



## Coronado Trail

# CORRIDOR MANAGEMENT PLAN



**Arizona Department of Transportation  
Environmental & Enhancement Group**

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## Introduction

Dedicated at Hannagan Meadow in 1926, the now internationally renowned Coronado Trail Scenic Byway was the first federal aid highway in the United States. The road has survived its apocalyptic designation as US Route 666 (1938-1992). Even so it may yet deserve the old number. It still snakes tortuously, often treacherously, and always relentlessly through one hundred and twenty three miles of the rugged Mogollon Rim. It also has the reputation of being the least traveled federal highway in the nation.

The Coronado Trail rises in the south from the vast open pits of the Morenci copper mine in the Sonoran Desert. As it winds its way northward, it exposes travelers to a dazzling display of different biotic community life zones and spell-binding scenic promontories. There are sweeping overlooks of the moody forests of the Blue Range Primitive Area (federal land set aside for preservation in 1933; environmental context for the ideas of Aldo Leopold) to the East, and panoramic views over the mysterious canyons and forested ridges of the White Mountains on the West. In the north it cruises through a rural alpine setting south of the ancient volcanic fields at the southwest edge of the Colorado Plateau near Springerville.

In northern reaches, the corridor presents a sequence of intimate meanders through mountain valleys and meadows reminiscent of imagery from the motion picture *Sound of Music*. Much of the central part of corridor is open range. It provides a near-idyllic passage to the scenic drama of southern reaches.

The South end of the corridor challenges travelers with an extended, intensely kinetic touring experience – over sixty miles of sheer slopes with narrow shoulders and no guardrails. This southern reach presents over four hundred twisting curves and switchbacks as it climbs and plunges and careens through the mountains. The entire corridor is located in east-central Arizona (Figure 1).

Almost all of the Coronado Trail Scenic Byway lies within the Apache-Sitgreaves National Forest. From this central forest-lined roadway the U.S. Forest Service provides public access to an inimitable array of opportunities and facilities for hunting, hiking, climbing, camping, biking, horseback riding, and fishing. Other recreational



Sixty miles of roadway with over four hundred switchbacks



Quiet mountain meadows line northern reaches





One of many arresting panoramas

opportunities accessible from the corridor include golf, wildlife observation, archeological appreciation and exploration, and some of the best cross country skiing in all of Arizona. Scenery and viewsheds are incomparable. Typically, a roadway climb of 1000 feet is equivalent in changed flora and fauna to a trip northward of some 600 miles. In the first 60 miles from the south end, vegetation dramatically turns from palms to pines as the Trail ascends nearly 5,000 feet from semi desert to sub-alpine terrain. This change would tantamount a trip 3,000 miles north or a four-day journey from Mexico to Canada.

The “Devil’s Highway” touring experience has within the last four years alone attracted thousands of cycling enthusiasts from all over the United States – from New Orleans, West Virginia, Oklahoma, New York and Illinois – as well as from as far away as Germany and Nova Scotia. Internet based [Motorcycle Roads](#) gives the Coronado Trail scenery and road quality a five star rating. Another event calendar, this one catering to women motorcyclists, warns that the Coronado Trail ride is for “...experienced riders with at least three years of routine riding experience.”

One young woman reported her impression as follows:

“...just past Hannagan Meadow, I rounded a curve and just about fell off the motorcycle in amazement. I was on the edge of the world, five feet from the steep-est and longest drop-off I’d seen in a very long time, and I could see forever in the clearing weather. The mountain ridges rose in an endless succession, the more distant ones in paler and paler shades of blue. Simply astounding. I stopped the bike and just stared.

Once over my amazement, I realized that about 100 feet ahead of me was a scenic overlook, so I rode the short way to the tiny parking lot, turned off the bike, dismounted and grabbed my camera. There’s no way to capture that scene on film, though, unless you’re a brilliant photographer, and I’m not. This is called the Blue Vista overlook, and I’m not sure if that’s because the view really is blue, or because from part of it you can see the Blue Mountains.”

*Amanda Hargis, 2001*

The Coronado Trail was designated as a State Scenic Byway in 1989. The “Scenic Road” designation by the Arizona Department of Transportation is described as:

- 81.74 miles of U.S. Route 191 (formerly U.S. Route 666) from MP 253.74 at Alpine, Arizona to MP 172.00 near Clifton/Morenci, Arizona
  - 20.39 miles of U.S. Route 180 from MP 406.00 near Springerville/Eager, Arizona to MP 426.39 at Alpine, Arizona.
- In 1990, the route was also designated as a National Forest Scenic Byway. The southern terminus of the state-designated route is now located several hundred yards north of a public overlook within the vast Morenci Mine.



Another promontory on the Trail





The Forest Service anchors recreation in the north at Nelson Reservoir and provides special wildlife protection in the higher central elevations. The gargantuan Phelps Dodge open pit copper mine at Clifton-Morenci provides a southern bookend for the corridor.

### **Purpose of Corridor Management Plan**

The purpose of the Coronado Trail Scenic Road Corridor Management Plan is to provide a guide for the future preservation, protection, and enhancement of this nationally significant roadway corridor. The intent of the plan is to facilitate improvements, while conserving the unique character of the route. By providing attainable goals and visions for the future of the Byway, the plan sets out a strategy that will ensure the Byway's legacy for generations to come.

