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# Scenic Byways



*A Design Guide for Roadside Improvements*



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## *A Design Guide for Roadside Improvements*

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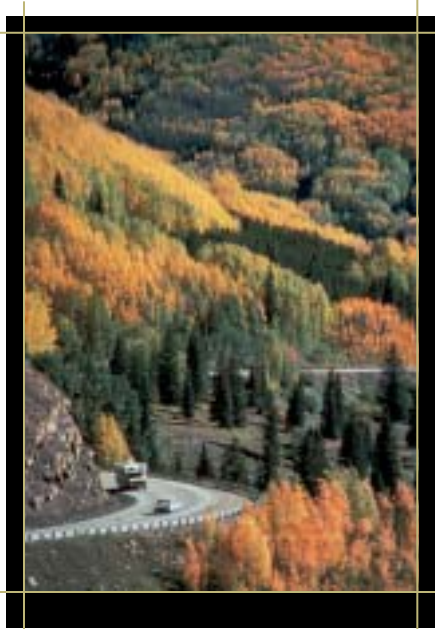
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## Purpose of This Design Guide



*R*oads are designated as scenic byways because of their unique, intrinsic qualities. By designation we invite the public to visit, experience, and appreciate these special places. But designating a road as a scenic byway is only one step in a continuing process to maintain and enhance these corridors and the quality of the experience for travelers.

Byway visitors need basic logistical information: where the route starts and ends, how long it takes to travel the route, what services and facilities exist, and precautions or restrictions along the route. They also want to know what makes this byway special. What are the unique natural features, the cultural history, and the stories of the people or events that shaped it? Providing this information and sharing these stories requires careful planning. Every addition or change to the byway impacts its character. Designing roadside improvements with this in mind can result in facilities that complement the byway.

The purpose of this design guide is to assist the planners, designers, and managers of scenic byways. It shows examples of improvements, outlines the planning process, and describes design principles. Although this book is focused on scenic byways that cross Federal lands, these principles may be applied to any byway throughout America.



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AMERICA'S BYWAYS





# Scenic Byway Programs

*The Outdoor Recreation Resources Review Commission was appointed in the early 1960s to study recreation in America. The Commission identified pleasure driving as the second most common recreational activity, second only to walking. Federal Highway Administration surveys showed that 23 percent of all vehicle trips and 30 percent of all miles driven are for recreational purposes such as taking vacations, pleasure driving, and other forms of recreation.*

*Responding to this finding, the Commission recommended that local and State governments create a network of scenic byways. Congress established an incentive program that would offer matching grants to local and State governments to encourage scenic byway designations. The Commission suggested that the grant incentive program be used to add informational signs and construct scenic vista and interpretive turnouts.*

## Scenic Byway Programs

Several concurrent programs have been established as a result of these recommendations. The USDA Forest Service established the National Forest Scenic Byways program in May 1988 after determining that scenic driving is the most popular form of outdoor recreation on national forests. The Bureau of Land Management established its program, Back Country Byways, in 1989.

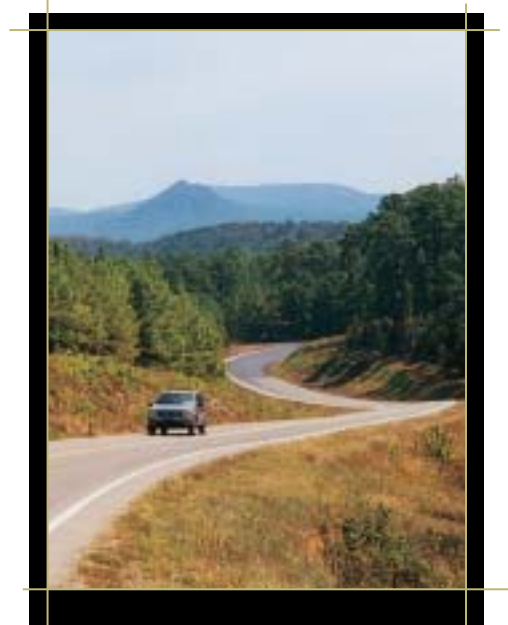
The National Park Service does not have a formal scenic byways program, but most park roads are managed as scenic routes, emphasizing scenic values, recreational features, wildlife viewing, cultural, and historical features. The National Park Service has a long tradition of providing scenic overlooks and interpretive services such as visitor centers and wayside exhibits. However, a number of roads within national parks have been designated as State and National Scenic Byways.

The Scenic Byways Study Act was passed by Congress in 1989, directing the Secretary of Transportation to “identify scenic and historic roads and to develop methods of designating, promoting, protecting, and enhancing roads as scenic and historic roads” (Senate Bill 432 1989). One

purpose of the act was to develop “recommendations for the establishment of a national scenic byways program, including recommended techniques for maintaining and enhancing the scenic, recreational, and historic qualities associated with each byway.”

Funding for an interim National Scenic Byway Program was incorporated into the Intermodal Surface Transportation and Efficiency Act (ISTEA) of 1991. The Federal Highway Administration used this funding to provide grants to States that have a scenic highway program in order to carry out eligible projects on roads designated as scenic byways by the State.

The ISTEA grant program led to scenic byway programs being established in most States. However, several States already had a long history of managing and developing scenic roads. Oregon began to develop roads that complement and preserve the beauty of its natural resources as early as 1913. Vermont had programs to preserve roadside beauty as early as 1937. Other States, such as California, Colorado, Maine, Minnesota, North Carolina, New York, Utah, and Washington have had scenic road programs prior to ISTEA passage.





## *The National Scenic Byways Program*

The National Scenic Byways Program was authorized in 1998 under the Transportation Equity Act for the 21st Century (TEA-21). Between 1992 and 2000, a total of \$136 million was provided for projects on scenic byways. About \$22 million are available annually through 2003 when the program will be considered for reauthorization. States and byways use the funds to develop and implement corridor management plans; construct scenic byway facilities (such as overlooks, interpretative centers, signs, and exhibits); develop interpretative brochures, maps, and information; and promote scenic byways.

The program is voluntary. States are not required to participate in the national program or establish a program of their own. The byways themselves are typically supported through a network of individuals who volunteer their time and effort. It is a grassroots-oriented program. Local citizens and communities create the vision for their byway, identify the resources comprising the intrinsic qualities, and form the theme or story about the byway that will stir the interest and imagination of visitors. Local citizens and communities decide how best to balance goals, strategies, and actions for promoting the byway and preserving its intrinsic qualities.

Under this program, the Secretary of Transportation may recognize roads for outstanding qualities by designating them as National Scenic Byways or All-American Roads. An All-American Road is considered a “destination unto itself,” because it provides such an exceptional traveling experience that travelers would make a drive along the highway a primary reason for their trip.

To be considered for All-American Road designation, a road must have two or more intrinsic qualities of national significance. To be considered for National Scenic Byways, a road must have at least one intrinsic quality of regional significance. National Scenic Byways and All-American Roads are recognized and promoted collectively as America’s Byways. Anyone may nominate a road for National Scenic Byway or All-American road status through the State’s identified scenic byway agency.



# Byway Planning



*Just like the visitors traveling your byway, it is important that byway planners know where they are going. Good planning is the foundation for maintaining and enhancing your byway's intrinsic qualities and for providing your visitors with quality experiences. Taking the initiative at the planning stage will ensure that the intrinsic qualities of your byway won't be lost.*

## *Planning for the Byway Experience*

Comprehensive planning sets the course for maintaining and enhancing those qualities that led to identifying the route as a scenic byway. Planning is also critical for managing additional use that may result from publicizing your road as a scenic byway and for improving the experience of those traveling the byway.

The Federal Highway Administration requires that a corridor management plan (CMP), or an existing plan that addresses the 14 points of a CMP, be submitted when applying for National Scenic Byway or All-American Road designation. Even if you do not intend to seek national designation, preparing a CMP and an interpretive plan are important steps in identifying the intrinsic qualities of your byway and targeting the experiences that you hope to provide visitors. These plans will also outline a strategy for achieving your goals and will provide a framework for integrating other planning efforts within the corridor to ensure the intrinsic qualities are protected.

*A map showing all potential projects along the byway is useful when the core team meets in the field.*  
*San Juan Skyway, CO*



*The planning team needs to include all interested parties, such as the local community, the Department of Transportation, tourism representatives, and agency personnel.*  
*White River National Forest, CO*

## *Corridor Management Planning*

A comprehensive corridor management plan is critical for identifying the intrinsic qualities of your scenic byway and guiding the management of resources to protect and enhance those qualities. This plan should be the primary tool to help you and your partners reach your goals. Corridor management plans also help communicate your vision to the community, potential partners, and others concerned with the experience that the byway provides.

When developing your corridor management plan, remember your neighbors! Many byways that cross Federal lands also include communities and private lands along the corridor or at the beginning. Generally, the actual road is managed and maintained by the State or county Department of Transportation. It is critical to include them in your planning and analysis.



## Federal Highway Administration Scenic Byway Requirements for Corridor Management Plans

### Identification of the Intrinsic Qualities

Corridor management plans submitted for national designation must address the 14 points of corridor management planning as published in the Federal Register in the May 1995 Interim Policy. Identifying the intrinsic qualities is the foundation of any corridor management plan. These qualities are the essence of the byway's unique appeal. This step is required when applying for designation as a National Scenic Byway or an All-American Road through the Federal Highway Administration (FHWA).

The development and implementation of corridor management plans should strive to maintain the intrinsic qualities of a byway while providing for the accommodation of increased tourism and the development of related amenities. A byway must represent at least one intrinsic quality that has regional significance to be considered for designation as a National Scenic Byway. To be considered for All-American Road status, the byway must represent at least two intrinsic qualities that are recognized nationally as being unique or the most outstanding examples of their kind. All intrinsic qualities are considered of equal importance.

## Fourteen Components for the Corridor Management Plan

Source: Federal Highway Administration

- 1) A map identifying the corridor boundaries and the location of intrinsic qualities and different land uses within the corridor.
- 2) An assessment of such intrinsic qualities and of their context.
- 3) A strategy for maintaining and enhancing those intrinsic qualities. The level of protection for different parts of a National Scenic Byway or All-American Road can vary, with the highest level of protection afforded those parts which most reflect their intrinsic values. All nationally recognized scenic byways should, however, be maintained with particularly high standards, not only for travelers' safety and comfort, but also for preserving the highest levels of visual integrity and attractiveness.
- 4) A schedule and a listing of all agency, group, and individual responsibilities in the implementation of the corridor management plan, and a description of enforcement and review mechanisms, including a schedule for the continuing review of how well those responsibilities are being met.
- 5) A strategy describing how existing development might be enhanced and new development might be accommodated while still preserving the intrinsic qualities of the corridor. This can be done through design review, and such land management techniques as zoning, easements, and economic incentives.
- 6) A plan to assure ongoing public participation in the implementation of corridor management objectives.
- 7) A general review of the road's or highway's safety and accident record to identify any correctable faults in highway design, maintenance, or operation.
- 8) A plan to accommodate commerce while maintaining a safe and efficient level of highway service, including convenient user facilities.
- 9) A demonstration that intrusions on the visitor experience have been minimized to the extent feasible, and a plan for making improvements to enhance that experience.
- 10) A demonstration of compliance with all existing local, State, and Federal laws on the control of outdoor advertising.
- 11) A signage plan that demonstrates how the State will insure and make the number and placement of signs more supportive of the visitor experience.
- 12) A narrative describing how the National Scenic Byway will be positioned for marketing.
- 13) A discussion of design standards relating to any proposed modification of the roadway. This discussion should include an evaluation of how the proposed changes may affect on the intrinsic qualities of the byway corridor.
- 14) A description of plans to interpret the significant resources of the scenic byway.

Red rock spires define Monument Valley.  
Kayenta-Monument Valley Scenic Road, AZ



Visitors can view one of the powerful forces of nature at Sahalie Falls.  
McKenzie Pass – Santiam Pass National Scenic Byway, OR



Even if you are not considering applying for National Scenic Byway designation, identifying the intrinsic qualities is still a critical step in successful corridor management planning. The intrinsic qualities that must be considered are:

### Scenic

The scenic quality is defined by the contribution of byway resources to the overall visual quality of the landscape. All elements of the landscape influence the scenic quality: landform, water, vegetation, and human-built developments. The scenic quality is based on the existence of significant scenic views from the road and the absence of features that detract from the overall image of the road. The byway's features must be representative, unique, irreplaceable, or distinctly characteristic of the area. A byway can represent an exceptional example of a common regional landscape.

**All byways should share three characteristics for this intrinsic quality:**

- Scenic features and views should be frequent enough to give a sense of continuity to the drive along the byway.
- Scenic features relate to each other, which will usually create a coherent image of the byway. The

way in which the roadway relates to its environment is also important to the sense of coherence.

■ A variety of viewing opportunities enhance the experience of a byway. Variety can also be a function of seasonal changes; some landscapes vary dramatically throughout the year.

Because the purpose of the National Scenic Byways Program is to recognize outstanding roads that have special attraction for travelers, most roads considered for designation will have scenic appeal. It is important to recognize that scenic quality is only one of the six intrinsic qualities.

### Natural

Natural quality is defined by features that are both visible and relatively undisturbed by human influence. The criteria for a roadway to have natural intrinsic qualities are the significance of the natural resources along the byway, the visibility of those resources from the byway, and the integrity of the resources in their original state (pre-European settlement).

These resources may include geological formations, fossils, landforms, water bodies, vegetation, and wildlife. The natural features should be unique, irreplaceable, or distinctly characteristic of the area. A byway can still be considered

*A glimpse of this local resident thrills visitors at Sabine National Wildlife Refuge.  
Creole Nature Trail, LA*



*The shores of Lake Ontario provide opportunities to view waterfowl.  
Seaway Trail, NY*

*This barn with its distinctive advertising painted on the side is a sentimental reminder of a bygone era.  
Monroe, MI*



*This railroad trestle shows the area's mining history.  
San Juan Skyway, CO*



*Remnants of this old farm give visitors an appreciation of past lifestyles.  
Blue Ridge Parkway, VA*

for natural qualities when there is substantial human alteration if the traveler's primary impression is of a landscape with great natural beauty.

### Historic

The historic quality of the byway depends on the connection between the road and the individual historic resources along the corridor. The byway must contain enough features to create a story with a certain level of continuity and coherence. The historic story should provide a link among resources along the byway and a means of interpreting these resources to the visitor. Although there may be a site with an individual structure having great historical significance, to be considered as having historic intrinsic quality, there must be more than a single site.

The historic elements should reflect the actions of people and may include buildings, settlement patterns, and other examples of human activity. Historic quality can be based on events, such as use of the road as a pony express route. The historical significance can demonstrate an evolving historical story that links diverse events through time. A road can also be historically significant because of its importance in developing a national or regional transportation network.

## Cultural

Cultural resources are derived from the distinctive communities that influence the byway character. Events, traditions, food, and music provide insight into the unique cultural qualities of the area. These cultural qualities are not necessarily expressed in the landscape. Culture encompasses all aspects of a community's life, and it may be difficult to decide what is necessary to define cultural resources as intrinsic qualities. The following are aspects to consider:

**Geography:** settlement patterns, climactic influences on building styles, place names, stories, and legends

**Economy:** occupations, products, training, yearly cycles, and land use patterns

**Community Life:** civic and religious buildings, institutions, festivals, customs, and rituals

**Domestic Life:** households, housing styles, foods, gender and age roles, and family traditions

**Artistic Genres:** folklore, music, customs, legends, dance, drama, games, music, art, architecture, crafts, dress, and costumes

## Archeological

Archeological quality involves those characteristics that are physical evidence of historic or prehistoric human life that are visible and can be inventoried and interpreted.

Archeological evidence can include ruins, artifacts, structural remains, and other physical evidence of early human activity. The archeological resources along the corridor must be both important and accessible:

- The resources must have scientific significance. They represent resources that cannot be commonly found throughout a region or in other places across the country.
- The physical evidence must be visible and capable of being inventoried and interpreted. Visitors must be able to experience and learn about the past through direct contact with the resources. If travelers are not able to see the evidence, the byway cannot be designated for its archeological quality, even if it has great scientific significance. If a site is visible, but extremely fragile and sensitive to disturbance, it may not be appropriate as a focus of the byway's story.

## Recreational

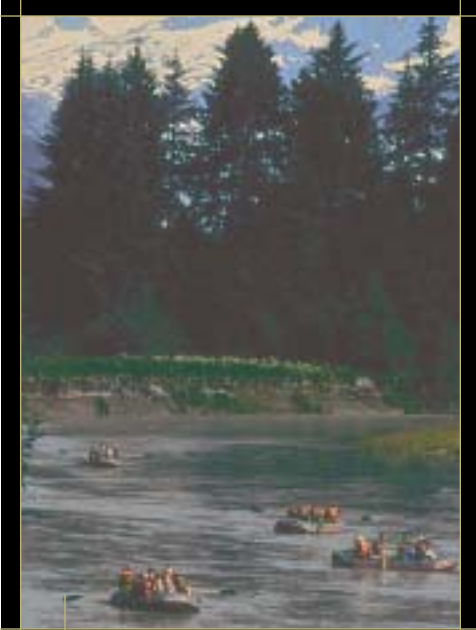
Recreational quality can encompass many types of outdoor activities that are dependent on the natural and cultural elements of the landscape. Recreation can include such pursuits as downhill skiing, rafting, boating, fishing, and hiking. Activities can also include passive pursuits such as driving for pleasure, wildlife viewing, attending cultural festivals, or quiet enjoyment of the corridor's

*This significant archeological site allows us to marvel at the accomplishments of an ancient civilization.*

**Mesa Verde National Park, CO**



*The rich culture of the area is seen in this long house.*  
**Southeast Alaska**



*Rafting is a popular summer recreational activity on the Mendenhall River.  
Tongass National Forest, AK*



*Biking is a popular recreational activity along scenic byways.  
San Juan National Forest, CO*

beauty. The determination of recreational quality will depend on three factors: the significance of the recreational resources, their visibility from the byway, and the relationships among the resources and between the resources and the road.

