5	-2	1	5	5	3	-1	-5	-7
Average Snowfall (cm)	254	206	211	115	49	9	0.5	0.3	7	53	155	237
Avg. Snow Depth (cm)	201	256	292	281	193	60	3	0	1	6	42	120

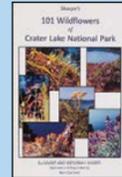
Recommended Reading



Crater Lake: The Story Behind the Scenery
Large photos with detailed captions accompany the text of this popular book. 48 pages, \$11.95.



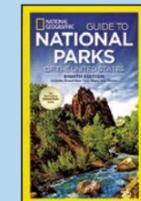
Crater Lake: Gem of the Cascades
A comprehensive guide to the park's geologic story, written by a former park ranger. 168 pages, \$15.95.



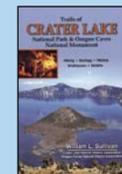
101 Wildflowers of Crater Lake National Park
Detailed descriptions and vivid photos of the park's most common flowers. 74 pages, \$14.95.



Trees to Know in Oregon
Tree identification is easy and enjoyable with this photo-packed, fact-filled guide. 153 pages, \$18.00.

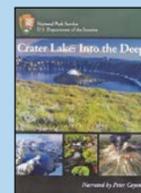


Guide to the National Parks of the United States
This best-selling book from National Geographic features 380 stunning photos and 80 color maps. 480 pages, \$28.00.



Trails of Crater Lake & Oregon Caves
A detailed guide to 24 hikes. 112 pages, \$14.95.

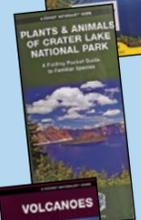
Other Educational Items



Crater Lake: Into the Deep DVD
Own the film shown at the Visitor Center. Discover the park's significance and explore the lake's violent, volcanic past. 22 minutes, \$14.99.



Crater Lake Topographic Map
Recommended for trips into the park's backcountry. Waterproof and tearproof. 1:55,000 scale. \$11.95.



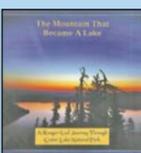
Plants & Animals of Crater Lake National Park
This folding, waterproof pocket guide will help you identify the park's most visible species. 11 pages, \$6.95.



Volcanoes
Folding, waterproof guide to volcanoes, lava rocks, and plate tectonics. 11 pages, \$7.95.



Star and Planet Guide
Rotating "planisphere" for locating, stars, planets, and constellations in the night sky. \$11.99.



The Mountain That Became a Lake CD
Listen to this CD as you drive the park's roads. Scientists, park rangers, and Klamath Indians share facts, stories, and insight about Crater Lake. 60 minutes, \$16.95.