The Arizona Department of Transportation and the Federal Highway Administration are sponsoring the preparation of this Corridor Management Plan (CMP). Designation under the National Scenic Byways Program as a National Scenic Byway could provide numerous benefits to outdoor enthusiasts, tourist and local residents who live and work along U.S. 191/U.S. 180 in Arizona. National recognition and access to marketing networks will support residents, municipalities and agencies in maintaining the integrity of the Coronado Trail Scenic Road and its associated intrinsic qualities.

The purpose of the National Scenic Byways Program is to preserve and protect our nation's scenic byways and to promote tourism and economic development. The National Scenic Byways program was created in 1991 through the Intermodal Transportation Efficiency Act (ISTEA).

Scenic Byways are nominated for consideration in the National Scenic Byways program locally. The federal government takes no part in identifying potential designees. Participation in the National Scenic Byways Program is voluntary and encompasses any public road or highway.

To be designated as a National Scenic Byway, a road must possess at least one of six intrinsic qualities – scenic, historic, natural, cultural, recreational, or archaeological. The significance of the features contributing to the distinctive characteristics of the corridor’s intrinsic qualities must be recognized throughout the region.

Designation as a National Scenic Byway requires the development of a CMP to encourage and oversee the enhancement, development, promotion, interpretation and the long-term management of the corridor. Initiated by the Federal Scenic Byways Program, corridor management planning is a process by which communities gain a thorough understanding of a designated scenic or historic byway. The CMP itself is the resulting document. It records the route’s existing conditions and the intrinsic qualities that draw residents and visitors to the corridor. It describes strategies to preserve and enhance those qualities.

This plan was completed in conjunction with stakeholders and citizens who live and work along the corridor to ensure that the goals of the plan reflect the priorities of the communities connected with the Coronado Trail Scenic Road.

**Coronado Trail Scenic Road Public Involvement and Advisory Committee**

Public Involvement

The development of this CMP involved collaboration with agencies, communities, and local organizations. The Scoping Phase of this project was used to identify the appropriate stakeholders (both agencies and community leaders) associated with the Coronado Trail Scenic Road. It helped define the public involvement program, identified areas of responsibilities, developed a preliminary outline for the CMP, gathered relevant project information, and prepared an initial project schedule.

The Project Team organized and held several agency and community scoping/workshop meetings in major communities along the project corridor. Multiple meeting times were established to provide the best opportunity to meet with the general public and key stakeholders, including local governments, chambers of commerce, tourism-related entities, and federal resource agencies. The meetings were publicized by means of news releases, public service announcements, flyers, newspaper advertisements, phone calls, and postcards sent to businesses and residents along the route. A webpage was used as a catalyst for the development of the CMP document. The webpage is [www.coronadotrailcmp.us](http://www.coronadotrailcmp.us).

**Table 1. List of Public Meetings**

Town	Date
Alpine	4-9-03
Morenci	4-10-03
Clifton	11-16-04
Springerville	11-10-04

**Table 2. List of Conference Call Workshop/Committee Meetings**

Topic	Date and Time
Visions and Goals Workshop	1/11/05 2 PM and 7 PM
Intrinsic Qualities/Route Storytelling Workshop	1/12/05 2 PM and 7 PM
Future Projects Workshop	1/13/05 2 PM and 7 PM

An advisory committee has been formed as the working arm of the Coronado Trails Scenic Road CMP. The committee will be subdivided into four task forces to address the following areas: Vision and goals, signage, intrinsic qualities, and funding and marketing. Members of the taskforces are representatives from both the public and private sectors (see Table 3.).

**Table 3. Coronado Trails Scenic Road CMP Advisory Panel**

Vision, Goals, and Administration Task Force	Roadway issues Task Force	Intrinsic Qualities Task Force	Funding & Marketing Task Force
Kay Dyson	Peggy Gladhill	Darwin Crezee	Paul Rietz
Elaine Zieroth	Tony Castillo	Richard Powers	Mary Beager
Michele Davalos	Bill Harmon	Owen Martin	David Newlin
Don Hoffman	Paul David	Brian Musser	Marnie Uhl
Bob Clark		Rick Davalos	
		Barbara Romero	
		Sherrie & Paul Rietz	

Key stakeholders are represented on the Advisory Committee, as follows:

The U.S. Forest Service:

- o Elaine Zieroth, Forest Supervisor, Apache-Sitgreaves National Forest



- Michelle Davalos, Recreation Program Manager, Apache-Sitgreaves National Forest
- Owen Martin, Recreation Staff, Clifton District, Apache-Sitgreaves National Forest
- Rick Davalos, Alpine District Ranger, Apache-Sitgreaves National Forest
- Barbara Romero, Springerville, Apache-Sitgreaves National Forest

Arizona Department of Transportation

- Bill Harmon, Maintenance Engineer, ADOT Safford District
- Paul David, Development Specialist, ADOT Safford District

Local Government

- Kay Dyson, Mayor of Springerville

Travel Services Industry

- Sherrie & Paul Rietz, local campground owners

Touring and Event Promotions

- Bob Clark, motorcycle events promoter and coordinator

Special Interest Groups

- Don Hoffman, Arizona Wildlife Coalition
- Marmie Uhl, Springerville-Eagar Regional Chamber of Commerce

Interested Citizens

Mary Beager, Tony Castillo, Darwin Crezee, Peggy Gladhill, David Newlin, Richard Powers

## Vision Statement, Goals and Objectives

### I. Vision Statement

#### Our Vision:

The Coronado Trail Scenic Road is preserved, maintained and improved in a manner that protects its intrinsic qualities. The corridor is interpreted and promoted in ways that enhance understanding and appreciation of the unique scenic, natural, recreational, cultural, historical, and archaeological resources of the corridor for residents, newcomers, and visitors alike. The highway serves as a vital link between key communities of different sub regions served by the corridor and National Forest lands along the route, and provides direct access to diverse natural resource opportunities within eastern Arizona.