There should be a variety of recreational opportunities along the roadway that provide activities throughout the year for a wide range of ages and abilities. Recreational opportunities should exist in many places along the byway, not just in one concentrated location. The recreational resources should be related to each other and the byway so they support the overall theme or story of the byway.

#### **Intrinsic Qualities and Roadside Improvements**

Identifying and understanding your byway's intrinsic qualities is integral to planning roadside improvements. This assessment will help in determining design and interpretive themes and in choosing projects that complement the intrinsic qualities. As you will see in later sections, this information will be used to help choose designs and materials for your roadside improvements so that these elements complement the qualities of the byway. Your corridor management plan should also identify any existing elements that conflict with the qualities of the byway and outline possible opportunities for mitigation or restoration.

## Considerations for Your Corridor Management Plan

For your corridor management plan, you will gather and analyze much of the information needed for any Federal resource management plan. This information can be incorporated into required environmental planning and decision documents.

### The Purpose and Vision

Your purpose statement should identify what makes your byway special and what you intend to accomplish with your byway. The vision statement defines the desired outcome for your byway. This statement should seek to inspire, asking the question “What if?”

Having a strong purpose and vision aid in planning road improvements. If your purpose is to attract new visitors, adding amenities may be essential. If site protection is important, this will influence the design of facilities.

### Planning a Route

- Create a simple, easy-to-follow route.
- Avoid simply ending your byway at jurisdictional boundaries.
- Use your byway’s resources, route, name, and story to reinforce visitor expectations.

### Scoping and Issues

There are many issues to consider in a corridor management plan, including, but not limited to:

- Who is interested in the management and development of your route as a byway?
- Where are the management concerns along the corridor? Which uses complement the byway’s intrinsic qualities? Which uses conflict?
- How do people use the area?
- What are the current management goals in existing planning documents that must be followed? Will amendments be necessary to protect the intrinsic qualities or to accommodate planning projects?
- Who else is involved with the management of the byway, such as other agencies, State and local governments, regional planning teams, and transportation departments? Do your byway goals fit with their plans?
- What is the marketing emphasis given by local chambers of commerce, travel councils, and visitor bureaus?

It is important to build local support and a sense of ownership from the beginning. Seeking the involvement of other agencies and local communities builds ownership and increases the chances of success. It is also important to keep the public involved in your planning process. Public open houses are a good way to show what you have in mind and to solicit comments.



*The most successful byways are those with strong community partnerships.*  
**Arapaho-Roosevelt National Forest, CO**



*Selected sites should be able to accommodate all expected vehicle types.  
Highway 12 Scenic Byway, UT*

### Resource Inventory and Analysis

This phase begins with an inventory of the resources along your byway and the elements that define the intrinsic qualities. It should include a description of the natural resources: wildlife, soil, geologic features, scenic resources, hydrology, water quality, wetlands, vegetation, and air quality. The inventory should also include a profile of your visitors: who they are, where they come from, how they are using the byway, and what their expectations are. It is important to document the features that influence the visual environment of the byway, both positively and negatively.

### Characteristics of the Road

- Does the alignment and design of the road have historic or cultural significance?
- How many vehicles are traveling the byway?
- What types of vehicles use the byway (e.g., passenger vehicles, semitrailers, recreational vehicles, etc.)?
- What are the current traffic patterns?
- Where are the locations of known vehicular accidents? What is the frequency of accidents at these locations?
- Where are travelers stopping now? Why are they stopping at these locations?

### Natural Resources

Natural resources are an important component of your planning inventory. This includes all of the primary natural resources: scenic features; geologic features; hydrologic features such as lakes, streams, and wetlands; vegetation; wildlife and critical wildlife habitat; soils; air quality; topography; and minerals.

Plans for protection or use of these resources are important to consider. These can include proposed vegetation management, including timber harvest and prescribed fires or anticipated mineral development. Inventory current or future management prescriptions such as conservation strategies for critical wildlife or plant habitat. It also may be important to map the potential designation of an area as a wilderness area or other type of special protection. These inventories can assist in identifying intrinsic qualities, planning for byway developments, and providing a foundation for interpretive planning.

### Built Features

- What are the number and locations of restrooms, campgrounds, picnic areas, visitor centers, entry stations, portals, viewpoints, interpretive stops, trails, and trailheads? What is the condition of these facilities? Do they enhance or detract from the intrinsic qualities?
- Where are additional facilities needed? What is the relationship to existing facilities?
- Is there continuity in the visual theme of the facilities? Do they complement other regional architecture?



- Are there structures (such as buildings, bridges, power lines, pipelines, transmission or cell towers, or billboards) that enhance or detract from the scenic quality?

### Visitor Demographics and Use Patterns

- Where are people coming from? What are they doing when they arrive? Is there a peak season? How long do they stay?
- Which areas are being used even though they have little or no development? What are they being used for?
- Is the byway a destination for many travelers or primarily a scenic route to somewhere else?
- What are visitor's expectations?
- Where are visitors causing resource damage?
- Where are undesirable activities occurring?

For newly formed byways, a tourism promotion plan may be used to obtain information if this demographic information doesn't exist.

### Management Opportunities and Constraints

- What are the needs and requirements of the Government land agencies?
- What are the local zoning and sign ordinances?

### Local Communities

- What is the relationship between local residents and the byway?
- What are the communities' needs and wants?

## The Corridor Management Plan and Roadside Improvements

An analysis of the existing roadside improvements, including condition and usage, helps to determine future needs. Carefully look at how people are using your byway. Are there opportunities for the entire range of visitors? Have you remembered the oldest and youngest visitors and those with special needs? Questions such as these will help identify needed roadside improvements.

### Potential Site Suitability and Opportunities

Since projects will be proposed in your corridor management plan, the plan should analyze opportunities and the suitability for potential sites. It is useful to ask the following questions:

- Which locations provide opportunities for viewing the scenic or historic features? Are there overlooks or is there potential for vistas? Look for options at each potential site. For example, you may want visitors to feel the mist from a waterfall, walk along a stream, or trudge up a ridge to experience what pioneers felt.
- Are there opportunities for vegetation management, such as thinning and pruning or creating openings to provide views?
- Are there interpretive opportunities to help tell the byway's story?



*Communities celebrate their byway with signs at the community boundaries.  
Edge of the Wilderness Scenic Byway, MN*

- Is there sufficient space for planned structures, parking, and access? Each type of facility has physical requirements that must be met.
- Which areas need protection? Are they so fragile that development needs to be located elsewhere?
- What is the context of the potential site?
- Is the proposed roadside improvement appropriate?
- Are there opportunities for combining needed facilities, such as restrooms, interpretive exhibits, and parking, to provide convenience to the visitor or to reduce construction and maintenance costs? Is there sufficient space for parking and structures?
- Are proposed improvements really needed? Will they be needed in the future?
- Look at soil, drainage, water quality, and vegetation constraints. Are there sensitive wildlife or plant species that may be impacted?

### Signs

- Consider all existing signs, including wayfinding, site identification, interpretive, informational, and regulatory.
- Are signs functional so that visitors feel secure knowing they can navigate the byway?
- Are signs communicating needed information to visitors without detracting from the scenic quality of the byway?
- Are signs in good condition?
- Are sites adequately signed? Are signs placed so there is enough time to make the decision to stop?

- Can a non-English speaking traveler understand the sign? Are universal symbols used, or are there opportunities for multilingual signs?
- Does the design and/or condition of signs enhance or detract from the intrinsic qualities of your byway?

### Access and Use

Consider the access to your byway, roadside amenities, and recreation areas. Do not limit this to motorized access. Also consider opportunities for pedestrian, bicycle, or even equestrian use. Make a point to watch people and see how they are using the area.

- Where are visitors stopping? What are the features that are attracting them?
- Where are the problem areas? What can be done to improve the situation?
- Are there conflicts between different types of users, such as large trucks and passenger vehicles or bicycles and vehicles? Is there sufficient room for tour buses?
- What are the seasonal uses? Do uses change throughout the year? Are there changes within a single season (such as skiing and snowmobiling)? Are there opportunities or concerns for winter use?

## Facilities

Now that you have collected all your data, you need to integrate the stories you want to tell about your byway with your facility needs. Decide which activities you want to provide for and which you want to prevent or discourage. To help organize this information, map each site, label the type of activity, and color code each site by the following categories:

- Site provides visitors with the required facilities.
- Site is used by visitors, but does not provide adequate facilities.
- Site is used for undesirable activities.
- Site is the best place for desired activity, but facilities are inadequate or nonexistent.
- Potential site for desired activity, but facilities are inadequate or nonexistent.

Check the facility requirements for each site and determine if the site possesses the required area, access, and site conditions.

You should consult with a landscape architect and/or an engineer about the requirements for each site and facility. Sketch each facility element that needs to be included at the site and “walk through” how a visitor would most likely use the site. Make sure the site is universally accessible to ensure that everyone will be able to enjoy the experience together.

Now you have a map showing all the potential projects and individual site sketches describing how you want visitors to use the site and the necessary facilities. Consult with others on your team about potential site improvements. Show them your rough sketch of each site and a map showing the site conditions (area, slope, vegetation, etc.). Discuss how you want people to use the site and the facilities you think are necessary. Determine the feasibility of the project and develop a “ballpark” cost estimate.

This information will help you decide which sites are feasible, what funds are necessary to complete the project, project priorities, project timing, and who needs to be involved in the detailed planning and development.

## Other Considerations

It is important to consider the needs of your visitors.

- What services will they need to make their visit to your byway enjoyable?
- Where are gas, food, lodging, emergency services, and retail shops located? Can they support the anticipated changes in use resulting from the byway?
- Have you included the providers of these services in your planning effort?



*Too many signs may be a major visual blight as well as a source of confusion for the traveler.*

"My experience is that the groups of people who seek out interpretation... are wonderfully well-mannered and pathetically eager for guidance."

*Freeman Tilden,  
Interpreting Our Heritage*

## *Interpretive Planning*

The purpose of the National Scenic Byway Program is to ensure that Americans come to know and appreciate the Nation's superb scenic byway corridors and to protect and enhance these natural and cultural resources. Interpretive programs help increase the appreciation of a byway's intrinsic qualities. Signs, displays, brochures, voice recordings, and other interpretive media ensure greater opportunity for learning and enjoyment.

There are many reasons for having interpretive services along scenic byways. Interpretive services attract visitors, entice them to stay longer, give them a greater appreciation of the byway, and help meet management objectives. Your interpretive plan should identify the themes and topics you want to interpret and a strategy for encouraging visitor participation.

Traditionally, the primary media for scenic byway interpretation have been wayside exhibits (exhibits installed at pullouts adjacent to roads) and brochures. Interpretive programs provided by "interpretive staff" are generally confined to visitor centers and developed recreation sites, such as campgrounds.





Watching interpreters dressed in period costumes making traditional baskets creates a memorable experience for visitors.  
*Colonial Williamsburg, VA*



This tactile exhibit lets visitors feel the size of a grizzly bear's paw and compare it to their own hands.  
*Beartooth Scenic Byway, MT*



Visitors can push a button to hear the sounds of the battlefield and a description of events that occurred during the Revolutionary War.  
*Cow Pens National Battlefield, NC*

## Who Should be on the Planning Team?

There are a wide variety of skills that are needed to complete your corridor management plan. Be creative when assembling your team. Look beyond your agency resources to local and regional resources. Universities, local historical or archeological clubs, area schools, and State and local agencies can provide a wealth of information and assistance. You should consider including people with knowledge in the following areas:

- Interpretation (*interpretive and accessibility specialist*)
- Facility design (*architect, facility engineer, accessibility specialist*)
- Landscape and site design (*landscape architect*)
- Site engineering design (*civil engineer*)
- Transportation engineering design (*transportation or civil engineer*)
- Cartography (*cartographer, GIS specialist*)
- Cultural/historical resources (*archeologist, historian, anthropologist, local history club, museum curator*)
- Natural resources (*silviculturist, wildlife biologist, fisheries biologist, geologist, hydrologist, botanist*)
- Recreation resources (*recreation planner, landscape architect, marketing specialist, accessibility specialist*)
- Environmental laws and regulations (*NEPA coordinator*)
- Law enforcement skills (*Federal, State or local law enforcement officials*)
- Public involvement (*public affairs officer, marketing specialist, interpreter*)
- Tourism/rural community development (*public affairs officer, local chamber of commerce, State planning offices, university extension service*)
- Local/regional planning
- Partnerships (*conservation organization, county government, etc.*)

*In areas where a sign would detract from the scenery or when there is a great deal of information that needs to be provided, attractive printed material can be a useful tool. Many visitors collect these materials as a memento of their trip.*

**San Juan Skyway, CO**



The National Park Service has found that most visitors never receive personal, face-to-face interpretation services when traveling through the parks. For many visitors, roadside exhibits may be the most effective means of meeting interpretive objectives.

Carefully planning and designing exhibits is essential to communicating interpretive messages. Exhibits must be designed to attract visitors, hold their attention, and effectively communicate the message. Exhibits within the scenic byway corridor should enhance the quality of the byway experience while complementing the visual landscape and the context of the intrinsic qualities that are the essence of the byway.



*To integrate this amphitheater into the site, benches were placed around existing mature trees and large boulders to create an informal setting at Trillium Lake.*

**Mt. Hood National Forest, OR**

## Freeman Tilden's Principles of Interpretation

**Provoke** the attention or curiosity of your audience. Grab their interest quickly and keep it.

**Relate** your message to the everyday life of your audience. Why should it matter to them personally?

**Reveal** the essence of your subject through a unique viewpoint. Try a completely different way of looking at things.

**Address the Whole** by fitting your subject into the bigger picture. Show the logical significance of a particular object, story, or feature to the larger whole.

**Keep Your Message Unified** by using sufficient but varied repetition of cues to either create or build on a particular mood, theme, feeling, or atmosphere.

## The Interpretive Plan

Whether the plan is one page or a hundred pages, it must be clear and useful. It should answer six basic questions: **Who? What? When? Where? Why? and How?**

**Who** is the audience? Who do you want to attract to your byway? Consider the varying levels of interest, time, and knowledge of your visitors. Plan for a range of interpretive opportunities. Make sure you identify ways in which alternative media will be used to provide a universally accessible interpretive experience. This includes considering those with mobility, visual, learning, and hearing impairments; children; the aging population; and visitors speaking a foreign language. Remember that different people respond to different learning opportunities. Consider interpretation that offers audio exhibits and tours, living history, hands-on experiences, demonstrations, three-dimensional signs, and interactive exhibits. First time visitors may want to hit your byway's highlights, stopping only at the visitor center and a few waysides. For repeat visitors, consider brochure tours, guides, and booklets to reveal lesser known areas or features. Are there opportunities for children to get out and explore? How can sites and program opportunities be designed to be universally accessible? Can benches be incorporated so that visitors can sit and enjoy the view?

**What** unique resources, features, or history along your byway do you want people to understand? What are the sensitive or fragile areas? What areas are already attracting people? What do people want to know?

**When** is the major season(s) of use? Also consider usage patterns, such as the time of day or week when the most use occurs.

**Where** is the best place to take visitors to tell the story? Consider the logistics such as topography, climate, and traffic.

**Why** do you want to interpret? Why would people be interested?

**How** will you get your message across? What interpretive media and location will most effectively convey your message?

## Interpretive Rules of Thumb

### Don't tell everything.

*Don't try to tell all. Keep the wording simple. Tell less, but tell it well. Leave something for visitors to discover for themselves.*

### Be the visitor.

*As a visitor, what are your expectations?  
How much time and interest do you have?  
How much energy will it take to understand the message? What value does it have for you?*

### Be careful of agency propaganda.

*Visitors are most interested in natural and cultural features seen from the site. Some management messages can be woven sensitively into the interpretive message if they have relevance to the site.*

### Don't interpret "Near Heres".

*Stick to features that can be seen from the interpretive site.*

### Get the detail.

*Refine the topics and themes until you develop a level of detail that will be meaningful to your audience. Make sure there's a story, and relate details of the story.*

### Use a hook.

*You have only a few seconds to catch a visitors' attention. Interpretation has no value if no one participates. Titles, graphics, illustrations, location, and presentation all contribute to visitors making the decision to read your sign or brochure.*

*Actual artifacts incorporated into an interpretive exhibit can enhance the experience for visitors.*  
**Yoho National Park, BC, Canada**



*If staffing permits, interpretive talks are a great way to get visitors interested in your byway stories, as seen here at Chimney Rock Archaeological Area.*  
**San Juan National Forest, CO**

## Choosing Topics and Themes

Interpretation should be based on unifying themes. One approach is to identify unique and special features that define the essence of your byway. Then topics and themes are developed based on these features. Another approach is to first identify desired visitor experiences and use these objectives to choose interpretive topics and themes. The inventory of available sites is then analyzed to identify sites that best meet the objectives. The content of the interpretive program is designed so that visitors can receive a unified story that contributes to their understanding of the area.

There are many things to consider when choosing interpretive themes. What is important about your byway? Why has it been designated a scenic byway? Choose themes that reveal the meaning of the area. An inventory of resources, a list of goals and objectives, and an audience analysis will help you document the topics and themes. This is one of the most important steps in the planning process, since it identifies what you are going to say.

