

# VOLCANO REVIEW



Mount St. Helens National Volcanic Monument Newspaper • Summer/Fall 1989

## WELCOME!

At Mount St. Helens National Volcanic Monument you can explore the newly created volcanic landscape and discover its rich cultural past. Envision the summer food-gathering expeditions of Native Americans, see the effects of the May 18, 1980 eruption, and marvel at the growth of the lava dome. Come take a look into the past and step into the future. *Bradley Powell Monument Manager*

### OPEN WINDOWS OF DISCOVERY June 19–September 4

"Every natural area speaks for itself, but in a language most visitors don't understand." Forest Interpreters have scheduled a diversity of activities to help you understand and enjoy the Mount St. Helens

National Volcanic Monument. These programs provide you with an unrivaled opportunity to ask questions and open new windows of discovery into Mount St. Helens' colorful past and exciting future.

#### DAILY

##### **Windy Ridge Talk** 11:30 to 4:30

What did volcano watchers witness during the Mount St. Helens eruption? Join a Forest Interpreter to visualize the incredible power unleashed on May 18, 1980, and find out what's happening now. Talks once an hour on the half hour at the Windy Ridge amphitheater. 30 minutes.

##### **Meta Lake Walk** 12:00 & 3:00

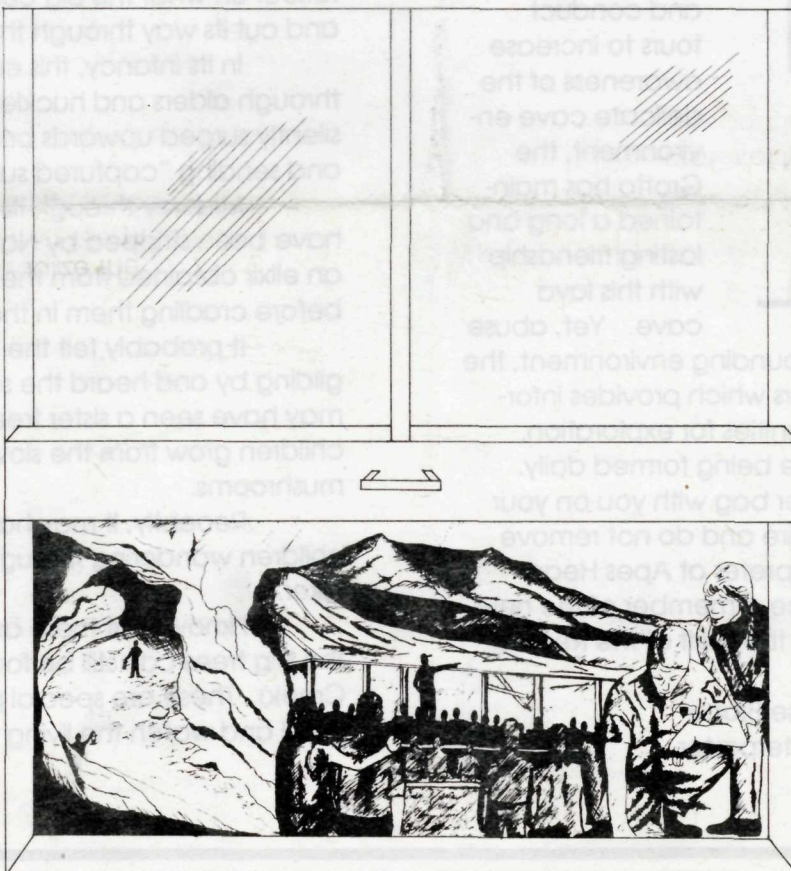
How could life have survived the searing heat and force of the 1980 eruption? Come stroll with a Forest Interpreter to this emerald lake teeming with life and hear stories about survivors and come-backs. Meet at the Miners' Car; junction of Roads 26/99. 45 minutes.

##### **Ape Cave Lantern Walk** 12:00, 1:00, 2:00

Explore the cool underground world of this lava-formed cave as a Forest Interpreter sheds light on the life and features in Ape Cave. Meet at Apes Headquarters; 3 miles north of 83/90 junction. 30 minutes.