This CMP should provide comprehensive guidelines for the preservation, protection and enhancement of the Coronado Trail Scenic Road corridor and identified intrinsic qualities, to facilitate the promotion and of the unique natural and historic resources and cultural history for the benefit of travelers, tourists and communities located along the roadway.

### II. Goals/Objectives

#### **Goal #1 -- Protect, conserve and enhance the resources found along the corridor for present and future generations.**

#### Objectives:

1. Develop strategic management guidelines to maintain and enhance recreation opportunities and interpretative and touring experiences to anticipate more intensive future public uses of the corridor.
2. Improve collaboration and resource sharing relationships between resource management agencies, municipalities, public interest groups, private enterprises, and interested citizens to promote and market the Coronado Trail Scenic Road and its associated qualities.
3. Develop more effective marketing information and distribution networks for the corridor as a whole.
4. Provide suggestions about effective transitions in visible changes in land management systems, wayfinding, physical and interpretive systems from one segment of the corridor to the next.
5. Review the need to supplement the database of intrinsic qualities no less frequently than annually.
6. Provide a regular time, no less frequently than quarterly, for Advisory Committee progress review meetings.
7. At each quarterly meeting specifically address the question of how advisory committee work could be made more effective by recruiting new members, and how advisory committee recommendations might more effectively be incorporated into planning and decision making activities of major stakeholders and government agencies.

**Goal #2 -- Maintain and improve roadway conditions optimally to accommodate travelers on a year-round basis.**

Objectives:

1. Develop a strategy and implementation schedule to address roadway safety and maintenance issues along the entire length of the corridor.
2. Assemble and organize data to support the proposition that contemporary highway design standards should not arbitrarily be applied to the Coronado Trails roadway, either in improvements planning or in review of its qualifications for other improvements resources.
3. Review overall roadway condition and maintenance capability no less frequently than annually. Make such recommendations about improvements and maintenance activity as may from time to time be deemed appropriate.
4. Create an effective system of communication to support access to and delivery of public safety services in emergency situations.
5. Improve multi-agency emergency response system capabilities and incorporate information about the capabilities into regional marketing systems.
6. Provide more effective ways to exclude vehicles without special use permits from those segments of roadway where highway geometry or height restrictions will not accommodate them; recommend better ways to accommodate commercial traffic with other roadway users, including segments where wider shoulders are needed and spots where new pull off facilities would be appropriate.
7. Enhance weather and emergency warning systems for corridor travelers.
8. Develop partnerships and shared funding opportunities between federal and state agencies for roadway improvements, routine maintenance and emergency service delivery capacity.

**Goal #3 -- Maintain and improve existing interpretive and educational facilities so that residents and visitors may enhance their knowledge and develop an appreciation for the unique natural, cultural, and historic features in and along the highway corridor.**

Objectives:

1. Organize a task group with the specific responsibility for identifying, prioritizing and securing funding to improve existing interpretive and educational facilities, giving specific consideration to the need to add bilingual text and / or international wayfinding symbology.
2. Update the existing auto tour interpretive tape transcript and prepare it for distribution in multiple formats (e.g. mp3, CD, cassette, brochure), coordinating same with other interpretive and wayfinding materials and facilities.

3. For those parts of the alignment that cross mining excavations, create an imaginative interpretive plan – complete with suggestions about facilities, signage, brochures, etc. – which:
  - a. Explains the shifting alignment travel inconvenience in relation to the significance of the mines to the history of the state, and the importance of mining activity to the economy of the region.
  - b. Demonstrates environmental compliance and mitigation activity on the part of the mining company.
  - c. Contributes to an effective transition between the mining areas and the forested areas immediately north.
  - d. Integrates the mining presence into other major interpretive themes for the corridor.
4. Link interpretive and educational facilities projects with vision, strategy, and design criteria developed in the USFS Land Management Plan and in appropriate ADOT and BLM project plans, as feasible and appropriate.
5. Create and commission ad hoc teams to generate specific proposals for themes and projects at points along the corridor where interpretive installations would facilitate transition from one area to the next.
6. Convene a task force with representatives from affected federal and local agencies and various travel service sectors, to examine claims that the interests of effective corridor management would well be served by :
  - a. extending the south end of the corridor to include Clifton; or
  - b. extending the south end of the corridor through Clifton and Three Way to an intersection with the Old West Highway in Duncan or Safford; and
  - c. extending the north end of the corridor through Springerville and Eagar to Casa Malpais (nominated in Congress as a national archaeological monument.

**Goal #4 -- Develop a strategy to improve/extend secondary roads, trails and trailheads along the Byway to enhance visibility for opportunities and enjoyment of the highway and associated resources.**

Objectives:

1. Assess the adequacy of roadside observation facilities and trailhead and campground connections at the roadway to support increased traffic and use. Prepare an assessment report and distribute the report to corridor stakeholders and regulatory agencies for review, comment and endorsement.
2. Organize a task group with the specific responsibility for identifying, prioritizing and securing funding to improve existing facilities.
3. Prepare a feasibility study for each proposed spot.
4. Link interpretive and educational facilities projects with vision, strategy and design criteria in the USFS Land Management Plan.