The topic is simply the subject matter. The theme is the central message or key idea about the topic. Themes are stated in short, simple, and complete sentences that serve as the basis for organizing the interpretive message. Use themes to unify interpretation along your byway. If the interpretation is successful, the audience should be able to summarize the theme into one or two sentences.

If your byway is long and complex, several themes may be appropriate. It may be helpful to break the byway into zones of similar geology, vegetation, etc. Keep in mind the visitor's ability to absorb and remember what was learned. If visitors could remember only two things after visiting your byway, what do you want them to be?

## Improving the Effectiveness of your Interpretive Plan

While planning the topics and themes for your byway, think about ways to let people know what interpretive services you are offering. Will wayside exhibit locations be included on your byway map? Is there a sign or other means to let travelers know that there is a brochure or audio tour? What kind of orientation will you provide for visitor center personnel and staff at



travel information outlets? This information is essential for integrating all of your interpretive services.

Consider a range of interpretive opportunities. Drive your byway and see where people are stopping. How often do you think you would be willing to stop? Remember when planning for wayside exhibits that most travelers probably will not stop at every site and that they travel in both directions. Topics, themes, and stories should complement one another; however, the interpretive message should not rely on people stopping at every site or in a specific sequence to develop an understanding.

Provide opportunities for people to explore the region on return visits. This may include providing brochures, books, guided hikes, or interpretive talks for more in-depth information. Look for opportunities to encourage people to leave their cars and explore and enjoy the area.

### Interpretive Media Selection

Once an interpretive plan has been completed and approved, the next step is to select the media to interpret your stories. Interpretive signs, brochures, artifacts, 3-D models, site designs, guidebooks, auto tours on CDs and tapes, radio broadcasts, and interactive touch screens are some of the most popular unstaffed interpretive media.

There are advantages and disadvantages with each of these. Choose the best media to meet your specific needs.

It is important to consider your audience, remoteness, level of maintenance, cost efficiency, number of users, and history of vandalism. Be careful not to overload the visitor with messages. Carefully crafted, concise messages that are presented in unusual and interesting ways will be most effective.

### Evaluation

A final component of an effective interpretive plan is evaluation. One method is front-end evaluation, which tests messages on sample audiences before final construction of exhibits. Another method is post-evaluation, which tests the effectiveness of interpretation after it is in use. Periodically review and revise interpretive messages as necessary.

## When to Use an Interpretive Sign

- *When it is the best medium to tell a story*
- *When there are features, history, sights, smells, or sounds that need explanation*
- *When visitors have questions that would otherwise go unanswered*
- *When there is something interesting at the site that visitors would probably miss if not interpreted*
- *When there are enough visitors to justify the expense*
- *When it does not detract from the site*
- *When it does not introduce visitors onto a site that is too sensitive for public use*
- *When it is a safe and convenient location for people to stop*

## Byway Planning Resources

***America's Byways.***

(Online. August 2001). U.S. Department of Transportation, Federal Highway Administration. Available: [www.byways.org](http://www.byways.org).

***Byway Beginnings: Understanding, Inventorying, and Evaluating a Byway's Intrinsic Qualities.***

Federal Highway Administration. 1998.

***Community Guide to Planning and Managing a Scenic Byway.***

U.S. Department of Transportation, Federal Highway Administration. 1997.

***Interpreting Our Heritage.***

Freeman Tilden. The University of North Carolina Press, Chapel Hill, NC. 1967.

***Interpretive Masterplanning for Parks, Historic Sites, Forests, Zoos and Related Tourism Sites for Self-Guided Interpretive Services, for Interpretive Exhibits, for Guided Programs-Tours.***

John A. Veverka. Falcon Press. January 1994.

***Interpretive Planning Handbook.***

Michael Paskowsky. U.S. Department of the Interior, National Park Service, Harpers Ferry Center. 1983.

***Interpretive Project Guidebook: A Region 6 Interpretive Services Aid.***

Curtis Edwards. USDA Forest Service, Pacific Northwest Region. Portland, OR. July 1994.

***O, Say, Can You See: A Visual Awareness Tool Kit for Communities.***

Scenic America. Washington, DC. 1996.

***Visual Preferences and Scenic Byway Interpretive Design and Planning in Logan Canyon.***

Nancy A. Brunswick. Utah State University, Department of Landscape Architecture, Logan, UT. 1995.

***Site Planning.*** Kevin Lynch and Gary Hack. The MIT Press, Cambridge, MA. 1984.

***Tool Kit for Scenic Byway Leaders.*** American Recreation Coalition, Washington, DC. September/October 1998.

***Views From the Road: A Community Guide for Assessing Rural Historic Landscapes.***

David H. Capps. Trust for Public Land and National Trust for Historic Preservation. Island Press, Washington, DC. 1995.



# *Design Considerations*

*The design of all constructed elements must be appropriate to its particular byway and its context within the landscape, the community, and its history. It must take into account expectations and behavior of its visitors, maintenance requirements, stewardship responsibilities of the local community, the economy of the area, safety of the visitors, and the preservation of the unique intrinsic qualities of the byway.*



## *Byway Design Considerations*

Planners and designers are faced with creating a unique, recognizable byway image while sensitively integrating facilities into the surrounding landscape and local community. They have a responsibility for choosing materials and construction methods that will result in longevity and minimize resource consumption. They must also design the byway to safely accommodate a variety of visitors with differing needs and interests who experience the byway through a variety of modes of transportation.

Planning and designing scenic byway roadside improvements involves a careful analysis of visitor needs and potential use patterns, resource access and protection, facility operation and maintenance requirements, aesthetics, the appropriateness of built features, and the economic impact to the local community. The corridor management plan (CMP) and interpretive plan set the foundation for the types and locations of roadside improvements. In the design phase, the specifics of site design and materials are determined as they relate to the goals of the CMP. Careful integration of the goals and objectives will greatly enhance the visitor's experience of the byway.

*Native stone buildings with steeply pitched roofs and bridges with arches are some of the elements that give this byway its unique identity.*

*Historic Columbia River Highway, OR*



## Identity

Identity can be characterized as the image or theme that captures the character or personality of the byway. Logos, colors, materials, signs, architectural character, and graphic style are all elements of a byway's identity. Each element conveys a unique feeling that adds to how visitors perceive and remember your byway. A clear identity also makes it easier for visitors to quickly recognize that they are on the byway and to find their way.



*A comprehensive system of signs along the route can unify facilities of various agencies and makes it easy for travelers to navigate the byway. This signage system uses the curved arch from historic structures and colors that blend with the surrounding landscape.*

*Historic Columbia River Highway, OR*

*The repeated arch, curvilinear forms, and use of native stone are primary design elements along this byway.*

*Historic Columbia River Highway, OR*



The new center has been designed to incorporate the architectural style of the historic buildings.  
*Bryce Canyon National Park, UT*



The architectural style that emphasizes the use of rock.  
*Bryce Canyon National Park, UT*



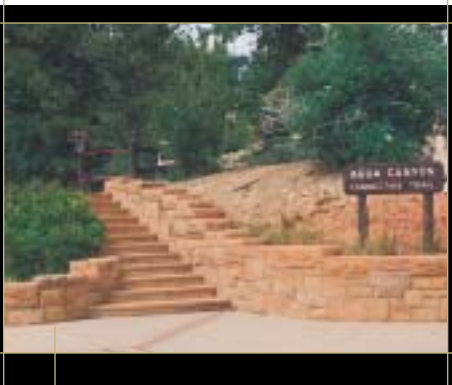
Mabry Mill is one of the historic wood and stone structures that contribute to this byway's character.  
*Blue Ridge Parkway, VA*



A variety of arched stone bridges constructed of native stone help create a strong identity.  
*Blue Ridge Parkway, VA*

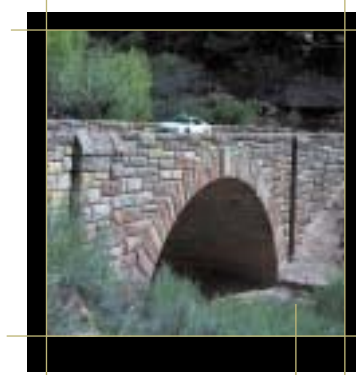


Weathered split-rail fences, a common regional feature, appear along many sections of this byway.  
*Blue Ridge Parkway, VA*



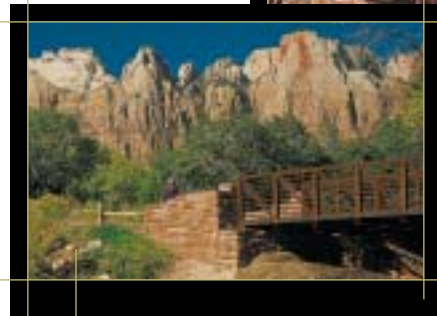
Rock walls and pilasters reflect the character of the historic stone work on the buildings.  
*Bryce Canyon National Park, UT*

The use of the red sandstone in the design and construction of this kiosk in the 1930s by the Civilian Conservation Corps has set a standard for other facilities.  
*Zion National Park, UT*



Because of the attention to detail in design and materials, newly constructed facilities blend seamlessly with historic structures.  
*Zion National Park, UT*

This recent (1999) construction of a bus shuttle station repeats the use of the red sandstone.  
*Zion National Park, UT*



The design of this bridge abutment uses the red sandstone mortared wall.  
*Zion National Park, UT*

## Consistency

The byway's identity should be apparent throughout the entire byway, even when it encompasses a variety of elements and environments. It may be necessary to vary some of the elements so that each facility fits its purpose and location. These elements, however, should retain some characteristics of the byway's overall identity:

- Use the same logo but another color
- Use a different sign base but keep the same sign design
- Graphic elements need to be consistent, such as type style, artistic approach, and color pallet
- On buildings, use the same materials, but possibly change colors to blend into the surrounding environment

Repeating elements of the byway's image gives everything a more unified and organized appearance, lets visitors focus on the information being presented, and creates a more memorable experience.



To retain an overall identity for this byway that runs through three states, the logo shape and illustration style were kept the same, while the interior illustration was changed to differentiate the States.  
*Pacific Coast Scenic Byway, CA, OR, WA*



## Regional Character

One of the main reasons people travel scenic byways is to experience the unique character of a particular area. Byways highlight the special physical and cultural aspects of a region and should seek to protect these assets by resisting the homogenous development that can make one part of the country look like another.

Look for regional character in the landscape forms and traditional architecture along your byway. They can be used when designing facilities to perpetuate the unique character of the region. Motorists on scenic byways are seeking something novel and “real” and want to learn about the uniqueness of your particular area.

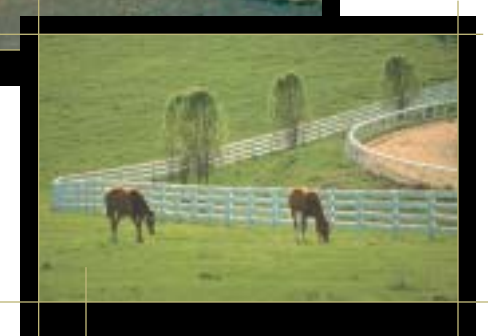
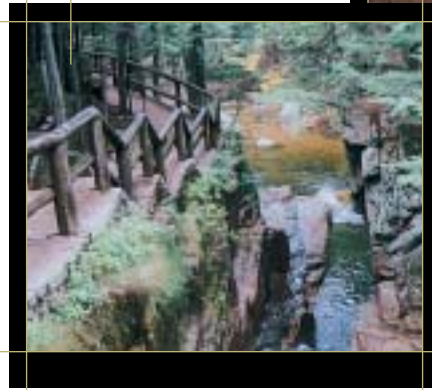
The log railings blend with nearby trees and the trail closely follows the terrain so that visitors feel connected to the site at Sabbaday Falls.

*Kancamagus Scenic Byway, NH*



The stone wall at this overlook melds into the rock outcrop.

*Highway 12 Scenic Byway, UT*



Rolling grass-covered hills and white fences are typical of Kentucky horse country.

*Lexington, KY*



The use of limestone in this overlook is common in this part of the country and complements the surrounding landscape.

*Hawk's Nest State Park, WV*



The stepped pattern and color in the hills are reflected in the color and brick pattern of this restroom.

*Jemez Mountain Trail, NM*

Cascadian log architecture, originally constructed by the Civilian Conservation Corps in the 1930s, has remained the signature of Northwest forests, as seen in this newly constructed kiosk at Sahalie Falls.  
*McKenzie Pass-Santiam Pass National Scenic Byway, OR*



The arched forms on this historic bridge near Latorelle Falls are repeated in the design of signage, walls, and other roadside improvements.  
*Historic Columbia River Highway, OR*



This newly constructed stone wall was patterned after the original wall built from 1912 to 1915.  
*Historic Columbia River Highway, OR*



This shelter borrows stonework and timber elements from pioneer mining communities. Colors are borrowed from nearby Aspen bark and rock outcrops seen on Skyline Drive.  
*The Energy Loop: Huntington & Eccles Canyons Scenic Byways, UT*



Matching the colors of the red rock on this picnic structure emulates the regional character of the area.  
*Kane Springs Rest Area, UT*

## Architectural Theme

The architecture of facilities and structures along the route should reinforce the identity of the byway. Visitors should recognize that a structure is part of the byway without having to read the sign. The style need not be unusual to be effective and noticeable. It may be more desirable to use the local architectural theme to blend in and complement other structures.

Structures do not need to be exactly the same to present a consistent image. In fact, some variation will add interest and allow each structure to fit in its surroundings. Repetition of design elements, such as roof pitches, colors, materials, column treatments, window details, etc., will tie the structures together.



Use of native rock and concrete is combined to provide a highly attractive bridge.  
*George Washington Memorial Parkway, Washington, DC*



Limestone has been used extensively in buildings of this area.  
*Lexington, KY*

Steep roofs, cedar shakes, and native basalt are characteristic elements in forested areas of the Northwest.  
*Volcanic Legacy Scenic Byway, OR*



Wooden frame structures on piers were originally built to provide easy boat access.  
*Leland, MI*



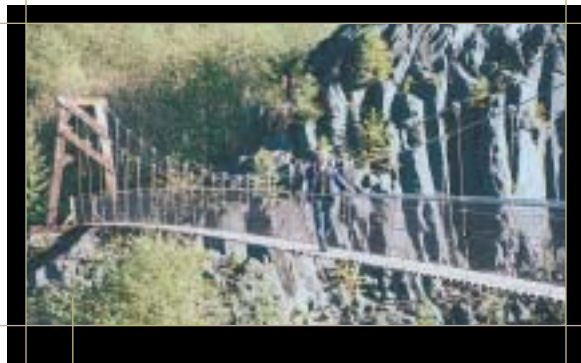
Unique design using logs and mortar wall presents an appealing wayside exhibit.  
*Yoho National Park, BC, Canada*

This double-arched bridge is one of many stone bridges that contribute to this byway's character.  
*Blue Ridge Parkway, VA*

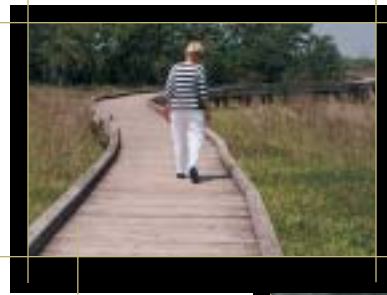
## Safety

All facilities must provide for the safety of motorists and pedestrians. Structures should not be placed so close to the road that they become a hazard to vehicles that unintentionally leave the roadway. Designers should keep in mind that visitors may not be aware of conditions that locals are aware of. Remember that people with special physical needs may have different safety requirements.

Care should be taken not to overdesign, since that can compromise the natural beauty and interest of a site. Some of the excitement of experiencing a site comes from its perceived danger, and if possible, that excitement should be retained while providing safety.



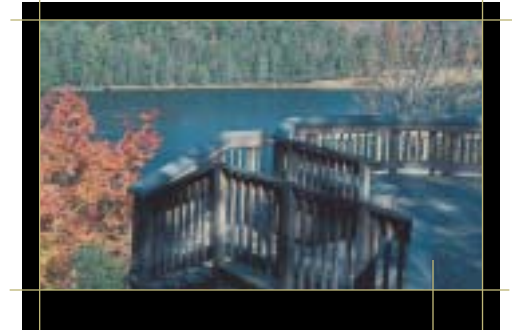
*This suspension bridge gently sways as visitors cross it, increasing their experience while providing safe passage over the deep ravine and river below.*  
**Gifford Pinchot National Forest, WA**



*To preserve the feeling of being on the edge, this wire mesh fence at Mount St. Helens National Volcanic Monument provides safety while allowing visitors to feel the excitement of the steep drop-off.*  
**Spirit Lake Memorial Highway, WA**

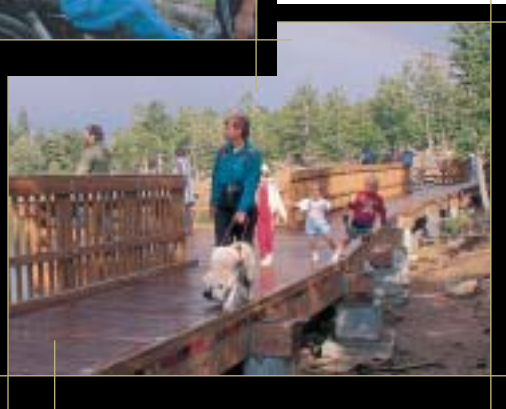


*Only a four-inch curb is necessary on this flat boardwalk over a wet meadow at Sabine National Wildlife Refuge.*  
**Creole Nature Trail, LA**



*This elevated observation deck gives visitors a spectacular view, and the vertical rails are more difficult for "little feet" to climb. Because of the stepped platform design, the upper rail can be lowered, improving visibility for children and visitors in wheelchairs.*  
**River Road Scenic Byway, MI**

*This sign is positioned to be easily accessible.  
A tactile element helps communicate the interpretive message.  
San Juan National Forest, CO*



*Trail surfaces, guardrails, and curbs are important design considerations for people along trails with sight disabilities.  
Arapaho-Roosevelt National Forest, CO*



*This accessible trail at Mendenhall Glacier allows the entire family to enjoy an activity together.  
Tongass National Forest, AK*

## Accessibility

Facilities along a byway should be designed so all visitors have the same opportunity to enjoy the features and experiences the byway has to offer. This includes planning and designing facilities while keeping in mind people who have visual, hearing, learning, and mobility impairments. Federal law mandates that all programs and facilities on Federal land comply with Federal accessibility standards. The most current accessibility standards are available through the U.S. Architectural and Transportation Barriers Compliance Board, also known as the Access Board.