##### **Lahar Walk** 4:00

Discover the power of an immense mudflow which scoured this landscape and how life survives in a newly created subalpine desert. Meet at the Lahar Viewpoint, 11 miles east of 83/90 junction; 45 minutes. 83 Road subject to 20 minute delays due to construction: plan ahead.



##### **Mount St. Helens Visitor Center:**

Open year-round, the visitor center has exhibits, multimedia presentations and interpretive activities that explore the dynamic environments of Mount St. Helens. Located 5 miles east of Castle Rock (exit# 49 from Interstate 5) on State Highway 504. Daily hours: 9:00 a.m. to 6:00 p.m.

##### **Pine Creek Visitor Information Station:**

Open from Memorial Day weekend to late September, Pine Creek offers quick, friendly traveling information, a bookstore, and a video to watch. Located 18 miles NE of Cougar on Forest Road 90. Daily hours: 9:00 a.m. to 5:30 p.m.

##### **Apes Headquarters:**

Open weekends in late spring and early fall and open daily from June 19 to Labor Day, Apes Headquarters is our newest facility to add to your enjoyment of the area. It offers lantern rentals, information, interpretive activities, and booksales. Located on Forest Road 8303, three miles north of the 83/90 junction. Daily hours: 10:00 a.m. to 6:00 p.m.

#### WEEKENDS

##### **Independence Pass Hike** 12:00

Spend an afternoon with a Forest Interpreter on an easy hike through a rugged landscape of craggy rock outcrops and towering rock pinnacles. Enjoy dramatic views overlooking Spirit Lake and into the crater of Mount St. Helens. Meet at the Independence Pass trailhead; 2 1/2 miles west of 26/99 road junction on Road 99. 3 to 4 miles round trip; allow 2 hours.

##### **Harmony Falls Hike** 1:30

Discover the favorite hideaways of those who relished the Spirit Lake basin of the past. Join a Forest Interpreter for a view into the crater and a walk back in time to the shores of Spirit Lake. Meet at the Harmony Viewpoint; 3 1/2 miles west of 26/99 junction on Road 99. Two miles round trip; allow 1 1/2 hours.

##### **Clearwater Car Caravan** 11:00 a.m.

Join an Interpreter for a drive through the Clearwater Valley where the Forest Service has begun an extensive management project to rehabilitate the land affected by the May 18, 1980, eruption of Mount St. Helens. This 12-mile gravel road is usually closed to visitors. One-way travel. 1 1/2 hours, 11:00 a.m. meet at junction of 25/2560 roads. 4:00 p.m. meet at Cascades Peak Viewpoint on Road 99.

##### **Campfire Programs**

Join a Forest Interpreter for an evening of stories, songs, and fun for all ages.

##### **Swift Camp:** Saturdays

8:00 p.m. June and July.

7:00 p.m. August.

##### **Cougar Camp:** Saturdays

8:30 p.m. June and July.

7:30 p.m. August.



## APE CAVE FRIENDS; OLD AND NEW

Long before the famous May 18, 1980, eruption of Mount St. Helens, visitors flocked to the south side of the mountain to explore the fascinating underground world of Ape Cave. The longest continuous lava tube in North and South America, Ape Cave is found within a massive lava flow that oozed from the volcano's southern flank some 1900 years ago. Flowing downhill, the stream of fluid lava cooled and formed a hard crust atop the hot lava. In time the lava drained, and left an intricate, winding lava cave behind.

Discovered in the early 1950s, the cave was first explored by members of the Reese family. They shared an excitement about the cave, caring for and respecting the solid yet fragile environment. Harry Reese and his sons often led the local Boy Scout Troop, the "Mount St. Helens Apes" (a name the boys aptly chose for their troop and for whom the lava cave was named) and other visitors into the farthest reaches of the cave. At the conclusion of the tour all the lights were extinguished and in the utter darkness a single match was struck. In the revealing light they recited a pledge of conservation, vowing to protect the earth both above and below the ground, and Reese declared everyone a member of the Mount St. Helens Apes.

The cave soon gained popularity and hundreds of visitors explored the cave each year. Unfortunately, many have abused the cave. Delicate sand castles formed by water dripping from the ceiling are no more — careless visitors erased them from existence. Other features such as the lava "cicles" formed from the re-melting of lava on the ceiling, have been broken off forever. Many have left reminders of their visit by thoughtless littering and graffiti.