**Goal #5 -- Foster awareness of the rich multi-cultural heritage of the region served by the roadway and how community participation in planning can preserve and enrich that intrinsic cultural value for future generations:**

*Objectives:*

1. Sponsor periodic community and regional workshops, conferences and seminars designed to stimulate exchange, sharing, preservation and dissemination of historical, cultural and archaeological information in multi-cultural forums and formats.

## Corridor History

The Coronado Trail was America's first federal aid highway. The Bureau of Public Roads (BPR) built the road with Forest Service funds approved in 1916. Surveying began the same year funds were appropriated and was completed in 1917, with an adjustment in 1922. That portion of the alignment north of Hannagan Meadow had engineered curves. The alignment south of Hannagan Meadow was laid out mostly as the terrain would permit. Actual construction did not begin until 1923. Work ended in 1926. The one-lane alignment was a compacted dirt surface paved with volcanic cinders. It had extremely steep grades and numerous rocky protrusions. Most of it was so narrow that traffic meeting head-on had to compromise and back up to an area wide enough to pass. Nevertheless the *Arizona Gazette* (now the *Arizona Republic*) described it as a "most splendid highway" with potential for summer tourist attraction and a distinct benefit for ranchers and stockmen.

The new road was first called Forest Highway #19. However it was dedicated as the "Clifton to Springerville Highway" in June, 1926, at a Hannagan Meadow gala. Clifton Mayor Peter Riley served as the chairman of the event, which was managed by the U.S. Forest Service with money collected for the special use permit. Phelps Dodge contributed a monument with an inscription plate cast from copper out of the smelter in Clifton. More than 5,000 people attended.

Celebration activities at the dedication included free barbecue with 25¢ soda pop, a "devil dance" performed from sunset to sunup by 125 White Mountain Apaches, a rodeo that featured a bear roping contest, dancing to a popular foxtrot tune performed by a band out of St. Johns, and a litany of speeches delivered by noted dignitaries. Among other prominent figures to address the celebrants were the incorrigible Arizona Governor "Woobly" P. Hunt (attired as usual in a white linen suit), the Apache National Forest Supervisor John D. Guthrie, Governor Hannett of New Mexico, and Capt. Joseph P. Hodgson of Phelps Dodge in Morenci. Keynote speaker Guthrie made a reference to the roadway as the "Trail of Coronado" and the nickname Coronado Trail was soon adopted throughout the region.

The right-of-way of the Coronado Trail was transferred to the State in 1928, when it was referred to as Arizona Route #81. During the Great Depression Era the WPA sponsored installation of some stone retaining walls and drainage headwall improvements for part of the corridor just north of Morenci. Later in the 1930's the roadway acquired the designation as U.S. Route 666 at the instance of the Canada-to-Mexico Highway Association. About the same time the alignment was rerouted to the west side of Rose Peak. Another lane was added

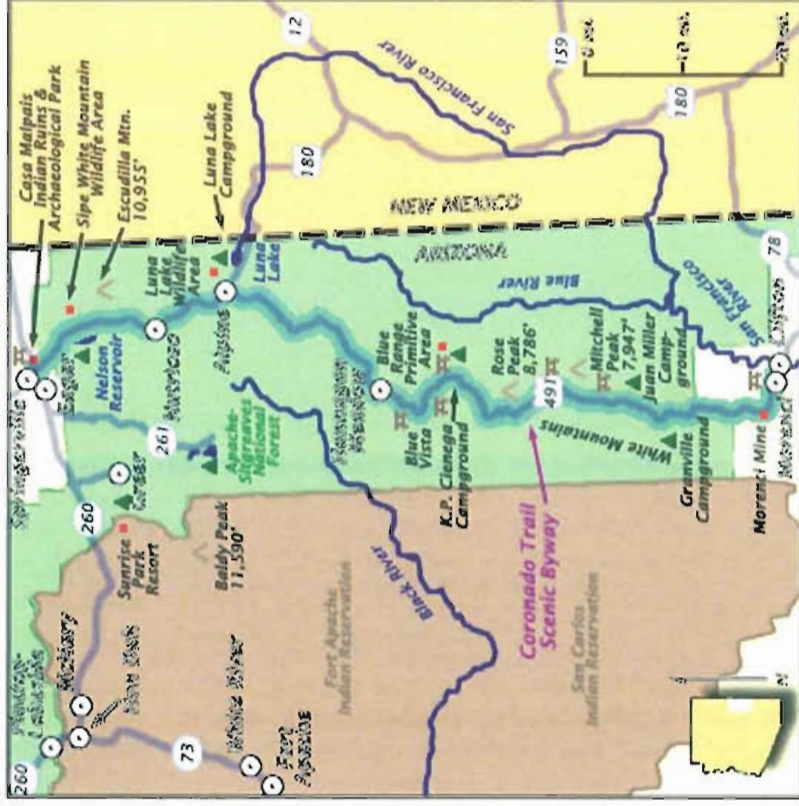


Figure 1 -- Coronado Trail Scenic Road

some years later. All weather paving for the entire roadway was not completed until 1962. Coronado Trail retained the designation "U.S. Route 666" until June 1992, when AASHTO approved a State request to renumber the route U.S. 191. The USFS nominated this portion of U.S. 191 (Coronado Trail) to the Arizona Department of Transportation as a State Scenic Highway in 1989. The USFS also subsequently obtained designation of the road as a National Forest Scenic Highway. Since that time the Clifton Ranger District helped to secure ISTEPA funds to install toilet facilities along the route at several roadside trailheads and campgrounds.