*Accessible spotting scopes, like this one at Mount St. Helens Visitor Center, also work well for children.  
Spirit Lake Memorial Highway, WA*

## Principles of Universal Design

Source: Center for Universal Design

### Equitable Use

*The design is useful and marketable to people with diverse abilities.*

### Flexibility in Use

*The design accommodates a wide range of individual preferences and abilities.*

### Simple and Intuitive Use

*Directions for using the facility are easy to understand, regardless of the user's experience, knowledge, language skills, or concentration level.*

### Perceptible Information

*The design communicates necessary information effectively to the user, regardless of ambient conditions or the user's sensory abilities.*

### Tolerance for Error

*The design minimizes hazards and the adverse consequences of accidental or unintended actions.*

### Low Physical Effort

*The design can be used efficiently and comfortably and with a minimum amount of fatigue.*

### Size and Space for Approach and Use

*Appropriate size and space is provided for the approach, reach, manipulation, and use, regardless of user's body size, posture, or mobility.*

## Sustainable Design

*Water flows from this parking lot at the Oregon Museum of Science and Industry into bioswales located between parking rows where native plants remove contaminants.*  
Portland, OR



*Solar panels and native stone on this composting toilet contribute to an attractive and well-functioning restroom at Chimney Rock Archaeological Area.*  
San Juan National Forest, CO

Materials and construction methods for buildings and other roadside improvements should be chosen for longevity and minimal resource consumption. Natural ventilation, passive solar heating, and solar panels should be considered as means of reducing energy consumption. The location and orientation of the facility, as well as the landscaping that surrounds it, can also contribute to reduced energy consumption. Both daily operation and long-term maintenance requirements should be considered in the design.

Many States require that roads and parking areas be graded and surrounding areas be planted to minimize erosion. Floodwater detention structures and features that remove road contaminants, such as bioswales and biofiltration ponds, may also be required. Visitors can be informed of the benefits of these features through interpretation.

Many Federal agencies are required to plant only native vegetation. Native plants are adapted to their native climate and conditions, thus reducing the need for watering and fertilizing. The use of native plants also reinforces the regional character.

## Checklist for Sustainable Design

Source: Environmental Building News

### Design

- Optimize the use of interior building spaces.
- Design an energy-efficient building, with high-efficiency lights and heating and cooling equipment.
- Design buildings to use renewable energy, such as passive solar, daylighting, and natural cooling.
- Optimize material use to avoid waste.
- Design water-efficient, low-maintenance landscaping using native plants.
- Make it easy for visitors and staff to recycle waste.
- Look into the feasibility of graywater.
- Design for durability through material choices and timeless design.
- Design for future reuse and adaptability.
- Avoid potential health hazards, such as radon, mold, and pesticides.

### Siting

- Renovate older buildings.
- Take advantage of site resources, such as solar access, soils, vegetation, water resources, important natural areas, etc.
- Locate facilities to minimize environmental impact by avoiding sensitive areas and preserving open space.
- Provide responsible on-site water management to reduce runoff.
- Situate buildings to benefit from existing vegetation, such as wind breaks or cooling from shade.

### Materials

- Avoid ozone-depleting chemicals in mechanical equipment and insulation.
- Use durable products and materials.
- Choose low-maintenance building materials.
- Buy locally produced building materials.
- Use building products made from recycled materials.
- Use salvaged building materials when possible.
- Avoid materials that will release pollutants, such as some solvent-based finishes, adhesives, particle board, and carpeting.

## Appropriate Level of Development

The context of the site, visitor use, and visitor expectations determine the level of appropriate development. Remote sites may not require many amenities. In fact, the added amenities could detract from the experience because they interfere with the solitude and level of naturalness that the visitor is seeking. As the number of visitors or the site's proximity to a populated area increases, more site amenities are expected and needed. These added amenities could include lighting, flush toilets, water fountains, pay phones, vending machines, dog walks, etc.



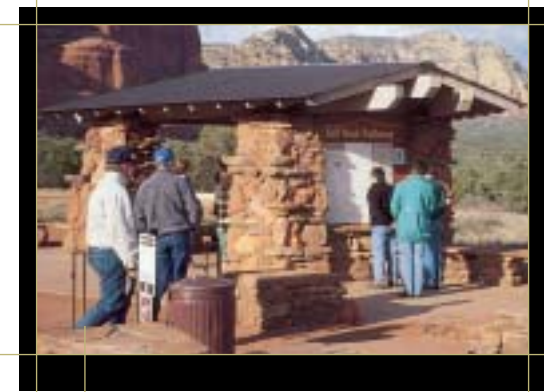
*Sometimes all that is needed is basic information provided by a simple rustic sign.*  
**Grand Teton National Park, WY**



*To accommodate a large number of visitors, a larger facility with more amenities is necessary, such as Mount St. Helens Visitor Center.*  
**Spirit Lake Memorial Highway, WA**



*Visitor facilities for a byway can be located in the heart of a neighboring community and promote the many features an area has to offer, such as this Convention and Visitors Bureau building in Lake Charles.*  
**Creole Nature Trail, LA**



*The rustic character of this kiosk blends with the natural features of this area, yet functions effectively in an urban interface.*  
**Sedona-Oak Creek Canyon Scenic Road, AZ**

## Design Considerations Resources

***Environmental Building News.***

Brattleboro, VT. 1998. [www.buildinggreen.com](http://www.buildinggreen.com).

***Guidelines for Selecting An Odor-Free Toilet.***

Briar Cook and Brenda Land. USDA Forest Service,  
San Dimas Technology and Development Center, San Dimas, CA. August 1996.

***Guiding Principles of Sustainable Design.***

U.S. Department of the Interior, National Park Service, Denver Service Center. September 1993.

***Interpretive Project Guidebook: A Region 6 Interpretive Services Aid.***

Curtis Edwards. USDA Forest Service, Pacific Northwest Region. Portland, OR. July 1994.

***National Scenic Byway Study: Creative Landscape Design Solutions in Scenic Byways.***

U.S. Department of Transportation, Federal Highway Administration. September 1990.

***Saving Historic Roads: Design and Policy Guidelines.***

Paul Daniel Marriot. John Wiley and Sons, Inc., New York, NY. 1998.

***Visual Quality of Built Environments in National Parks.***

U.S. Department of the Interior, National Park Service, D-903. October 1993.

***Uniform Federal Accessibility Standards.***

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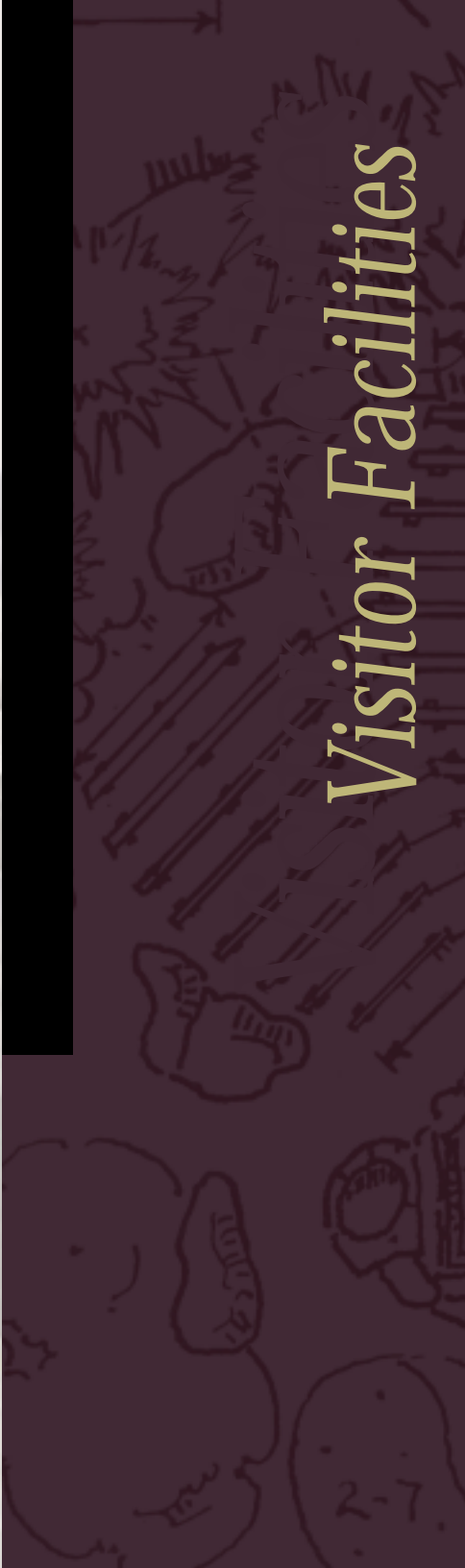
***Universal Access to Outdoor Recreation: A Design Guide.***

PLAE, Inc., Berkeley, CA. 1993.





# Visitor Facilities



*Visitor facilities constructed along your scenic byway will leave lasting impressions with those traveling along it. Good planning and design will complement the intrinsic qualities of the byway and ensure that the impressions visitors take away are positive.*

## *Designing Byway Visitor Facilities*

Now that you have a corridor management plan, an interpretive plan, and have developed your byway's visual identity, you are ready to start planning and designing visitor facilities! Before you head to the field with a hammer and nails, enlist the help of a qualified design team to design facilities and produce plans that will ensure the facilities fulfill your goals and objectives.

When it is suitable for the site, cluster visitor services. Interpretive signs located near picnic tables and restrooms will be read by more people than an isolated sign. This also helps reduce construction and maintenance costs. Considering safety and the visitors' physical needs are critical. The availability of parking dictates how many people a site can safely accommodate.

Be sure to take an integrated approach to designing your visitor services. The resulting facilities will better serve the needs of your visitors, enhance their visits, and maintain the visual quality of your byway.

*Stone columns and heavy log beams form a gateway.  
Mather Memorial Parkway, WA*



*The bold use of colors and form catches  
the eye of visitors.  
Glen Canyon National Recreation Area, AZ*



*This uniquely shaped sign provides an easily recognizable identity.  
Scenic 7 Byway, AR*

## Portal Entry

First impressions are lasting, and entry points to scenic byways should be given special design consideration as they convey the feeling of entering a special place. Entrance signs should represent the byway and express its character. The National Park Service considers entrance signs as perhaps the most important of all signs. Proper placement and construction can capture and reflect the true significance or spirit of the byway.

Portals welcome visitors, identify the scenic byway, and in many cases, provide orientation and information about features and services along the route. Facilities vary from a simple entry identification sign or a road pullout with basic information/orientation to a staffed entry station or visitor center. Portals set the architectural theme and identity of a byway and should be located at or near the main vehicular entries to the scenic byway.

The use of red rock in this sign base matches the surrounding hills and sets the architectural theme of other structures in the park.  
*Zion National Park, UT*



The orderly appearance of this entry station leads visitors into this scenic byway.  
*Mt. Evans Scenic Byway, CO*



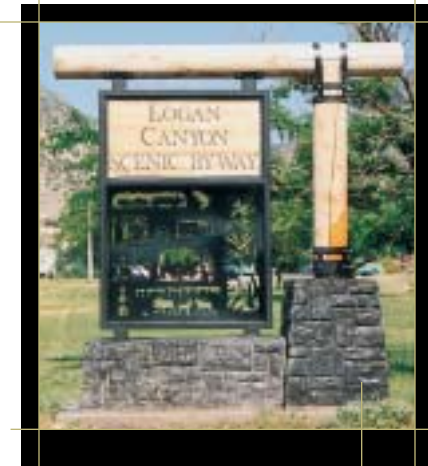
Distinctive stone work, unusual base shape, and a window are all incorporated into this unique sign.  
*Chaco Culture National Historic Park, NM*



This graphic design is distinctive and is repeated on monument maps, brochures, and other literature.  
*Highway 12 Scenic Byway, UT*

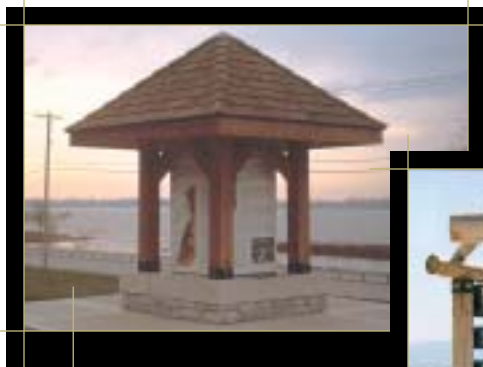


Visitors register and receive orientation information at this small, friendly, staffed entry station.  
*Mt. Revelstroke National Park, BC, Canada*



This entry sign reinforces the theme of "Portraits in Time" with silhouettes representing primary interpretive topics.  
*Logan Canyon Scenic Byway, UT*

The vertical format and placement of this sign differentiates it from other interpretive signs at the site. Maps may also be shown in a reduced diagrammatic form in waysides along the route.  
*Grand Teton National Park, WY*



This simple kiosk is large enough to attract visitors and provide an orientation to area opportunities and interpreting the byway.  
*Logan Canyon Scenic Byway, UT*

The design of this kiosk allows viewing from all sides.  
*Meeting of the Great Rivers Scenic Byway, IL*

## Orientation

When first-time visitors arrive, they want to be quickly oriented to the area and find out what opportunities are available. Visitor orientation should be considered at all sites, but is especially vital at portal entries and visitor centers. Orientation aids visitors in planning their schedules but can also provide guidance and interpretation. Orientation signs can aid the traveler 24 hours a day, during times when entry stations or visitor centers may be closed.

Maps are essential for portal entry sites. They should show the visitor's location and indicate the services and opportunities along (or near) the entire byway. The scale of the map should be large enough so that visitors can discern the total length of the byway and approximate travel time. Major features or attractions along the route should be included, as well as seasonal, logistical, or safety messages.



*Bold colors and 3-D shading on this orientation sign give visitors a feeling for the rugged landscape.*  
**Seward Highway, AK**



*This uniquely designed kiosk base adds to the attraction for those seeking information.*  
**San Juan Skyway, CO**



*The shape of this kiosk echoes the rounded surrounding hills.*  
**Kooskia, ID**



*This kiosk complements the historic structure behind it, while providing an inviting place for visitors to receive orientation to the byway.*  
**The Energy Loop: Huntington & Eccles Canyons Scenic Byways, UT**



*This sign provides byway orientation and highlights features along the route with photos. It also orients visitors to the immediate site and trail.*  
**Mt. Revelstoke National Park, BC, Canada**



## Visitor Centers and Visitor Contact Stations

The entry of Coldwater Ridge Visitor Center was designed to suggest the volcanic eruption and resulting crater at Mount St. Helens. Spirit Lake Memorial Highway, WA



Visitor centers and visitor contact stations are perhaps the best opportunity to present the byway's identity, tell the byway story, and provide orientation and information. There are many factors to consider when choosing the site for a visitor center, such as suitable, available land, access to utilities, visitor access from the byway, sequence along the byway, and the context of the site to the surrounding landscape. Site selection will also take into account how the visitor center will function, what will be interpreted, and what other activities the visitor can engage in at the site.



The building's architecture and site design should reinforce the byway's identity, respond to its regional character, and incorporate sustainable design principles. Long-term operation and maintenance of the facility must be carefully considered during planning.

The Crest House, built in the 1940s and remodeled decades later after a fire, is used as an interpretive site today. Mt. Evans Scenic Byway, CO

This visitor center hugs the hillside and provides visitors with a sweeping view of restored marshlands in their urban context. Don Edwards San Francisco Bay National Wildlife Refuge, CA







*This visitor center takes its shape from the natural feature that gives the lake its name.  
Pyramid Lake Scenic Byway, NV*



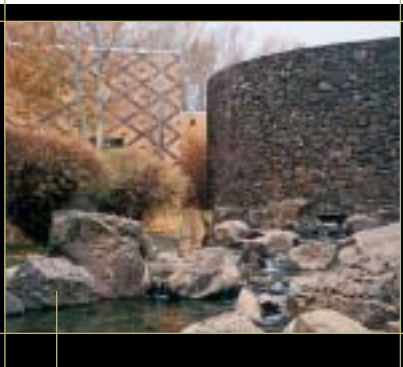
*This charming visitor center is a converted railroad depot.  
Floodwood, MN*



*Visitors crossing the pedestrian bridge to Cameron Prairie National Wildlife Refuge can watch alligators in the pond below.  
Creole Nature Trail, LA*



*A historic home at John Day Fossil Beds National Monument was preserved to welcome visitors and interpret the geology and settlement of this area.  
Journey Through Time Scenic Byway, OR*



*The Museum at Warm Springs combines the character of a nearby stream, the volcanic cliffs surrounding the valley, and basket-weave patterns into its distinctive architecture.  
Warm Springs, OR*



*Red sandstone and a Southwest style complement the red rock formations of Kolob Canyon.  
Zion National Park, UT*

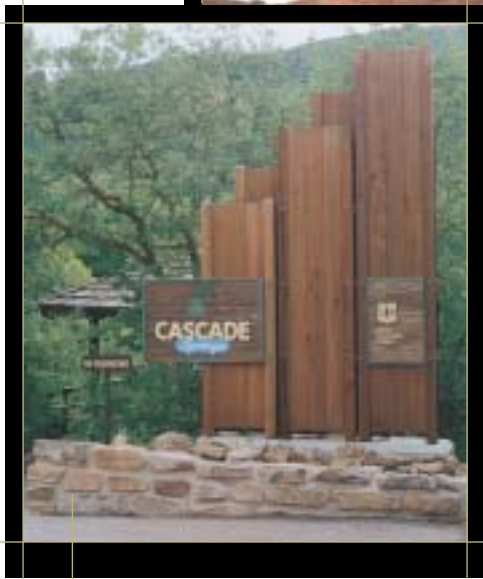
## Site Identification Signs

Site identification signs that are well-designed and strategically located help visitors navigate the byway and discover opportunities such as overlooks, visitor centers, and picnic areas. Consistent style and placement of signs assist visitors in recognizing that they are approaching a byway facility even before the sign can be read. The design of both the sign face and base can reflect a distinct architectural or design theme that will provide desired continuity along the byway.