Hoping to put an end to the abuse, the Oregon Grotto of the National Speleological Society adopted Ape Cave in 1974. Volun-

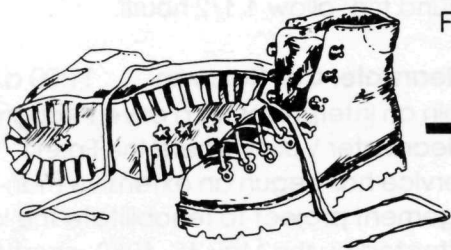


teering to answer questions and conduct tours to increase awareness of the delicate cave environment, the Grotto has maintained a long and lasting friendship with this lava cave. Yet, abuse

has continued. To protect the cave and surrounding environment, the U.S.D.A. Forest Service built Apes Headquarters which provides information, lantern rentals, and plenty of opportunities for exploration.

New friendships with the lava cave are being formed daily. Will you be a friend of Ape Cave? Take a litter bag with you on your explorations. Keep your pets at home. Admire and do not remove the delicate cave features. Ask a Forest Interpreter at Apes Headquarters for an activities checklist and become a member of the new Mount St. Helens Apes. Come and explore in the spirit of the Reeses.

By Celese Brune  
Forest Interpreter



## TO THE SUMMIT—THEN AND NOW

In the colorful lore of one Klickitat Indian legend, Mount St. Helens was cast as a beautiful yet illusive Indian maiden clad in white. Though ranking but twelfth in height among the Cascade volcanoes, this once nearly symmetrical cone stood solitary and proud, perhaps the most ethereal of all the Cascade peaks. And so, too, for many years its graceful snow-covered silhouette beckoned to the adventurous spirit of many a climber. In pre-eruption days, from April through June of most years, eight to ten thousand mountaineers would drive to the picturesque shores of Spirit Lake, register for their climb, then trudge carefully up the northern slopes over snow bridge and glacier, bound for the summit. In 1980 that familiar tradition halted abruptly as the crumbling of the mountain's pristine beauty led to the forceful awakening of yet another legend—Mount St. Helens, the "mountain of fire."

As an active volcano, Mount St. Helens today attracts not only veteran climbers wishing to compare the old with the new, but hikers from across the nation and around the world. Since it was reopened to climbing in 1987, over 34,000 visitors have taken on the now popular southern summit approaches. The easy vehicular access and non-technical ascents have made spring through fall opportune times to step inside this natural living laboratory and experience the drama of a landscape in visible evolution.

By Renee Corso  
Climbing Coordinator

## The Good Cedar

The coffee is hot, and the air is sweet with the smell of fresh cut cedar. Sitting on the remains of the last cut of the morning, I begin to reflect on what this big cedar had lived through before my saw bit in and cut its way through the chronology of a lifetime.

In its infancy, this cedar may have had to struggle its way through alders and huckleberry, strengthening every day as the sap silently surged upwards bringing water from the roots to the crown, and sending "captured sunlight" flowing down from the needles.

Midway through its life, which I ended today, this cedar may have been stripped by Native Americans who bathed their children in an elixir obtained from the boiled roots of young firs growing nearby, before cradling them in the nourishing bark of the cedar.

It probably felt the muted wind from a northern flying squirrel gliding by and heard the somber song of the northern spotted owl. It may have seen a sister tree fall in a windstorm, and later watched its children grow from the slowly decaying remains, alongside delicate mushrooms.

Recently, it may have responded to the sound of laughing children wandering through the forest, or have cooled an overheated hiker.

I know that there are only a few areas left around here where the big trees can still be found (like Cedar Flats, Big Creek, and Quartz Creek). These are special places where I can be quiet in spirit and mind and watch the living forest around me.

By Ralph Naess  
Forest Interpreter

## A Journey Through Time

Once again I have followed the Harmony Falls trail to the shores of Spirit Lake, where I can step back in time or peer into the future. I drift off and imagine the mirrored image of a snowy white peak reflecting off Spirit Lake, and sheets of water gently cascading over Harmony Falls, plunging into a misty veil. Lush green trees carpet the hillsides. Towering firs, cedars and hemlocks grace the shores of the lake with their timeless beauty. Today, clouds of ash sting my face and I remember that on May 18, 1980 everything changed.