The roadway provides a route for tourists seeking the beauty of the forests and its wildlife, but few people -- either then or now -- have taken advantage of it. Often fewer than 100 cars a day use the highway. The reason partly lies in its remote location near the New Mexican border and partly because the drive is very slow going. It takes four hours or more to traverse its 123 miles of switchback after switchback, but the adventure is clearly worth the effort.

## **Existing Conditions.**

### **Transportation**

The Coronado Trail Scenic Highway is located in Greenlee and Apache Counties in Arizona. The majority of the road is located within land managed by the Apache-Sitgreaves National Forest. It passes through three different ranger districts (Springerville, Alpine, and Clifton) along the way. To the west of the National Forest are the Fort Apache and San Carlos Apache Indian Reservations and to the east is New Mexico. The Byway is surrounded by forest and numerous recreational opportunities, including the last primitive forest area in the country. This forested area could be considered to be the ecological matrix from which Aldo Leopold derived much of the ecological ethic he developed in *A Sand County Almanac*. He worked for the U.S. Forest Service in Eastern Arizona and New Mexico as a wildlife specialist for several years in the early part of his career as a wildlife ecologist.

In general, the Coronado Trail Scenic Highway is a two-lane rural asphalt concrete roadway with 2-12 foot travel lanes and an average of 2-foot-wide unpaved cleared shoulders. Due to the short turning radii along old Route 666, particularly south of Hannagan Meadow, access has been limited to vehicles under 40 feet in length. For law enforcement purposes, the length measure is made from the front bumper to the rear bumper. The DPS does not appear to have discretion to distinguish rigs with trailers whose total length would exceed 40 feet from vehicles with a single rigid element longer than 40 feet. This means that a pick up truck pulling a longish stock trailer, or a 36' RV towing a small vehicle would violate the regulation. This circumstance has been the source of consternation for some motorists who use the roadway.

Because the Scenic Highway is located in a mountainous area, horizontal and vertical curve deficiencies were observed throughout the majority of the corridor. As a result, passing opportunities are limited. The road is not maintained year-round and does not have guardrails. ADOT Safford District engineers are currently inspecting some of the Depression Era improvements to determine whether they should be replaced or redesigned. They indicate that archaeological values will be addressed as part of the review process.

**Roadway Traffic and Maintenance.**

Average Annual Daily Traffic Volumes for the Coronado Trail Scenic Highway have remained fairly constant over the past 5 years. Due to the remoteness of the area, traffic counts are only available for a few sections of the road.

Traffic management has become problematic during the big game hunting season. The hunters' vehicles crowd campground and trailhead parking areas, as well as narrow right of way zones off the roadway, and sometimes into the paved road itself.

A major fuel spill that occurred at Strayhorse Camp (MP 220) in 2004 highlighted the increased need for better traffic management facilities such as turn around spots. A private fuel tanker overturned and contaminated the soil in the right of way. The environmental cleanup involved removal of roadway pavement and base for several hundred feet. It was necessary to close the road to traffic for the duration of the cleanup effort, which lasted over two months.

Snow removal capability has been such that in some circumstances it has been necessary to close the road to all traffic between Hanagan Meadow and Morenci.

**Signage**

Billboard advertising does not present a visual problem along the Coronado Trail at this time. Nor are standard roadway and wayfinding signs needlessly intrusive or distracting. Approximately 90% of the corridor lies within the Apache-Sitgreaves National Forest, which prohibits installation of advertising billboards. Those areas along the corridor not regulated by Forest Service signage policy are governed by Arizona statutory law, with is enforced by monitoring team specifically authorized to remove non-conforming signage.

The more significant issue is whether wayfinding and interpretive signage is effective. The Forest Service has marked its roadside facilities with signs bearing information about permitted uses. However, a few of the signs have weathered to the extent they will need to be renewed. What is most noticeable is the absence of roadside interpretive displays that would explain the significance of the visible natural environment or the historical importance of landscape features to passersby.

This seems particularly important in that part of the corridor south of Blue Vista.

**Visual Intrusions.**

Other than the vast excavations at the Morenci mine and its related mining facilities, there is just one element in the corridor that might be considered to be a significant visual intrusion. It is the ADOT maintenance yard at Grey's Peak (MP 186.0).

**Average Annual Daily Traffic Volume\***

Route Section	1997	1998	1999	2000	2001
U.S. 191. near Rose Peak Ranger Station Road	95 aadt	98 aadt	71 aadt	74 aadt	77 aadt
U.S. 191 North of Rose Peak Ranger Station to Alpine	105 aadt	108 aadt	67 aadt	69 aadt	73 aadt
U.S 191 from SR 260 south to U.S 180 split	1,373 aadt	1,322 aadt	1,328 aadt	1,377 aadt	1,447 aadt

\*aadt = average annual daily traffic

Note: these data may not include bicycles and lightweight motorcycles, whose total weight could be insufficient to trip the automatic traffic counter lead.