Developing and following a sign plan will reduce clutter and confusion that may occur from too many signs. Placing the byway logo or name on site identification signs or road markers will reassure motorists they are on the right route.



*This well-designed sign reflects an architectural theme of the area and commands attention from the traveler.  
Mt. Evans Scenic Byway, CO*



*The vertical elements of this attractive sign add enough contrast to its setting to catch the attention of the visitor.  
Uinta National Forest, UT*

International recreation logos are the dominant element in this site identification sign.  
Banff National Park, AB, Canada



The formal look of quarried stone gives these signs a dignified identity to the byway.  
Mather Memorial Parkway, OR



Sandblasted wood uses a simplified version of the monument graphic to provide interest for this sign.  
Highway 12 Scenic Byway, UT



This site identification sign is chiseled into the native stone. Although it conveys its message, it does not dominate this sensitive archeological site.  
Coconino National Forest, AZ



This distinctive sign shape and post identifies sites along the parkway.  
Natchez Trace Parkway, MS

*This sign incorporates two languages without overwhelming the visitors with too much text.  
Glacier National Park, BC, Canada*



*This interpretive sign uses a beautiful forest illustration to draw visitors in and set a mood.  
Mt. Revelstoke National Park, BC, Canada*

## Interpretive Signs

Interpretive signs can be used in many types of settings along scenic byways, from visitor centers to wayside exhibits and interpretive trails. Interpretive signs provide opportunities for visitors to experience the setting while learning about the byway corridor. Well-designed and well-located interpretive signs can reach a wide audience and enhance the visitor's experience and awareness of your byway.

Interpretive signs are the single most popular method of interpretation. They are relatively inexpensive compared with personal visitor contact and can convey messages at the visitor's convenience since they are available any time of the day or season. However, interpretive signs are not the only method for conveying information. Planners and designers must consider the characteristics of their audience, the topics and themes to be interpreted, and their budget before choosing a medium.



*This sign base, shaped like a boat, reflects the waterfront setting.  
Ottawa River Parkway, ON, Canada*

## Steps to Successful Interpretive Signs

- Use the best writing and graphic design possible. Insist on professional design and consultation.
- Make signs attractive, inviting, and universally accessible.
- Have a strong focal point or center of interest.
- Select materials that will harmonize with the site and require minimal maintenance.
- Use graphics to catch the visitor's attention and tell the story. Do not use graphics as decoration.
- Use color to provide variety, emphasis, and unity. Color is very effective in catching the visitor's attention.
- Keep the sign simple and uncluttered.
- Make the sign the right size, no larger than necessary.
- Maintain open space (white space), especially in the margins.
- Install signs at heights and angles that are readable and do not obscure the feature being interpreted.



*The graphic style of this sign uses vibrant colors and a postcard format to attract visitors to its interpretive message.*

**Kealia Pond  
National Wildlife  
Refuge, HI**

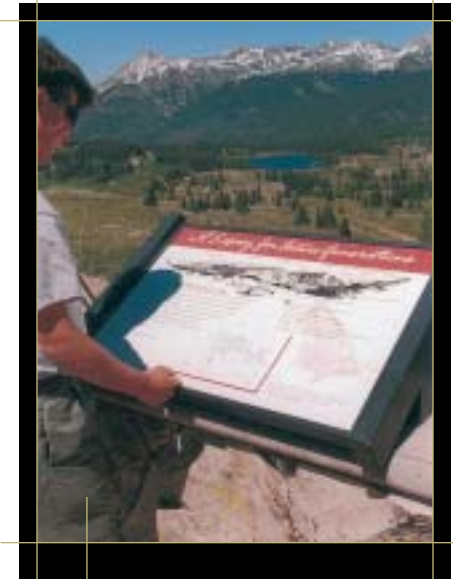
## Text Development for Successful Signs

- Be short and concise.
- Use titles that state the theme, that are provocative, and that people can relate to. Be creative (e.g., instead of “Geology of the West Fork,” use “Sculpting Mountains”).
- Use vivid language and short, active sentences and paragraphs.
- Use different levels of text (headings, subheadings, and captions).
- Avoid technical jargon and clichés.
- Strive for balance between text and graphics.
- Develop a visual sequence for text blocks.
- **DO NOT USE ALL CAPITAL LETTERS.** Capitalization is hard to read and some people find it offensive because it looks like you're yelling at them.
- Use type sizes and styles (fonts) that will ensure readability.



*This sign illustrates a bird's-eye view of a wetland and its inhabitants. The inset of the beaver provides another level of interpretation.*

**Rocky Mountain National Park, CO**



*Common first questions are “What’s the name of that peak? How tall is it? And how far away?” This Molas Pass interpretive sign answers those questions while interpreting the area.*

**San Juan Skyway, CO**

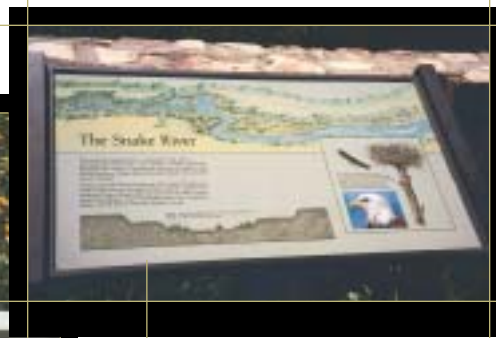
The vertical format of this colorful panel complements its setting.  
*Banff National Park, AB, Canada*



This beautifully illustrated sign tells the story in two languages.  
*Banff National Park, AB, Canada*



The headline and photo on this interpretive sign at Coldwater Visitor Center work together to immediately convey the main message.  
*Spirit Lake Memorial Highway, WA*



The combination of color photography, a bird's-eye view illustration, and interpretive text makes this panel very attractive.  
*John D. Rockefeller Jr. Memorial Parkway, WY*

## Location and Placement of Signs

### Mounting

Pay as much attention to how and where the sign is mounted as you did to the sign itself.

### Locating

Keep in mind the distance from parking and restrooms, and make sure the sign is accessible to all visitors.

### Viewing

Consider the viewer's position. How will the view be maintained after construction?

### Conditions

When locating the sign, consider sun, glare, wind, heat, cold, shadows, orientation, protective shelter needs, traffic, and topographical hazards.

### Features

Consider the relationship of the sign to the point of interest, which should be fully visible and obvious.

## Overlooks, Viewpoints, and Turnouts

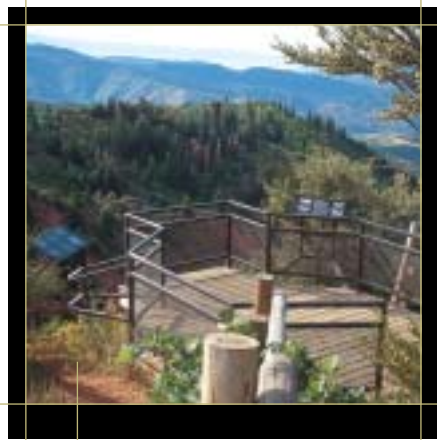
Viewing is the primary activity at overlooks; however, they often serve as rest stops. People are attracted to overlooks with wide panoramas, which can provide excellent opportunities for interpreting geology, cultural features, historical events, wildlife, or topics that address a broad landscape view. The extent of development depends on its location and its context within the byway. Improvements that enhance the visitor's experience at overlooks can include viewing decks, benches, telescopes, shelters, and interpretive artifacts. In areas where overlooks attract large numbers of visitors, consider amenities such as kiosks, restrooms, and picnic tables.

The criteria for selecting new overlooks along a byway should include sites that highlight resources identified in the interpretive plan. Consider areas where people already congregate, as these often indicate points of interest and good viewing opportunities. Sites must have enough physical area to support the proposed facility and to safely access the byway.

*In the rugged Cascades, this overlook uses native stone and wood to define pedestrian areas and to protect visitors from the steep drop-off.*  
*McKenzie Pass–Santiam Pass National Scenic Byway, OR*



*Stone walls and wrought-iron railings provide a safe viewpoint on a cliff overlooking the river. Several spotting scopes aid visitors in viewing wildlife and the valley below.*  
*Hawks Nest State Park, WV*



*This overlook gives visitors a commanding view and a dramatic experience.*  
*Nebo Loop Scenic Byway, UT*

*Interpretive signs at this overlook take advantage of the panoramic view. The viewpoint provides benches and enough room for wheelchairs to maneuver.*  
**San Juan Skyway, CO**



*At overlooks with wide, distant vistas, spotting scopes help visitors view the surrounding landscape.*  
**Snowy Range Scenic Byway, WY**



*Although the feature of this overlook is the fossil beds along the Ohio River, it provides a dramatic view of the Louisville skyline.*  
**Ohio River Scenic Route, IN**

*A site that can accommodate several viewpoints can be designed for a more intimate experience, like this one at Koosah Falls.*  
**McKenzie Pass-Santiam Pass National Scenic Byway, OR**



The physical layout of the overlook should allow adequate room for the expected number of visitors to enjoy the view. Often an overlook is accessed by a short trail from the parking area. Safety features such as fences or walls may be necessary along the trail and at the overlook to protect visitors or natural resources. The design of the overlook and the trails should be fully accessible and complement the byway's thematic design guidelines.

Approach signs and site identification signs that are clearly visible are essential in helping visitors find their way. The approach to the overlook should offer safe and easy access from the byway. Adequate parking should be provided for standard and oversize vehicles.

Some overlooks are merely areas to pull out of the travel lane and safely view the scenery and are generally referred to as pullouts or turnouts. These areas contain no interpretation or other amenities. Consider siting a turnout where people are already stopping or at a safer location nearby that offers the same view. Since pullouts are highly visible while traveling a byway, it is important to design them to enhance rather than detract from the scenic character. Consider the size and shape so that it does not draw attention to itself, but still provides safety.





Scenic overlooks are located at popular viewing areas to provide safe areas for motorist to pull off the roadway.  
*Glacier National Park, MT*



The height of these interpretive signs make them easy to read and allows children and those in wheelchairs to view the landscape.  
*Manistee National Forest, MI*



Large numbers of visitors crowd onto this cantilevered deck and adjacent walkway to gain spectacular views of the Rockies.  
*Banff National Park, AB, Canada*



The same design and materials used to build this boardwalk are used to integrate this interpretive overlook into the entire trail.  
*Don Edwards San Francisco Bay National Wildlife Refuge, CA*



A roof structure extends the seasonal use of this overlook.  
*Uinta National Forest, UT*



The color of the surrounding hills and spires are repeated in the stonework at this overlook. The long length of the railing allows large numbers of people to view at the same time.  
*Bryce Canyon National Park, UT*



To help visitors identify the surrounding peaks, this viewfinder at Mount St. Helens National Volcanic Monument uses a 360° relief illustration.  
*Spirit Lake Memorial Highway, WA*

“The interpreter can seldom come into contact with his visitor. In lieu of that, he must leave a message for him.”

**Freeman Tilden,**  
*Interpreting Our Heritage*

*The use of stone pillars and a mountain silhouette header reflects Colorado.*  
*Headwaters of the Colorado Scenic Byway, CO*



*This interpretive panel provides the names and elevations of the magnificent mountains as well as the history of the early mountaineers.*  
*Banff National Park, AB, Canada*



*Artifacts help visitors visualize the area's mining history.*  
*San Juan Skyway, CO*

## Interpretive Waysides

Wayside is a broad term for interpretive areas relating to points of interest. They are also called turnouts and scenic overlooks. They may consist of a single interpretive sign, a kiosk, or a roofed shelter with multiple signs. Tangible artifacts and/or audio messages can also be used to help tell the story.

Wayside exhibits can be an effective media for scenic byway interpretation. The exhibits should be located near the feature being interpreted. Since waysides are always open, travelers can stop and view the interpretive material at any time.

When planning the wayside location, be responsive to opportunities described in the inventory phase of planning. Consider where people congregate, where they ask questions, where a dominant landscape feature exists, or where a historic event has occurred. There may be areas where the feature is of such magnitude that only the name of the feature is appropriate, allowing visitors to discover and enjoy the area on their own.

When planning wayside locations, consider spacing and location. A study of interpretive trails revealed that people are more likely to stop and read signs at points where the landscape changes, such as when emerging from a forest into a meadow. People are also drawn to overlooks where they can see a broad panorama. Waysides are part of the entire interpretation of the byway, so themes and overall design should be consistent with the interpretive plan.

A visitor's first impression of a wayside exhibit is important. The quality of the message may be equated with the overall quality of the exhibit. The effectiveness of a wayside exhibit is increased by quality installation, proper site preparation, a thoughtfully chosen location, good site maintenance, and unobscured vistas.

*A spotting scope and a 3-D relief map gives visitors a variety of exhibits to explore and an opportunity to gain a greater appreciation of the area.*  
**Waterton Lakes National Park, AB, Canada**



*Illustrations are used to draw visitors to this interpretive sign and to convey historical information. The soft colors are in harmony with the landscape.*  
**Pioneer Mountains Scenic Byway, MT**



*Quotes and interpretive messages can be incorporated into structural elements of the site.*  
**Edge of the Wilderness Scenic Byway, MN**



*This steam-powered donkey is an artifact from early logging days and gives visitors an appreciation of how far technology has come.*  
**Camp 18, OR**



*Native stone provides an unusual base for this interpretive sign and helps to integrate it into the environment.*  
**Uinta National Forest, UT**



*Animal tracks and other objects can be impressed into the pavement to give another dimension to the interpretive message.*  
**Brazos Bend State Park, TX**

If the site surrounding a wayside exhibit is not visually attractive or interesting, it will not encourage visitors to stop. Related facilities such as restrooms, benches, water fountains, wildlife blinds, and observation structures may attract visitors to wayside exhibits. Approach and directional signing is a strong motivator in influencing travelers to stop, and many visitors rely on signage to find wayside exhibits.



*This wayside exhibit incorporated tactile reliefs of salmon in a wall made of river rock from the site.*  
**Wildwood, OR**



*This wayside provides early photographs of the wilderness mining history on Molas Pass.*  
**San Juan Skyway, CO**

*This log artifact was left where it fell during the eruption of Mount St. Helens. The viewpoint was built around it to illustrate the force and direction of the blast.*  
**Spirit Lake Memorial Highway, WA**



*A wood retaining wall provides a simple detail that adds interest.*  
**Highway 12 Scenic Byway, UT**



*The design of this wayside uses a teepee form to draw visitors out to the interpretive viewpoint.*  
**The Native American Scenic Byway, SD**



*This brass locator is an excellent aid in interpreting the surrounding landscape.  
Mt. Evans Scenic Byway, CO*

*This wayside overlooking the Columbia River provides a dramatic view for picnickers and sightseers.  
State Route 14, WA*



*As visitors step on the various animal tracks embedded in the walkway, they hear the sounds of each animal.  
Los Angeles Zoo, CA*



*This interactive book format creates the same intimate feeling as the surrounding forest.  
Glacier National Park, BC, Canada*



*Sandstone was used to provide a unique base for this interpretive sign.  
Coconino National Forest, AZ*

*Petroglyph designs are incorporated into this colored concrete bench under a shade structure.  
Grimes Point/Hidden Cave Archaeological Area, NV*

*This simple sign structure is attractive and large enough to draw the visitor's attention.*  
**Yellowstone National Park, WY**



*The rustic nature of this kiosk is achieved through the use of native stone and heavy log construction. This strong architectural statement draws visitors in to read the interpretive panels.*  
**Yellowstone National Park, WY**



*This lighted kiosk efficiently displays six panels at the Pactola Visitor Center.*  
**Black Hills National Forest, SD**

## Kiosks

There are many types and sizes of kiosks ranging from covered sign boards to roofed structures. They are suitable for orientation signs, interpretive exhibits, and to highlight byway and community events. Kiosks can be designed to hold a number of different signs and exhibits. Kiosks with roofs can provide shelter, protecting your signs and guests from the sun, wind, and rain.

The design and visibility of a kiosk plays a significant role in motivating visitors to stop and view exhibits. Kiosks are most effective when they are designed to have enough size and mass to attract attention. Consistently incorporating the byway's architectural theme in the kiosk design helps establish an identifiable and coherent byway identity.