An enormous avalanche roared down the north face of the mountain and surged into Spirit Lake, sloshing huge waves up the surrounding hillsides. Trees were torn from the ground as the water rushed up slope and then pulled back down into the basin as the waves receded. A powerful lateral explosion ripped through the collapsing north flank, catapulting trees close to the mountain into Spirit Lake. Today these trees form a giant

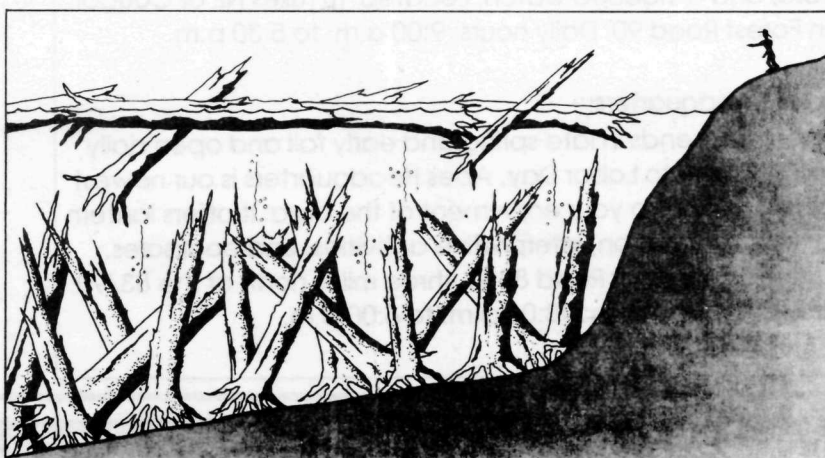
drifting log mat that can usually be found at the northern end of Spirit Lake near the Harmony Falls trail.

Since the eruption, many of these floating trees have become waterlogged, and have sunk beneath the surface of the lake. The roots of the drifting logs are like anchors that pull the logs down into upright positions as they sink. Sonar equipment has revealed that as many as 20,000 trees have settled upright on the lake bottom, forming

an underwater "forest." If further eruptions of Mount St. Helens were to cover these trees with debris, a petrified forest could form over time. It is possible that Yellowstone National Park's petrified forest was formed in a similar manner.

I smile with a sense of amazement as I think about how a forest is growing up on the slopes around me, while a log "forest" sinks down to the bottom of Spirit Lake. Natural wonders like this are what make Mount St. Helens such a special place.

By Todd Cullings  
Forest Interpreter





## Lookouts Into the Past

It's a long march to the top of the ridge, with the trail winding past huge fir trees and hidden rock outcrops. Suddenly you're rounding a bend and there, perched on spindly legs, a cabin rises above the tops of the tallest firs on the rocky crest of Coldwater Peak. Mount St. Helens, snow- and ice-covered, dominates the view. It's a clear summer morning, and there's no sign of smoke rising from the trees in any direction. Between cups of warm coffee and notations in the daily log book, the woman in the lookout watches diligently for signs of fire.



It's true that most forest lookouts are gone, remnants of a bygone era—yet that may be changing as forest managers look to the past for ways to keep future forests intact. Fifty years ago more than forty lookouts of various shapes and sizes were scattered across the Gifford Pinchot National Forest. Some were

simple shacks with a platform nailed to the roof, others were elaborate two- and three-story designs with separate quarters for sleeping, cooking, and watching for smoke. A few were elevated high on skinny legs of steel. All had sweeping views of the forested valleys and ridges. Eight of these observation sites once surrounded Mount St. Helens.

In the 1940s and 1950s many trails became roads; planes and helicopters equipped with infrared heat detectors could cover hundreds of square miles in a day. Two-way radios replaced the web of phone lines that once connected lookouts to field offices. Smoke jumpers and fire retardant bombs could be on the scene in moments. One by one the fire lookouts were abandoned and so, too, a way of life for some who sought the solitude of those isolated outposts far from the crowds.

As unlikely as it may seem in an age of satellites and computers, lookouts are being used again. Those that weren't destroyed for safety reasons or didn't simply decay, are being employed in the summer-long vigil of fire detection.