The yard appears to be orderly and well maintained. However it was positioned in the landscape so that it is the dominant visual element in the viewshed from several different points along the roadway. Carefully placed vegetation screens might reduce the intrusive impact of the facility, but some travelers indicate that the presence of the facility offers a kind of comforting relief from the intensity of the wilderness roadway experience. Thus it is not clear whether the facility is in fact “intrusive”.

The only other noteworthy “visual intrusion” would not be considered as intrusive by everyone. Low overhanging and spreading branches of trees at the edges of some of the U.S. Forest Service overlooks obscure panoramic views into the forests and mountain regions beyond.

## Historic Development

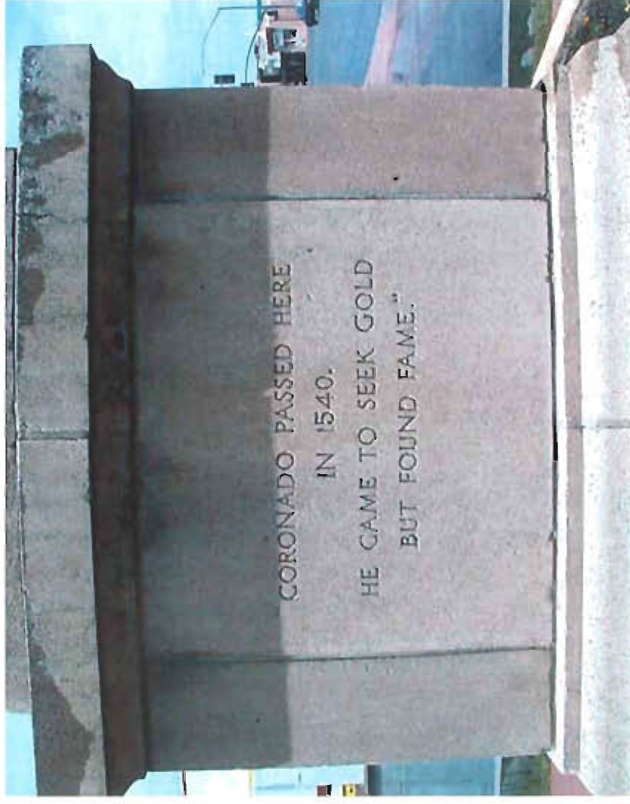
The route traverses Greenlee County and a portion of southern Apache County in east-central Arizona. The region possesses a long colorful and turbulent history.

Legend has it that seven bishops and their congregations set sail to the New World during the Moorish invasions of Spain and founded seven cities of gold. These cities later became known as the “Seven Cities of Cibola”. In 1540, Francisco Vasquez de Coronado led some 300 Spanish soldiers and about 1,000 Tlaxcalan Indians through mountains of eastern Arizona searching for the golden cities, and with them, fame and fortune. Following ancient trade routes and trails of earlier explorers, it is believed that Coronado and his men crossed from Mexico into present day southern Arizona by traveling along the San Pedro River. They then followed the Gila River and crossed through the mountain wilderness of the Colorado Plateau and the upper drainage of the Little Colorado River near present day St. Johns. They came to the Zuni River on the east-central border of present day Arizona and crossed into New Mexico to capture the first town of “Seven Cities”. Other than provisions needed for physical survival, he found nothing there except natives willing to fight for the survival of their pueblo community.

Coronado returned to Mexico frustrated and bankrupt. He and his fellow adventurers had explored vast stretches of the rugged wilderness of the American Southwest, looking for cities they would never find, oblivious to deposits of gold and silver and vast fields of copper ore embedded in the earth beneath their feet. They abandoned the lands of Eastern Arizona to another group of newcomers to the region– the nomadic clans of the Apache culture. These groups, along with the Navajo peoples are believed to have migrated southward from Western Canada.

Roaming bands of Apache warriors and their families took Southeastern Arizona for hideout, heartland and stronghold during the Sixteenth Century. Apacheria was surrounded by the lands of the Pima and Tohono O’odham to the West, Yavapai and Mohave to the Northwest, Navajo and Hopi to the North, Zuni and Comanche to the East, and the northern provinces of New Spain to the South. The Apaches survived in part by raiding their neighbors for provisions, horses, and captives, endearing themselves to none in the process.

The decline of Apache hegemony in Southeast Arizona began in 1848 with the Mexican Cession to the United States of all land north of the Gila River, the Gadsden Purchase in 1853 of all land south of the Gila to the 31<sup>st</sup> Parallel, and reports of the discovery of precious metal Southern Arizona. Anglo prospectors discovered silver deposits in 1853 at Tubac (south of Tucson), and gold a few miles northeast of Yuma in 1860. The prospect of gold and silver lured thousands of treasure seekers into the region. Many of these Argonauts entered the Arizona Territory by way of the Gila River, through the heart of Apacheria.



Territorial status brought the U.S. Army and a network of forts, rough-hewn roads and army outposts. The soldiers and the forts brought a measure of stability to the frontier. Along with American military presence came new markets for horses, provisions, freight carriers and entertainment. New markets and better security brought more settlers and miners. The influx of Anglo “intruders” into Apacheia provoked more treachery, more deceit, and more violence. More confrontations and unrest brought more soldiers. An so on. The last significant battle between a band of Apache warriors and the United States Army on Arizona soil took place in 1882 at East Dry Creek. But it was not until the spring of 1886 in Sonora, Mexico, that organized Apache resistance was at last subdued by force of arms. Geronimo, said to have been born near the site of present-day Clifton, surrendered to General Nelson Miles for the fourth and last time in the mountains of Southeastern Arizona in September of that year.