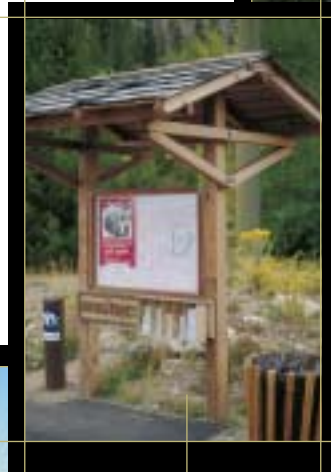
*In addition to protecting visitors from rain, snow and wind, this kiosk displays brochures about attractions along the route.*  
**Flat Tops Trail, CO**



*This charming kiosk provides travelers with an explanation of the rich resources in the surrounding landscape.  
Meeker Pasture Colorado State Wildlife Area, CO*



*The distinctive architecture and cultural artwork draws visitors to this kiosk.  
Sequim, WA*



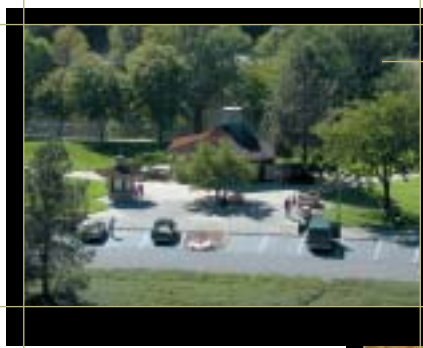
*This small kiosk offers the visitor a choice of brochures along with orientation information.  
Frisco, CO*



*The large size and attractive design of this kiosk attracts visitors off the road where they are rewarded with information on the Continental Divide.  
San Juan National Forest, CO*



*The unusual roof on this kiosk matches the design of the nearby Coldwater Ridge Visitor Center.  
Spirit Lake Memorial Highway, WA*



*Siting this rest area along a river increases a visitor's connection with the landscape.*  
*Interstate 5, near Hornbrook, CA*



*The siting of this rest area takes advantage of mature trees and red rock cliffs in its setting.*  
*Hole'n the Rock, UT*



*Picnic facilities are provided at this rest area.*  
*Highland Scenic Highway, WV*



*This rest area was designed to take advantage of existing trees.*  
*Spanish Fork Canyon, UT*

## Rest Areas

Rest areas are provided along byways for the public to stop, take a break, and use a restroom. They are usually located adjacent to or within sight of the byway. In planning the location of rest areas, the length of travel time should be considered relative to the last and next logical stop along the byway. The location should also take into account the frequent maintenance that these types of facilities require.

Rest areas offer parking, restrooms, and usually drinking water. Approach signs, safe and easy access, and adequate parking for standard and oversize vehicles must be provided. An orientation sign with a map of the byway highlighting popular attractions will give visitors necessary information for navigating their way and enjoying the features along your byway.

Picnic tables are also appropriate at rest areas. Depending on the site, you may want to locate tables in shady areas or within a shelter, since most use will occur during warm weather.



## Restrooms

Restrooms present the challenge of designing and siting a structure that is easy for visitors to find without being the focal point. These structures should blend into the landscape through their siting and portray the character of the byway through their architecture. Using colors, materials, and textures that are predominant in the surrounding landscape will help integrate these structures.

There are three main types of restrooms: flush, composting, and vault. Flush toilets are capable of handling a large number of visitors and do not emit odors, but are generally more expensive because they require potable water and septic or sewer systems. Composting toilets do not require water, must be designed to handle the expected number of visitors, and are less effective in cold or wet climates. Vault toilets do not require water, must be designed to handle the expected number of visitors, require periodic pumping, but are generally less expensive to construct. The type of restroom appropriate for a particular site also depends on average daily use, peak use, distance between restrooms, proximity to utilities, whether visitors will stay at the location, and if it is associated with a picnic area, trailhead, or other facility.

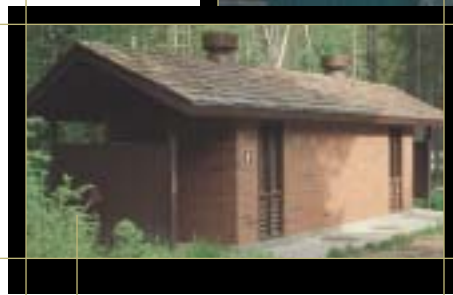
All restrooms must comply with Federal accessibility standards. These requirements determine architectural elements, such as door width and placement, stall size, and height of fixtures. They also affect siting requirements related to slope, distance, and the surface material of parking lots and sidewalks accessing the restroom.



*Vault toilets are widely used in semiprimitive settings where potable water is not available.*  
**Bridger-Teton National Forest, WY**



*Flush toilets accommodate the high use at this site. The architectural style, building materials, and location all integrate it into the surroundings.*  
**Zion National Park, UT**



*The use of brick gives this restroom building a less rustic appearance that is appropriate in less primitive areas.*  
**Wasatch-Cache National Forest, UT**



*Built to reflect the mining history of the area, this Bureau of Land Management composting toilet fits comfortably in its surroundings.*  
**Alpine Loop National Back Country Byway, CO**



*Locating this accessible picnic site behind a boulder provides screening from the road and gives users a sense of privacy.*  
**Uncompahgre National Forest, CO**



*In areas of high use, a reservation system may be needed for picnic shelter use.*  
**Sandia Crest Scenic Byway, NM**



*Two individual picnic sites are housed under one roof in this shelter that has the same architectural character as other buildings at this rest area.*  
**Hole'n the Rock, UT**



*This picnic area, located near a popular interpretive trail along a lake, provides both sunny and shady picnic sites.*  
**Spirit Lake Memorial Highway, WA**

## Picnic Areas

One of the most popular recreational activities along scenic byways is picnicking. When planning for your byway, look for opportunities to provide picnic sites. These can be formal picnic grounds or just a few tables located at a rest area or interpretive site. Undeveloped areas where visitors often stop to picnic should be considered for picnic sites. Picnic areas can also be located near overlooks, water or geologic features, historical sites, or short hiking trails. Safety must be considered for vehicle access and exit from the site.

Picnic areas generally include a parking area, restrooms, water faucets, garbage and recycling containers, and individual sites with a table and barbeque grill or fire ring. Shade is very important, especially in warmer climates. Optional amenities may consist of shelters, interpretive signs, bulletin boards, nature trails, benches, turf areas, pet exercise areas, and children's play equipment. The site and site furnishings must be accessible. Parking for different-sized vehicles, including buses and recreational vehicles, is vital.

Consider how the design appears to people using the picnic sites and to byway motorists. The materials and styles should reflect the design theme that has been chosen for visitor facilities along your byway.

# Parking

Providing adequate parking allows visitors to stop and enjoy your byway opportunities. The challenge is to design parking so as not to create a sea of asphalt that will disrupt the scenery when viewed from the byway. The parking lot may be the first introduction that visitors have to many features along your byway.

Parking will likely be the limiting factor to site visitation, so the first step is to consider how many people may want to visit the site. Then consider the number of people and vehicles that the site can accommodate without causing damage to the site or degrading the experience. Parking areas should be designed for smooth vehicle and pedestrian flow and should be sized to accommodate the largest type of vehicle expected to use it. Parking space size and turning radius requirements for large recreational vehicles, trucks pulling boats or trailers, and tour buses are considerably larger than for passenger vehicles.

Safety is critical when designing the access to parking from the byway. Sight lines, adequate distances to accelerate and decelerate, and the turning radius of the largest vehicles must all be considered. It might be necessary to add turning lanes along the roadway to access parking



A stone plaza with a drinking fountain separates parking and pedestrian areas.  
*Natchez Trace Parkway, MS*

Parking areas are separated from the road by medians planted with native vegetation.  
*Zion National Park, UT*

Parking is tucked around the "needles" formations that provide the attraction.  
*Peter Norbeck Scenic Byway, SD*



In an area of limited space, this parking lot is separated from the roadway by a low stone wall that mimics the design of historic walls along the byway.  
*Historic Columbia River Highway, OR*

A biofiltration pond was incorporated into the design of this parking lot and planted with native plants.  
*Spirit Lake Memorial Highway, WA*



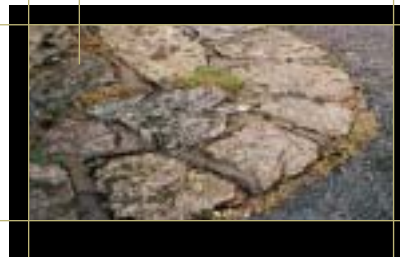


*This parking area at Sahalie Falls is situated at different levels to fit the terrain. The planted areas help integrate it into the site.*

*McKenzie Pass-Santiam Pass National Scenic Byway, OR*



*The use of low-set stone defines vehicle lanes, but allows oversize vehicles with wide turning radii to drive up and over them when necessary.*  
*Blue Ridge Parkway, VA*



*To integrate the parking lot into the surrounding terrain, logs and rocks from the eruption of Mount St. Helens were incorporated into planting islands, and native plants were allowed to regenerate.*  
*Spirit Lake Memorial Highway, WA*



*To make cars less visible from the roadway, this parking area at Horsetail Falls was lowered.*  
*Historic Columbia River Highway, OR*

areas. To provide for pedestrian safety, design for separation of pedestrians and vehicles.

Parking lots can be a positive introduction to your byway facility if carefully designed. Vegetated islands help to reduce the expanse of asphalt and separate pedestrians from vehicles. Trees planted in islands and around the parking lot not only improve the visual quality, but also help to cool it in the summer. Curved edges around the parking lot can help the parking area respond to the topography. When possible, locate parking out of view of the byway.

The design of the parking area should match the development level of the site. Sometimes gravel parking may be appropriate. Materials should be chosen to blend into and complement the surroundings and other developments at the site.

Where possible, design the site to remove trace contaminants, such as oils and heavy metals, before they can reach wetlands or streams. Possible methods to prevent contamination include detention ponds (a shallow pond that allows contaminants to settle to the bottom) and biofilters (long, grassy ditches that collect contaminants).

## Trailheads and Other Recreational Use Parking

Recreational opportunities such as hiking, horseback riding, fishing, rafting, boating, off-highway vehicle use, and hunting are examples of the recreational activities that may attract visitors to your byway. Parking areas and trailheads are the gateway to these opportunities.

Design preparation areas to accommodate the planned uses which may include horse-hitching racks, unloading ramps, and raft/boat launching area. Other amenities may be provided such as restrooms, bike racks, corrals, boat launches, docks, and fishing piers. Appropriate information should be provided on signs such as bulletin boards, kiosks, or trailhead information panels. It is ideal to locate information in one area rather than scattered around the site. This is an opportunity to apply the byway's design theme.

Parking is designed to accommodate the numbers and types of vehicles necessary for the primary activities that the parking area serves. Recreational vehicles or vehicles pulling trailers need larger turning radii and longer parking stalls. Remember that backing up is much more difficult for vehicles with trailers. Parking areas used in the winter

may need to be designed for snow storage. Site identification and directional signing along the byway should guide the public to these sites, which may be located off the byway.

*Rustic wooden wheel stops define vehicle access, and similar low wood railings define pedestrian areas.*  
**Glacier National Park, MT**

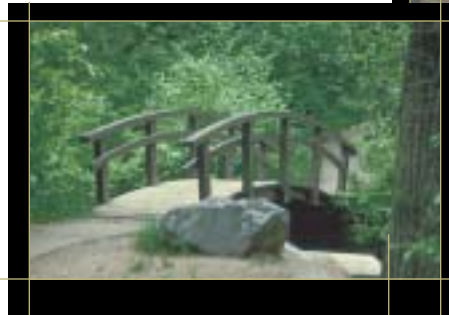


*Large, "planted" boulders provide a barrier between the parking area and pedestrian path.*  
**Uinta National Forest, UT**

*In primitive settings, a gravel parking area and trailhead sign are all that is necessary.*  
**San Juan Skyway, CO**



*This serpentine walkway provides universal access to the lower trail.  
Ridgway State Park, CO*



*This simple arched bridge is appropriate along more developed trails with a hardened surface. The low arch makes this bridge universally accessible.  
Uinta National Forest, UT*



*This native dry-laid stone retaining wall with its irregular height makes an attractive transition from the natural landscape to the paved trail with lighting.  
Ridgway State Park, CO*

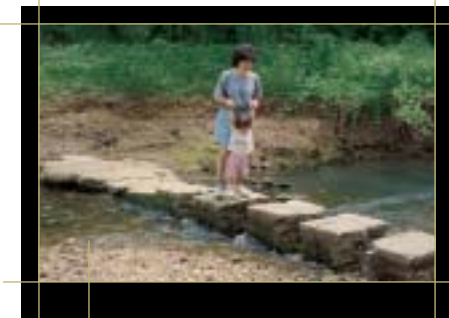


*This pedestrian underpass allows safe passage under the road. The structure is faced with stone to match other structures in the area.  
Spirit Lake Memorial Highway, WA*

## Trails, Paths, and Sidewalks

Trails should complement the intrinsic qualities, allowing visitors to experience a new dimension of your byway. Trails encourage people to stop and spend more time exploring the area. It is an opportunity to view wildlife, get a closer look at the natural environment, or enjoy a historical site by “walking in the shoes” of historical characters. Short trails are excellent opportunities for interpretation, and they are relatively easy to make accessible.

Important considerations in designing trails include choosing a route that orchestrates how the landscape is experienced and designing the trail so that it does not disrupt the scenic quality of the byway. The trail should unfold the mystery, variety, and beauty that the site has to offer.



*Carefully placed stepping stones provide both a low-cost and a visually pleasing alternative to a pedestrian bridge.  
Natchez Trace Parkway, MS*

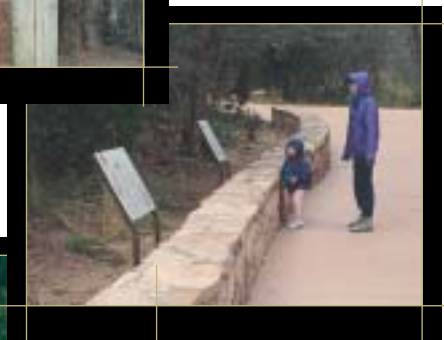
“There are some who find a trailhead,  
 or a path through the woods which  
 curves invitingly out of sight, simply  
 irresistible. Thoreau was such a person  
 and before him Wordsworth. And  
 today it's me and probably you.”

**Charles E. Little,**  
*Greenways for America*



*Orientation and information are provided at the beginning of the interpretive trail at Cranberry Glades Botanical Area. Highland Scenic Highway, WV*

*A curved branch was used as the terminus of this railing. It was shaped and sanded to fit the hand. McKenzie Pass-Santiam Pass National Scenic Byway, OR*



*Barriers are often needed to keep visitors from trampling the adjacent landscape. This stone wall echoes the large formations on the other side of the trail. Garden of the Gods City Park, CO*

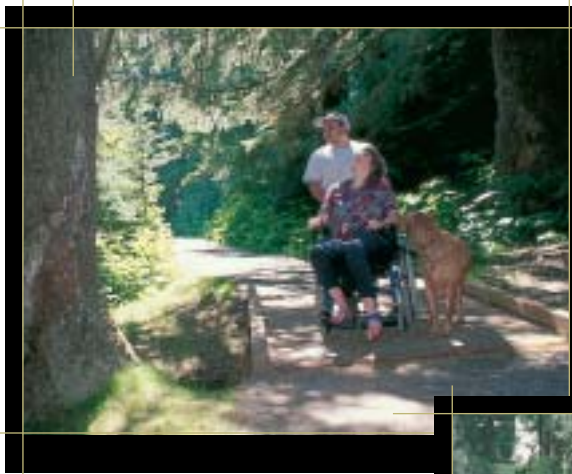


*Mystery and surprise can be achieved by winding trails through a forest so that visitors experience it a little at a time. The wood railing keeps people on the trail while retaining a country feel. Kancamagus Scenic Byway, NH*



*Wildlife viewing is greatly enhanced by this boardwalk that takes visitors over a lake where waterfowl are frequently seen amongst the vegetation. Spirit Lake Memorial Highway, WA*

*Making gravel trails universally accessible requires relatively flat grades and a hard, compacted surface.  
Tongass National Forest, AK*



*These carefully placed rocks were arranged to appear natural.  
Highland Scenic Byway, WV*



*Simple timber retaining walls were used to wind this trail through the woods.  
Spirit Lake Memorial Highway, WA*

Consider trails that enhance the experience for all visitors by providing universal access to unique features such as a waterfall or an ancient tree. Trails that run parallel to the byway can provide opportunities to experience the byway at a slower pace. Consider loop trails that are a variety of lengths. Trails should be universally accessible as the terrain permits, in accordance with the current Federal accessibility standards.

There may be opportunities to use historic road or rail-road alignments for interpretive or recreational trails. Many byways have been realigned through the years as



*The stone wall on the right retains the uphill slope while the stone pillars and wood railings on the left provide safety from the steep drop-off.  
Hawks Nest State Park, WV*



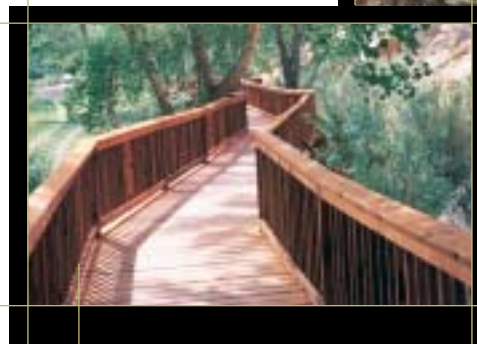
automobile use increased. The byway's story could be told along the original roadbed.

Trail surfaces are both visually and functionally important. Where use is high, paved surfaces may be appropriate. In more primitive settings, native soil or gravel surfaces may be the better choice. The surface selected must be firm and stable, though paving is not required for accessibility.