By Rich Ray  
Forest Interpreter

## PACIFIC NORTHWEST NATIONAL PARKS AND FORESTS ASSOCIATION

Pacific Northwest National Parks and Forests Association helps the USDA Forest Service and the National Park Service in the Pacific Northwest to provide interpretive services to you. At the Visitor Center, Pine Creek Visitor Information Station, and Apes Headquarters you will find not only friendly helpful faces but also informative and exciting natural history field guides, books about Mount St. Helens and the people who live here, as well as Smokey the Bear patches and t-shirts. Your continued support is welcome.

### YOUR SUPPORT IS APPRECIATED

The printing of the *Volcano Review* and *Monument Vicinity Map*, which are distributed free of charge, has been made possible through your donations to the *Pacific Northwest National Parks and Forests Association*, (PNNPFA). Donations are accepted at the Mount St. Helens Visitor Center, Pine Creek Information Station, and Woods Creek Information Station.

Tax-deductible memberships (Student \$3.00; Regular \$5.00-\$100.00) to the association are available at all PNNPFA outlets, entitling members to a 15 percent discount on merchandise at any branch. Ask any employee.

Subscription to the *Volcano Review* Newspaper:  
Mail completed form to: Mount St. Helens National Volcanic Monument Visitor Center  
3029 Spirit Lake Highway  
Castle Rock, WA 98611

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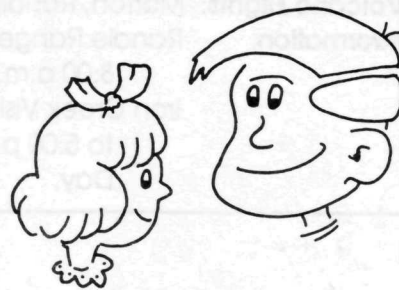
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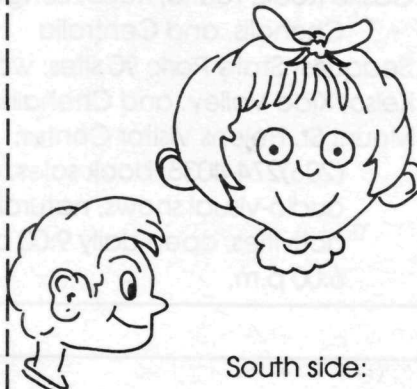
## ACTIVITIES CHECKLIST JUST FOR KIDS

Mount St. Helens is an exciting place to explore and to learn about volcanoes and how they affect our lives. Here is a checklist of activities to do while you visit the Monument:

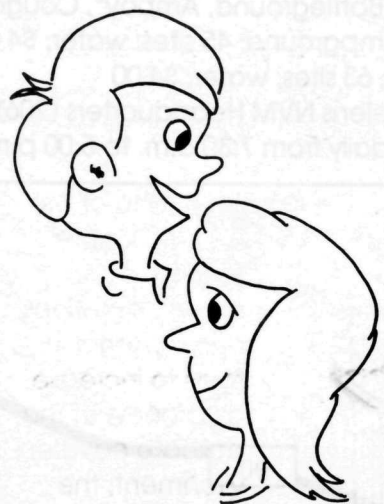
- At the Visitor Center:
- ☐ Enjoy the slide show or movie.
  - ☐ Walk through the volcano model.
  - ☐ Learn how geologists monitor the volcano by using the electronic distance-measurer.
  - ☐ Discover how many plants and animals survived the eruption on May 18, 1980.
  - ☐ Test your volcano skills at the computers.



- The 99 road corridor:
- ☐ Stop at Bear Meadow and learn what happened to Gary Rosenquist.
  - ☐ Take a walk to Meta Lake with an Interpreter or with your family.
  - ☐ Listen to the eruption story at Windy Ridge told by an Interpreter.
  - ☐ Examine a piece of pumice but leave it for others to enjoy.
  - ☐ Guess how many logs are in Spirit Lake.



- South side:
- ☐ Visit Ape Cave, the longest lava tube in the Americas.
  - ☐ Ask an Interpreter how the lava tube was formed.
  - ☐ Find out who discovered the lava tube.
  - ☐ Help keep Ape Cave clean; collect some litter.
  - ☐ Crawl through a tree mold at Trail of Two Forests.
  - ☐ Become a member of the Mount St. Helens Apes.
  - ☐ Explore the Lahar area and discover how it scoured the land.
  - ☐ Now draw a picture or write a poem about your visit to Mount St. Helens.