### **Greenlee County**

Sustained development of Greenlee County began after the American Civil War, when the natural resources in the region attracted ranchers and prospectors. The waters of the Gila, San Francisco and Blue Rivers and many of the grassy ranges attracted many ranchers in the early 1880's. Fred Fritz of Texas was one of the first to bring cattle to the region in 1888. By the turn of the century other ranchers had located on the confluence of the Blue and San Francisco Rivers. Along Eagle Creek, a Kansas City investor located the Double Circle Ranch, which was reputed to be one on the largest in the area covering nearly 1,200 square miles and grazing 20,000 head of cattle. Many of these areas are still open range.

*Clifton (33 ° 3 'N, 109 ° 17 'W; elev. 3,512 ft); Morenci (33 ° 05 'N, 109 ° 22 'W; elev. 4,350 ft)*

In 1864 a prospector named Henry Clifton rediscovered a vein of copper at an old Mexican mining site near the present site of Morenci, but he thought the area too dangerous to stake a claim. Sometime later, Bob Metcalf found copper deposits near present day Clifton during a scouting mission for the Army against Cochise and his Apaches. In 1870, six years after the initial discovery, he staked a claim to an outcrop of copper ore a few miles north of the confluence of Chase Creek and the San Francisco River. Then he sold his claim to two merchants, Henry and Charles Lesinsek. They built a smelter in a canyon on Chase Creek to insure an abundant water supply for mining operations, formed the Longfellow Copper Mining Company, and hired Mexican miners experienced in copper smelting. By 1872 the smelter site had become the town of Clifton. Clifton grew rapidly and attracted a diverse population that grew to nearly 5,000 people.



Old Chase Street in Clifton



In 1883 Scottish capitalists organized the Arizona Copper Company and constructed a railroad called the Arizona and New Mexico, connecting Clifton with Lordsburg, New Mexico and the Southern Pacific Railroad. Phelps Dodge Corporation, a major American export company operating out of the Northeast, purchased the Detroit Mining Company in Morenci in 1887 and assumed control of their operations. By 1912 these companies had established Clifton as the leading copper producer in the nation.

Copper prices plummeted after the end of World War I. Whereupon, in 1921, the Arizona Copper Company sold out to Phelps Dodge. After mining all the high grade ore pockets, Phelps Dodge turned to the development of lower grade ore during the late 1920's and adopted open pit and strip mining methods. The efforts of Phelps Dodge were crippled in the 1930's by the great depression. Clifton's population fell to 1,300 people during that period. World War II spurred resurgence in mining activity, when the demand for copper products increased. Phelps Dodge moved its milling and smelter operations to Morenci to be nearer the open pit and relocated the company town to another location. Since the 1940's the Morenci mine has become the major copper producer in the United States.

Mining operations in the Clifton-Morenci area have provided the context for several milestones in the history of labor-management relations. Principal among them are these: (a) the first American labor strike initiated by Mexican-American miners (June, 1903); (b) use of the National Guard to prevent the use of strikebreakers, and elimination of wage differences between Anglo and Mexican workers (September 1915-February 1916); and (c) rendering the strike ineffective as a bargaining tool in labor-management negotiations in the mining industry. (June 1983 – December 1985)



Reproduction of part of labor protest painting for the strike at Morenci in 1983





View of Vast Open Pits Of Morenci Mine



Old Ranch Buildings in Central Area of Corridor

### ***Apache County***

The settlement and development of Apache County by white settlers began in the 1870's. In 1879 it was officially created out of Yavapai County and was named for the Apache Indians of Arizona and New Mexico.

*Springerville & Eagar (34° 15' N, 109 ° 29' W; elev. 6,968 ft).*

Springerville-Eagar area is located about eight miles away from the north end of the Coronado Trail Scenic Road. It was built in the middle of a volcanic field about the size of Rhode Island. The Springerville area was originally settled prior to 1871 by Mexicans who named the area "Valle Redondo" or Round Valley as it is known today. The original town site was called Omer by the Mormon settlers. Springerville was named for merchant Henry Springer



Nutrioso Post Office Built by WPA during the Great Depression

who in 1875 established a store west of Omer. In less than one year Springer went broke by extending credit to outlaws. The Mormons eventually relocated Omer to Eager and the name of the existing town site was changed to Springerville. Springerville's most prominent merchants were Julius and Gustav Becker who arrived in 1876 and opened a freighting business. Gustav's son, Julius W. Becker, was instrumental in seeking to establish the nation's first transcontinental highway (U.S. 60) thru Springerville.

*Nutriosio (34 ° 57' N, 109. ° 12' W; elev. 7,783 ft).*

Nutriosio was established by Mormon settlers in 1875 at the southern end of what was known as Dry Valley. The area became a haven for these settlers who were escaping the Native American invasions of other nearby settlements. This settlement got its name because the first occupants in the area killed a beaver which is 'nutria' in Spanish and bear which is "oso" in Spanish.

*Alpine (33° 50' N, 109° 07' W; elev. 6,968 ft).*

Alpine was originally settled in 1876 when Anderson Bush arrived in this spectacular high country and built a log house known as Fort Bush. The area became known as the Bush Valley. Three years later in 1879 Bush sold out to Mormon settlers William Maxwell and Fred Hamblin. These men in turn sold to Mormon settlers from Luna, New Mexico and the area was renamed Frisco for the San Francisco River. Here they farmed and built a log-house fort. The name of Alpine originated when someone noticed the Swiss-like mountains surrounding the town and was then named after Alpine, Utah.