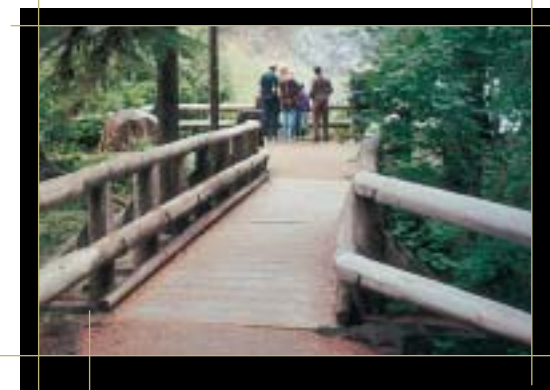
Boardwalks provide access for all people and may add an intriguing visual element. They can also provide a platform for viewing sensitive sites, such as archeological features,



*To safely transport visitors across a steep ravine, a naturally weathering steel bridge was installed that blends into the forested environment.*  
*San Juan National Forest, CO*



*Elevated boardwalks are often used to allow visitors into a fragile environment, to extend seasonal use, or to keep visitors away from potential hazards.*  
*Capitol Reef National Park, UT*



*This rustic bridge helps make this trail over rugged terrain universally accessible.*  
*McKenzie Pass-Santiam Pass National Scenic Byway, OR*



*Curving in a trail or boardwalk can be used to focus the viewer's attention on different features along the way.*  
*Creole Nature Trail, LA*



*This boardwalk puts visitors right next to giant cedars while keeping them from trampling the forest understory.*  
**Glacier National Park, BC, Canada**



*The retaining wall along this trail incorporates benches set back from the trail that are visually separated from each other, making them more private.*  
**Newport, OR**



*Although unobtrusive, this routed message warns visitors of a potential hazard.*  
**Highland Scenic Highway, WV**



*The Fish Creek Bridge has served as a popular local attraction.*  
**Routt National Forest, CO**

## Bicycles

Scenic byways often attract bicyclists. The slower pace, unique charm, and beautiful scenery provide a sought-after bicycling experience. The width of the road shoulder and the volume of motorized traffic influence bicycle safety. If conflicts occur or safety hazards are present, consider measures for managing the use of bicycles. Accommodating bicycles often improves the safety and travel experience for motorists as well.

Where feasible, consider a separate trail for bicycle use. Many of the design principles used for foot trails apply to bicycle trails. Trails designed for road bikes are paved. Mountain bicyclists can negotiate primitive trail surfaces. The bike trail and associated elements should complement the views from the road and reflect the same design theme.

If necessary, bicycles can be accommodated on existing roads by widening the shoulder for a designated bike lane. Make sure to inventory your roadside for anything that could pose a hazard to bicyclists, such as unsafe grates, debris, narrow lanes, rough pavement, expansion joints, rumble strips, or blind intersections.

*Simple bridges add to the cycling experience.  
Wasatch-Cache National Forest, UT*



*Bicyclists are drawn to scenic byways because of the slower pace and winding character of the road.  
Glenwood Canyon, CO*



*Traveling the byway on a bicycle is an entirely different experience.  
Columbia River Gorge National Scenic Area, OR*



*This bike rack accommodates many bikes, but is unobtrusive at this site.  
Zion National Park, UT*

## Visitor Facilities Resources

***Environmental Interpretation: A Practical Guide for People with Big Ideas and Small Budgets.***

Sam Ham, University of Idaho. North American Press, Golden, CO. 1992.

***Guide for the Development of Bicycle Facilities.***

AASHTO Task Force of Geometric Design, American Association of State and Highway Transportation Officials. 1999.

***Interpretive Planning Handbook.***

Michael Paskowsky. U.S. Department of the Interior, National Park Service, Harpers Ferry Center. 1983.

***Mountain Bike Trails: Techniques for Design, Construction, and Maintenance.***

Michael McCoy and Mary Alice Stoner, Bikecentennial, Missoula, MT.

***National Sign System Study.***

U.S. Department of the Interior, National Park Service, D-302A. September 1987.

***Park and Recreation Structures.***

Albert H. Good, Architectural Consultant, U.S. Department of the Interior, National Park Service. Princeton Architectural Press, New York. 1938.

***Signs, Trails, and Wayside Exhibits: Interpreter's Handbook Series.***

Suzanne Trapp, Michael Gross, and Ron Zimmerman. University of Wisconsin, Stevens Point, WI. 1992.

***Uniform Federal Accessibility Standards.***

(Online. August 2001) Architectural and Transportation Barriers Compliance Board. Washington, DC. [www.access-board.gov](http://www.access-board.gov).

***Universal Access to Outdoor Recreation: A Design Guide.***

PLAE, Inc., Berkeley, CA. 1993.

***Visual Quality of Built Environments in National Parks.***

U.S. Department of the Interior, National Park Service, D-903. October 1993.

***With People in Mind: Design and Management of Everyday Nature.***

Rachel Kaplan, Stephen Kaplan, and Robert L. Ryan. Island Press, Washington, DC. 1998.



# Roadway Improvements



*Many aspects of roadway improvements are governed by State, local, and agency standards that must be met. However, there are also many conventions that are not actually standards. The creative planner or designer can propose alternatives as long as safety and function are not compromised. When planning roadside improvements, look for designs that reflect the intrinsic qualities of your byway.*

## *Designing Byway Roadside Improvements*

As visitors drive along a scenic byway, they are focused on the surrounding scenery. They are probably not aware of the number of driving lanes, width of the driving lanes, shoulder width, construction materials, sharpness of the curves, how rock crops are treated, and how the road follows the topography. Yet these factors have a dramatic effect on their experience.

While road design is influenced by the physical aspects of the terrain, road use, design speed, and the technical standards set by the local, State, or Federal governments, there is flexibility in roadway design.



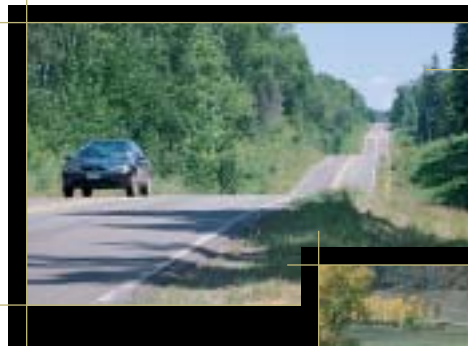
## Road Alignment

Many scenic roads get their character in part from their history. Meandering roads that follow the banks of a river, wind through narrow canyons, or skirt the cliffs of mountains and high mesas often began as a foot trail or wagon road. As travel increased and vehicles changed, the road was updated to the extent the terrain would allow. As roads evolve in response to increased use, they are often straightened and passing lanes are added. While evaluating the economic and safety considerations of road realignments along your byway, careful consideration should be given to how they will change the character of the byway.

Many scenic byways are characterized by the curving nature of the road as it winds its way through the landscape. Road alignment can take us by historic sites or landscape features. Meandering curves reveal the landscape a little at a time and allow us to view in many directions. The alignment can also steer us away from undesirable features or features that need to be protected.

Horizontal and vertical alignments greatly affect the driving experience. Horizontal road alignment is the configuration of the roadway in a horizontal plane. Vertical road

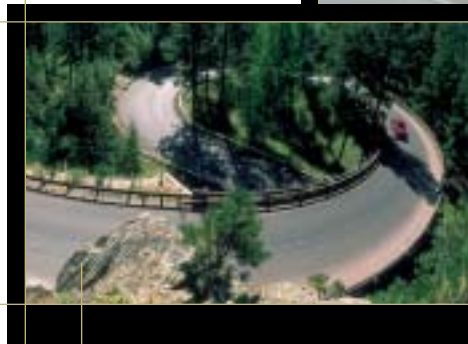
alignment is the vertical configuration of the road. Roads that follow the topography require minimal cut and fill, which reduces the impact on landforms and the cost of hauling out excess material.



*The road contours to the topography while providing adequate sight distances.*  
**Edge of the Wilderness Scenic Byway, MN**



*The horizontal alignment on West Delores Road curves around a historic structure to preserve it.*  
**San Juan National Forest, CO**

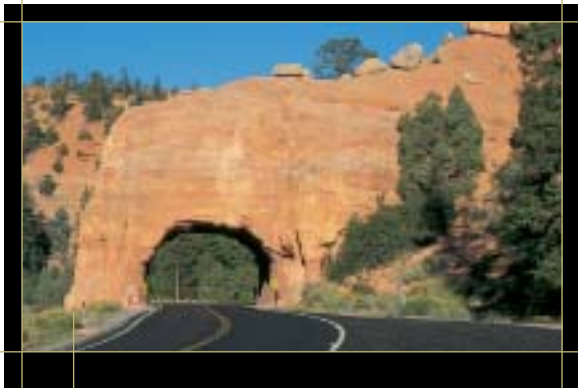


*Creative alignment of this road at Pigtail Bridge protects natural resources and enhances the traveler's experience.*  
**Peter Norbeck Scenic Byway, SD**



## Road Width

Eventually the attractiveness of your byway and its resources can lead to increased traffic volumes and congestion. Widening the road typically improves traffic flow and safety. It may also diminish the charm of the driving experience, unless engineers and landscape architects make a concerted effort to determine the scope of improvements needed, identify the locations where improvements will be most effective, and blend these improvements into the surrounding landscape.

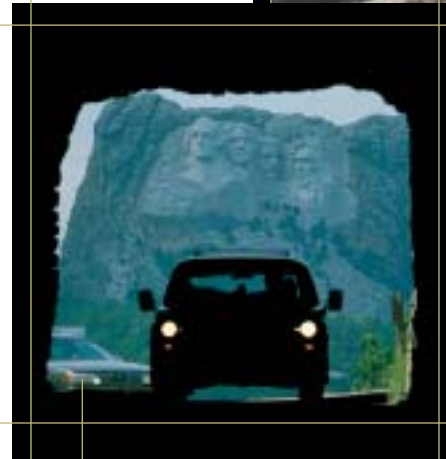


*This highway tunnels right through the rock, creating a memorable feature along the route.  
Highway 12 Scenic Byway, UT*



*The roadside barriers constructed by the Civilian Conservation Corps establish the width of this road.*

*Trail Ridge Road/Beaver Meadow Road, CO*



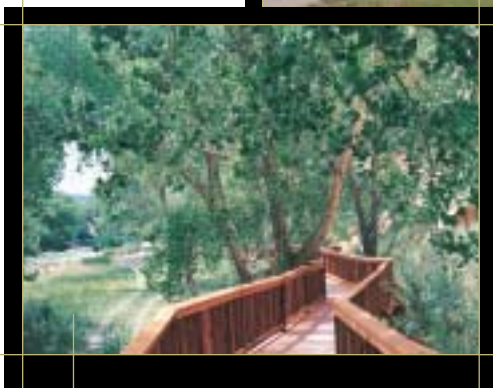
*This narrow road width has been maintained to keep its memorable character.  
Peter Norbeck Scenic Byway, SD*



To reduce pollutants from entering natural waterways near Dillon Reservoir, road runoff is directed into grass-lined bioswales that collect oils and heavy metals.  
*Interstate 70, CO*



Trees and shrubs were planted in this median to visually separate the lanes of traffic and to blend the road corridor into the existing landscape.  
*George Washington Memorial Parkway, VA*



This round rock median separates a parking area from the road.  
*Yoho National Park, BC, Canada*

## Medians and Parking Islands

Medians and parking islands can have a major influence on the character of the byway. Medians can serve to separate opposing traffic, provide a recovery area for out-of-control vehicles, allow space for turn lanes, minimize headlight glare, and provide width for future lanes. Vegetation in the medians gives the road a parkway feel.

Parking islands either physically or visually separate a parking pullout from the traffic lanes. Similar design principles apply to both medians and parking islands. Creative use of vegetation, materials for curbing, and surface treatments for medians and parking islands can complement the byway character.

## Curbs

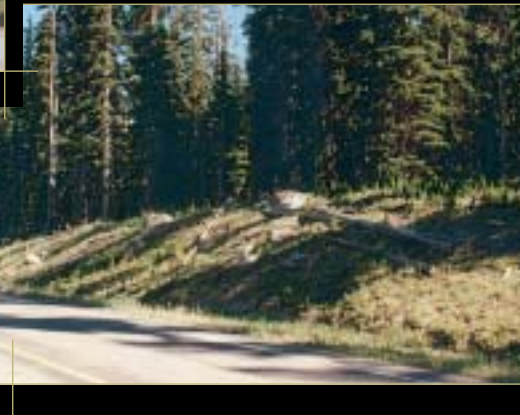
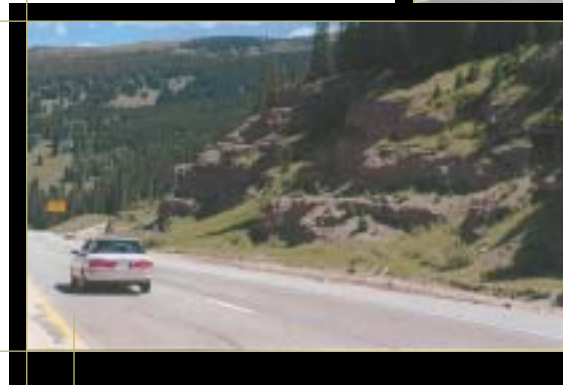
Curbs along roadways can separate pedestrian areas from vehicle areas, direct runoff, and define medians and parking islands. You may want to consider alternatives to concrete when planning for curbs. Depending on the byway character and budget, native stone or wood curbs may function well and blend with the byway's character.

## Cut Slopes and Fill Slopes

If constructed with care, cut slopes and fill slopes can contribute to the scenic quality along your byway by creating variation along the roadway and exposing the underlying geology. The most important objective is the long-term stability of the slope. Also important is maintaining a consistent clear zone based on the traffic speed and volumes, as well as the nature of the terrain along the route. Cut slopes and fill slopes should be designed to mimic the surrounding landscape character. Some factors that help achieve this are use of irregular forms, variation in design, irregular benching, planting pockets, rounding the top of the slope, rock staining, and seeding with native plants.

Various blasting and mechanical techniques achieve different results depending on the type of rock material. The top of cut slopes should be rounded off and the sides laid back to help blend the cut into the existing hillside. This rounding will also prevent overhanging vegetation that is likely to come loose and slide down the slope. Depending on the stability of the slope, additional slope protection measures may be necessary, such as rock bolting, soil nailing, and applying shotcrete. Additional measures may also be necessary to keep rock off the roadway, such as fencing or barriers. Each should be evaluated for their visual impact.

*Rock catchment walls can be used to prevent falling rocks from landing on the roadway.  
State Route 14, WA*



*This rock cut on Vail Pass was masterfully designed and executed through the use of irregular benching and variation to appear as a natural outcrop.  
Interstate 70, CO*

*The top of this cut bank was rounded back and boulders were left to achieve a more natural appearing slope.  
Yellowstone National Park, WY*

## Retaining Walls

Retaining walls may be necessary where the natural terrain is steep or to limit disturbance to environmentally sensitive areas. When the surface and structure of a wall complement the character of the byway, they can help reduce the visual impacts of cuts and fills. Types of retaining walls vary in character and appearance. Common wall types include soil-reinforced, gabions, crib, metal bins, stone masonry, interlocking masonry, and reinforced concrete. Surface treatments, such as oxidized metal or stone, simulated rock, colored concrete, or masonry veneers can complement the characteristics of the landscape.



*This stone masonry wall retains the slope and blends into the rugged landscape.*  
**Yellowstone National Park, WY**



*Most visitors traveling through Oak Creek Canyon would never know that this rock outcrop was sculpted concrete.*  
**Sedona–Oak Creek Canyon Scenic Road, AZ**



*Using native stone to face this massive retaining wall makes it less visible from other sections of the road and blends with stone work used on the adjacent viewpoint.*  
**Pacific Coast Scenic Byway, OR**



*This welded-wire retaining wall along the West Delores Road was chosen because the color of the stone blends into the environment, and it was less expensive than a concrete wall.*  
**San Juan National Forest, CO**



*Timber crib walls are appropriate in rustic settings.*  
**San Juan National Forest, CO**

## Bridges and Overpasses

Bridges and overpasses can be positive and interesting features along a byway. The design should take into account the context of the landscape and reflect its historic, rural, or urban character. Choose materials and colors that complement the surrounding landscape. Consider restoring historic bridges for their important contribution to the character of their byways.

Bridges and overpasses provide vehicle and pedestrian access. Passage for fish and wildlife on and under these structures should be incorporated into the design where appropriate. Bridge piers and substructures should not encroach on the stream channel. Aesthetic railings or walls can be selected that meet requirements.