Take this completed checklist to a Forest Service Forest Interpreter, discuss your adventures, and receive a Smokey Bear souvenir.

## BECOME A FRIEND OF MOUNT ST. HELENS

For many, the earth seems frozen in time. Rarely are we granted a chance to see a mountain in the making. Friends of Mount St. Helens is a non-profit organization working together with local communities and the Forest Service to promote recreation, research, education, and tourism. We welcome you to join and support your local volcano.

YES, PLEASE ENROLL ME AS A CHARTER MEMBER OF  
FRIENDS OF MOUNT ST. HELENS

NAME _____	MEMBERSHIP CATEGORY
ADDRESS _____	<input type="checkbox"/> DOME BUILDER \$5,000
CITY, ST., ZIP _____	<input type="checkbox"/> CRATER CLUB 1,000
HOME PHONE (_____) _____	<input type="checkbox"/> LOOWIT CLUB 500
OCCUPATION _____	<input type="checkbox"/> VOLCANO PATRON 100
COMPANY _____	<input type="checkbox"/> VOLCANO SUPPORTER 50
WORK PHONE (_____) _____	<input type="checkbox"/> VOLCANO FRIEND 25
	<input type="checkbox"/> OTHER _____

Enclosed is my check made payable to FRIENDS OF MOUNT ST. HELENS, a non-profit organization in the amount of \$ \_\_\_\_\_.  
Mail to: FRIENDS OF MOUNT ST. HELENS, P.O. BOX 1287, CASTLE ROCK, WASHINGTON 98611.



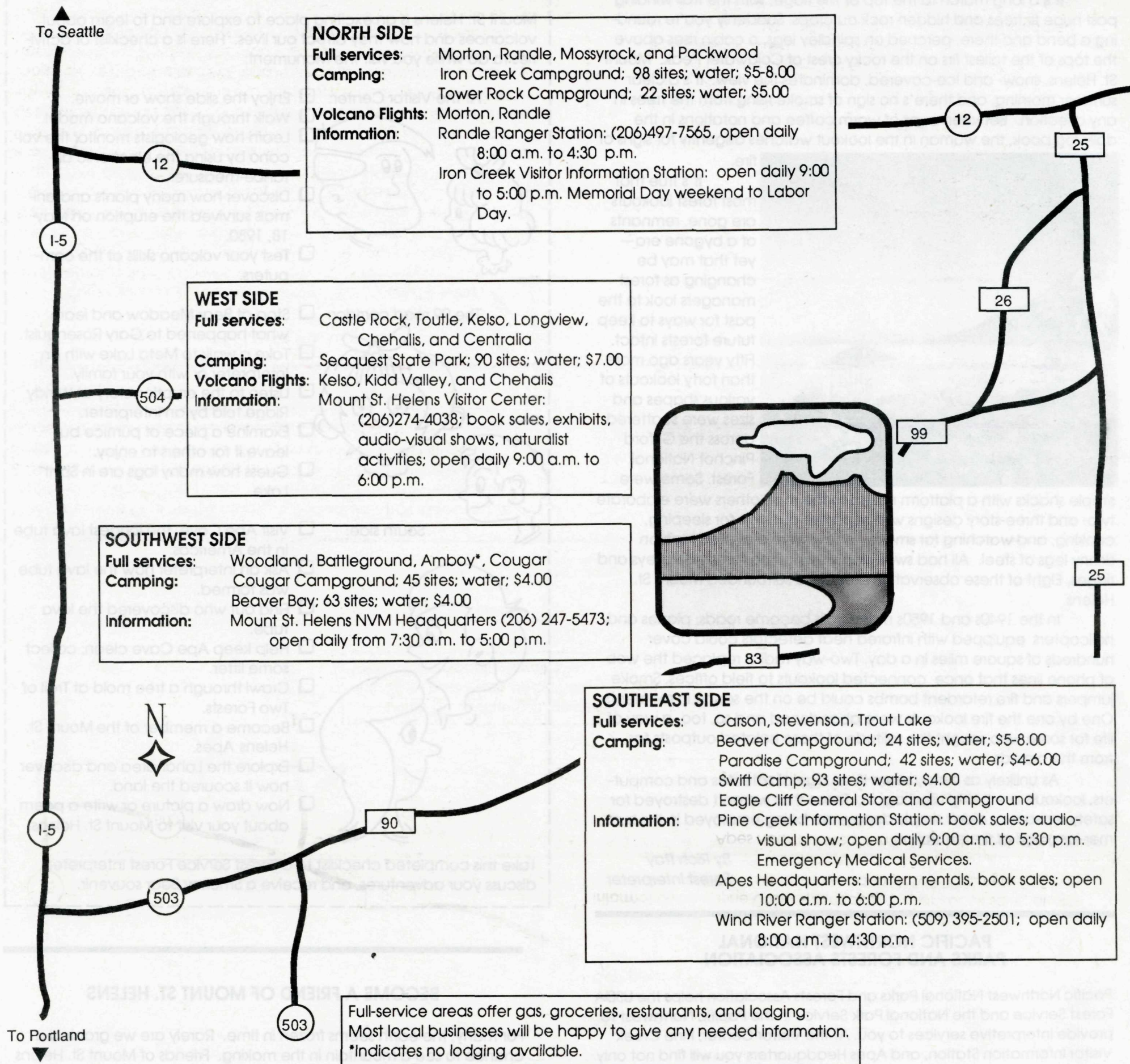
### Pumice, a Bugs Palace Love it and Leave it There