*This unusual underpass uses brick that is commonly used in houses and other buildings in the area.*  
**George Washington Memorial Parkway, VA**



*In a forested environment, this heavy timber bridge is the perfect complement.*  
**Yellowstone National Park, WY**



*This bridge was textured and colored to be aesthetically pleasing to hikers who pass under it.*  
**Highway 12 Scenic Byway, UT**



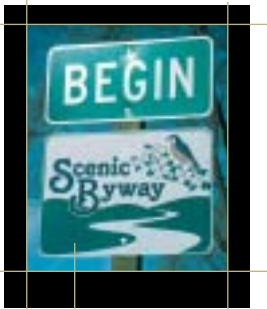
*Beautiful historic bridges, like this one over the Rogue River, have been preserved to retain the character of the byway.*  
**Pacific Coast Scenic Byway, OR**



*The distinctive design of this historic bridge is a visual and historical treasure along the byway. Carefully consider repair and restoration of existing bridges before constructing new bridges.*  
**Historic National Pike, MD**

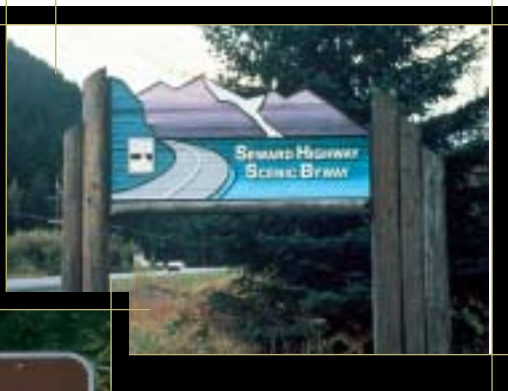


*This bridge has additional arches on either side of the road, which gives it a lighter appearance and allows motorists to view more of the scenery.*  
**Acadia, ME**

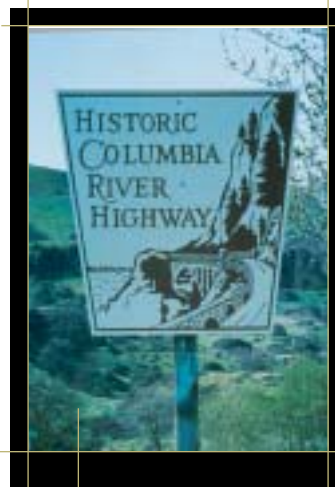


*This simple combination of signs signals the beginning of the byway.*  
**Great River Road, MO**

*Shaping this sign to follow the top of the mountains gives it an unusual shape that is eye-catching and easily recognizable.*  
**Seward Highway, AK**



*This sign is bold and commands attention, and also carries the byway's logo.*  
**Blue Ridge Parkway, VA**

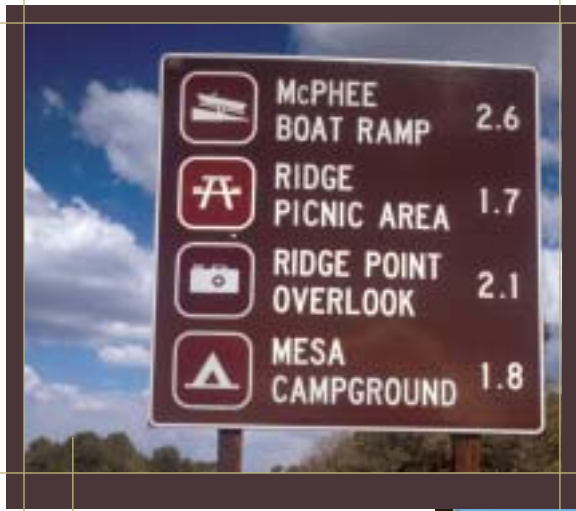


*The graphics on this byway marker evoke a historic theme, and the unusual sign shape makes it easily recognizable.*  
**Historic Columbia River Highway, OR**

## Roadway Signs

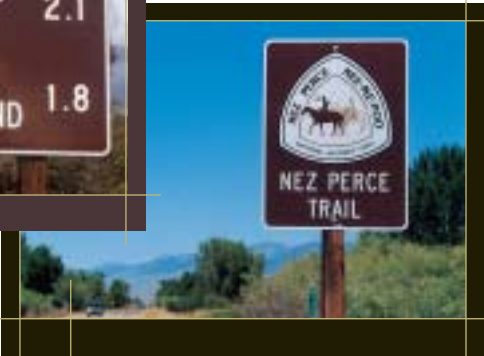
Roadway signs include guide signs, route markers, regulatory signs, and warning signs. These signs must conform to the “Manual on Uniform Traffic Control Devices” (MUTCD), which outlines standards for signs on all roads open to the public. Regulatory signs give notice of traffic laws and regulations. Warning signs call attention to conditions on or adjacent to the roadway that may be hazardous to the traveler. Guide signs show route designations, destinations, distances, services, and points of interest. Byway route markers identify the route, reassure motorists they are on the byway, and reinforce the byway image.

These signs must be legible and easily understood by travelers in order to give them enough time to respond. Design formats for regulatory and warning signs have been set by the MUTCD. All signs and their supports should be designed to meet breakaway safety criteria using aesthetically pleasing materials. Measures can be taken to blend the back of signs into the landscape, such as painting the back of signs dark brown or green.



Recreation symbols quickly inform visitors of type of attractions and facilities located ahead.

*McPhee Recreation Area, CO*



The bold design of this historical marker assures travelers they are on the designated route.

*Nez Perce Trail, ID*



Colorado has chosen to use the same logo to identify all of its scenic byways.

*Top of the Rockies, CO*



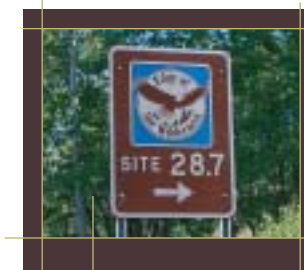
This famous byway uses its route designation along with the State byway logo.

*Historic Route 66, AZ*



This logo is an easily identifiable route marker that helps visitors navigate the byway.

*Seaway Trail, NY*



Interpretive signs along the route are identified by this byway's route markers.

*Edge of the Wilderness Scenic Byway, MN*

*Log guardrails blend with the forested environment.  
McKenzie Pass-Santiam Pass National Scenic Byway, OR*



*A simulated-stone guardrail is an aesthetically pleasing alternative to jersey barriers.  
Beartooth Scenic Byway, MT*



*Steel-backed wooden guardrails are used to replicate the look of historic guardrails.  
Blue Ridge Parkway, VA*



*Cable guardrails are unobtrusive in this rural setting.  
Glacier National Park, MT*

## Traffic Barriers

The type of traffic barriers you choose is an important consideration along scenic byways. Barriers help prevent motorists from striking a more hazardous object or from sliding down a steep slope. However, since these structures line the roadway, they also influence the scenic quality.

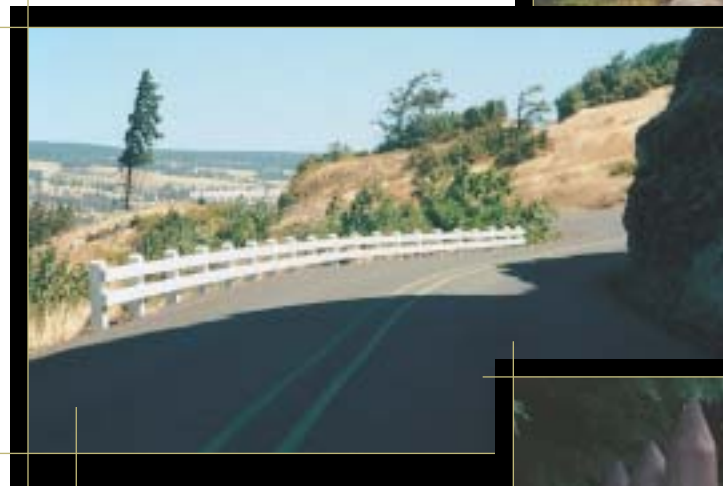
Several aesthetic alternative barriers have been designed and tested to complement the natural landscape or reflect an architectural theme better than traditional barriers. Naturally weathering steel guardrails may be an improvement over the highly reflective galvanized rails. Other choices include wood rails with steel backing, stone walls



with a concrete core, precast simulated stone guardrails, and glue-laminated wood guardrails. All have been crash tested and approved by the FHWA.

Barrier standards and designs along high-volume roads or freeways do not always apply to low- to moderate-volume roads. Roadside berms can be another alternative. Work with transportation engineers to select the best alternative for the type of road and location.

Stone walls can be used instead of guardrails to blend with other structures along the byway.  
*George Washington Memorial Parkway, VA*

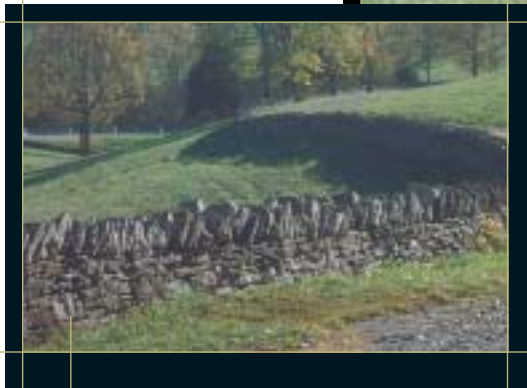
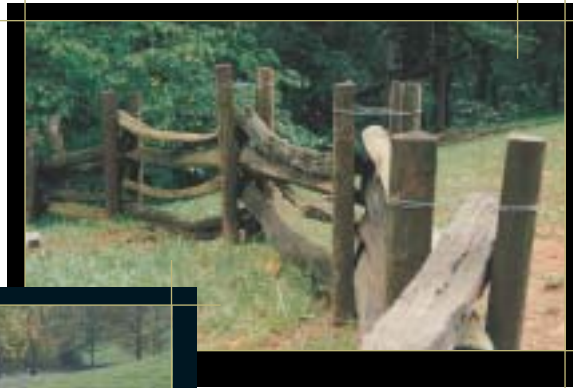


*Bolts and scoring add nice details to this gate.*  
*Historic Columbia River Highway, OR*

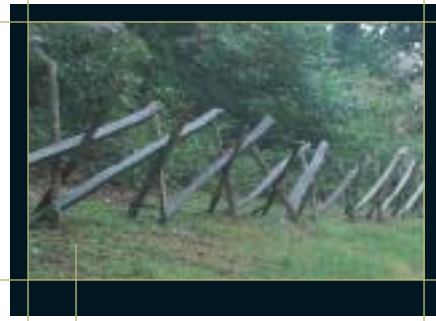
*To replicate the look of the original guardrails, steel-backed, wooden guardrails were designed and crash-tested to meet safety standards.*  
*Historic Columbia River Highway, OR*

*Heavy log construction and pointed post tops are similar in design to historical details on the fort.*  
*Fort Clatsop National Memorial, OR*

A variety of rustic wood fences illustrates the ingenuity of the inhabitants of the area.  
*Blue Ridge Parkway, VA*



Dry-laid stone fences with a distinctive course of angled stone have been traditionally constructed with field stone from this region.  
*Lexington, KY*



This unusual rustic wood fence is an interesting visual element against the forest understorey.  
*Blue Ridge Parkway, NC*

## Fences and Walls

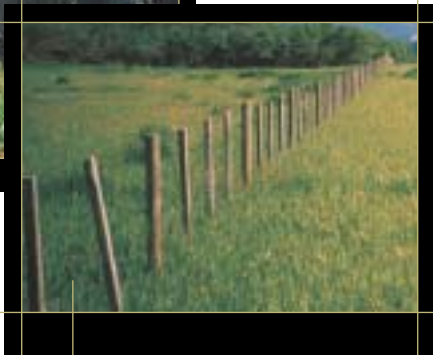
Fences and walls can make a positive contribution to the character of byways. Sometimes they are one of the defining features of an area, such as the white horse fences of Kentucky or the stone walls of Kansas. There are almost as many types of fences and walls as there are applications for them. The design of these barriers should not only consider the function, but also the aesthetic qualities of the landscape in which they are located.

The design should reflect the landscape context and/or the design theme of the byway. Compatibility can be enhanced by using materials characteristic of the area or of nearby structures or developments.

Human scale is critical, especially where people will be in close proximity. Large, obtrusive barriers can dominate views. The relationship between the height, the width of panels, and the post sizing are important considerations.

Poorly designed and constructed fences and walls can detract and even dominate the scenery along a byway. On the other hand, if sensitively planned, designed, and constructed, they may complement their surroundings by dramatizing selected views and adding interest to the landscape.

*This historically accurate wattle fence uses natural materials from the site to contain livestock.  
Malheur National Wildlife Refuge, OR*



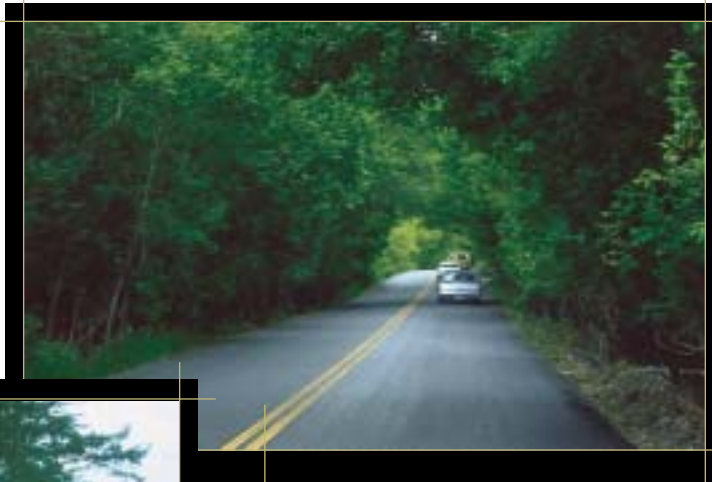
*Simple wood and wire fences show ranching heritage.  
San Juan Skyway, CO*



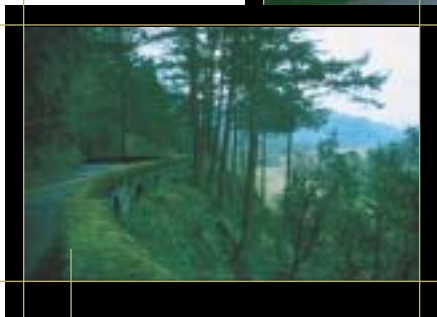
*This double post-and-rail fence fits well into its setting.  
Upper San Juan River Valley, CO*



*Rustic split-rail fences are consistent with the rugged landscape and ranching history.  
Beaverhead National Forest, MT*



*The intertwining branches that form a tunnel are one of the memorable features of this road, the Alpine Loop. Uinta National Forest, UT*



*Trees are pruned to give motorists a glimpse of the river and distant slopes. Historic Columbia River Highway, OR*



*Trees were cleared beyond the wall to provide vistas of the White Mountains at this newly constructed overlook. Kancamagus Scenic Byway, NH*

## Vegetation

Vegetation management can be used to enhance the scenic quality of a byway and to screen elements that detract from the scenic quality. Vegetation can also be integral to the visitor's experience by providing a variety of spaces for the motorist to pass through.

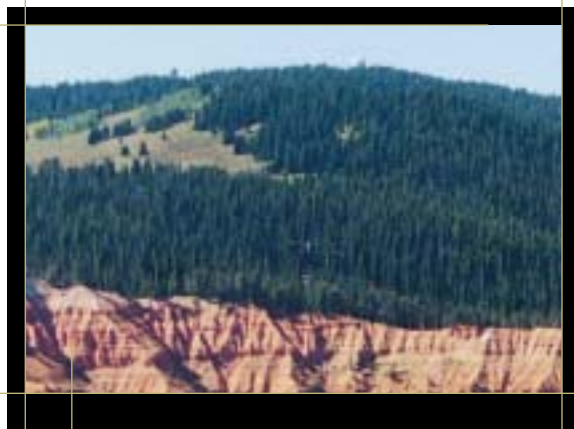
Traveling through ancient trees that provide a canopy across the road or bursting through a tunnel of shrubs into a wide, grassy meadow can be a memorable experience. The change of seasons can draw visitors to your byway at different times of the year to see fall color, play in the snow, or cool down in the shade of the forest.

Vegetation management begins with a thorough inventory of the plant communities within the corridor, their health, and their contribution to the scenic quality of the byway. Be aware of areas where vegetation impedes sight distances. Identify opportunities where management may improve the health or variety of plant communities. Look for places where vistas can be created by thinning trees to open up views.

## Visual Mitigation

Visual mitigation is used to reduce the impacts of existing or proposed features that detract from the scenic quality of your byway. There are a wide variety of unsightly features, including some retaining walls and drainage structures, utility poles, cell phone towers, or pipelines.

Mitigation can be achieved through a variety of methods. Features such as retaining walls can be surfaced or textured to appear like native rock. The impacts of rock cuts can be minimized by staining. Colors for utility poles can be chosen so they blend with vegetation. Clearings for utility corridors can be cut so they mimic natural patterns in the landscape. Where possible, features can be located so they are screened from the road corridor.



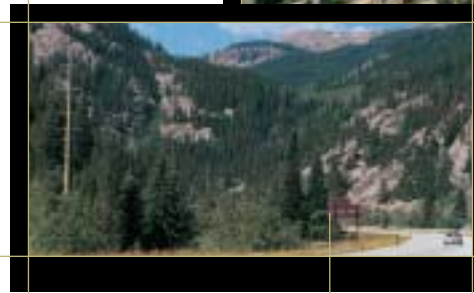
Two radar towers are visible on the ridge that can be seen from a national monument and two scenic byways. The new doppler radar tower was placed lower on the ridge and colored green to blend into the surrounding forest.  
*Dixie National Forest, UT*



The backs of signs are painted a color that blends into the scenery and prevents glare.  
*Zion National Park, UT*



This dam uses native stone and a stepped design to lessen its visual impact.  
*Blue Ridge Parkway, VA*



To blend powerline corridors with the landscape, utility poles were painted dark green and vegetation clearings have uneven edges. The backs of the signs are painted to reduce contrast.  
*White River National Forest, CO*

A microwave tower shaped like a tree blends into the forest ridge.  
*Kauai, HI*



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# The Challenge

4x8  
channel

170

## *The Challenge*

Now what? This design guide has given you an introduction to the planning process and the design considerations necessary to provide visitors with quality facilities that fit the character of your byway. The examples may have given you ideas for some particular projects. Now it's time to talk with your constituents and enlist design professionals to help you create facilities that are integrated into the landscape and provide visitors with amenities that enhance their experience. The time you spend in careful planning and design will help preserve the special qualities of your byway and make traveling it a more enjoyable experience for your visitors for years to come.





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An aerial photograph of a road winding through a hilly, forested landscape. The road is shown in a dark color, and a section of the road shoulder on the right side is highlighted in a bright orange color, indicating a project area for improvement. The surrounding terrain is covered in dense vegetation, and the overall scene is captured from a high-angle perspective.

# Scenic Byways

A Design Guide for Roadside Improvements