Pumice is a rock formed during the eruption of Mount St. Helens. It has many holes formed from gas released from the molten rock. These holes allow it to float. Pumice is a natural feature that provides shade for returning plants, so please ponder the pumice but don't take it from us!

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# VISITOR SERVICES



## TRAILS

Take a step into some of the most spectacular volcanic terrain in the world. Many miles of trails have been created or reconstructed to allow you to explore the effects of the May 18, 1980, and previous eruptions of Mount St. Helens. Blown-down forests and shattered stumps, surviving trees and a lava tube are just some of the features you can discover. Remember: Take only pictures; leave only footprints; kill nothing but time.

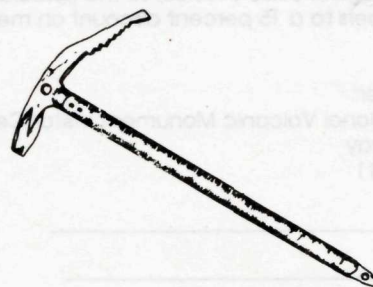
## ROADS

Eager young boys from the Portland YMCA used to visit Spirit Lake every summer. In the early 1900s it wasn't an easy trip. The trip from Portland to summer camp included a steamboat ride to Kelso, a train trip to Castle Rock, and finally a long wagon ride to the shores of Spirit Lake. Fortunately the roads have improved since then. The main route up to the mountain, Highway 504, was paved in 1921. The eruption of Mount St. Helens in 1980 and the ensuing mudflows covered some 35 miles of highway, limiting access to the mountain on the west side. Since then, many of the roads around the mountain have been widened and paved and new ones are being created to allow you to discover this exciting area. The reconstruction of Highway 504 should be completed by 1992, and you can look forward to easier access to the west side of the mountain. Until then, the popular viewing areas are on the east side via Forest Road 99. If travelling to these viewpoints from the south, expect some short delays on Forest Road 25. A drive to Lahar on Forest Road 83 will also include a short delay due to construction. **SAFE DRIVING!**

## CLIMBING

Climbing permits are required to hike above the 4800-foot level on Mount St. Helens. One hundred climbers are allowed per day, May 15 through November 1. Please call or write for more information:

Mount St. Helens  
 National Volcanic Monument  
 Route 1, Box 369  
 Amboy, Washington 98603  
 (206) 247-5800



## TRAVEL TIMES

Visitor Center to Windy Ridge Viewpoint: 2 1/2 hours.  
 Visitor Center to Ape Cave: 1 1/2 hours.  
 Visitor Center to Randle: 1 1/2 hours.  
 Woodland to Cougar: 45 minutes  
 Cougar to Pine Creek: 30 minutes.  
 Pine Creek to Windy Ridge: 1 1/2 hours.  
 Entire loop trip Visitor Center to Windy Ridge to Cougar to Visitor Center: 6 hours.  
 Please allow lots of time for exploration of this exciting place!