## Natural Resources

### *Landforms and Terrain*

The area traversed by the route is located in some of the most rugged and mountainous terrain in Arizona. The terrain of this region is characterized by a combination of low rolling foothills to high rugged mountain peaks and steep narrow canyons. The elevations range from approximately 3,800 feet in the Clifton-Morenci area to over 11,400 feet at the top of Mount Baldy in the White Mountains.

The White Mountains run east to west across the northern portion of the forest with Mount Baldy on the western end and Escudilla Mountain (10,912 feet) on the east near Nutriosio on the Arizona/New Mexico state-line. This range is typified by gentle, rolling terrain with large mountain meadows interspersed with pockets of dense mixed conifer, aspen and ponderosa pine forest.

The Blue Mountains are situated in the central part of the forest and run in a north-south direction. These mountains are characterized by steep, rugged terrain and offer a myriad of spectacular vistas of forested valleys, canyons and isolated peaks. Prominent peaks visible within these mountains and rising several thousand feet above the adjacent terrain are: Rose Peak (9,525 feet), Maple Peak (8,302 feet), Bear Mountain (8,550 feet), Raspberry Peak (8,318 feet), Red Mountain (8,154 feet) and Mitchell Peak (7,947 feet).

The mountains and rock outcroppings consist primarily of volcanic rocks or clastic sedimentary rocks derived from volcanic sources. Most of these deposits occurred during the Cenozoic era when volcanism, faulting and major mountain building took place.

Paleozoic and Mesozoic rocks were probably deposited throughout the region but were removed by erosion prior to the accumulation of the tertiary volcanic rocks. It is estimated that two to three 2,000 feet of these sediments were deposited and as much as 2,000 feet of Paleozoic rocks remain beneath the tertiary volcanic rocks. Rocks of this age are exposed near Clifton-Morenci and also near Springerville.

In the northern portion of the route, soils are developed primarily on basalt and cinders and are highly forested. The southern and central portions contain soils that are relatively shallow on basalt, granite and schist parent materials. The alluvial valleys are filled with silt, sand and gravel to depths ranging from ten to two thousand feet. These deposits are primarily unconsolidated and are from the quartermary and middle tertiary periods.

### ***Hydrology***

Four major perennial streams in the Southwest U.S. have their headwaters located on the Apache-Sitgreaves National Forest. The Black, Blue, San Francisco and Little Colorado Rivers are important tributaries to major rivers in Arizona that provide great downstream irrigation values.

The Black River and its tributaries drain the western slope of the forest and flow into the Salt River. The waters of the Salt eventually flow into Roosevelt Lake where it is stored for irrigation and drinking water in the Salt River Valley (Phoenix Metropolitan area). The Blue River drains south through the Blue Mountains (which run north and south near Alpine) where it meets the San Francisco River near Clifton. The San Francisco River is a major tributary of the Gila River which flows into the San Carlos Reservoir. The Blue River drains the eastern slopes of the forest and the San Francisco River drains the southern slopes. The White Mountains run east and west across the northern part of the forest and are drained by tributaries of the Little Colorado River and the Black River. The Little Colorado River drains the northern slope of the forest.

### ***Elevation and Climate***

Considering the varying topographic changes along the route, the area has a varying temperature and precipitation, large temperature changes, plentiful sunshine and low humidity. Mean annual precipitation ranges from about 10 inches in the Duncan Valley south of Clifton to approximately 40 inches in the highest parts of the White Mountains.

About half of the annual precipitation occurs during July, August and September and comes as brief but often violent thunderstorms. Light to moderate precipitation occurs during the winter months. The average annual snowfall ranges from about two inches in the lower elevations near Clifton to over seventy inches in the higher elevations near Alpine and the White Mountains.

Mean annual air temperatures range from about 65 degrees F. in the lower valleys to about 40 degrees F. in the higher mountains. Daily range in temperatures is commonly more than 20-30 degrees. In the summer months daytime temperatures can range from 90 degrees or higher in the lower elevations to 70 degrees F in the higher mountain areas.



## **Biology**

The Coronado Trail region has long been known for its abundant and varied wildlife and vegetation. The roadway traverses the semi-desert to the sub-alpine landscapes and contains several biotic communities. These communities are the Sonoran Desertscrub, Interior Chaparral, Semi-Desert Grassland, Plains and Great Basin Grassland, Madrean Evergreen Woodland, Great Basin Conifer Woodland, Rocky Mountain Conifer Forest.

Sonoran Desertscrub. The Arizona Upland Subdivision includes some of the most picturesque portions of the Sonoran Desert and is found most commonly below 3,300 feet in elevation. The vegetation most often takes on the appearance of a scrubland or low woodland of leguminous trees with intervening spaces held by one to several layers of shrubs and perennial succulents.

Interior Chaparral. In Arizona, interior chaparral discontinuously occupies mid-elevation (3,450 to 6,600 feet) foothills, mountain slopes, and canyon habitats. Most chaparral shrubs have dense, compact crowns and small evergreen leaves. Interior Chapparral usually presents a closed or moderately open growth of relatively uniform height between 3 to 10 feet. In Arizona, Shrub Live Oak is the most widespread chaparral species and the common dominant. Other common species to this forest community include: birchleaf mountain-mahogany, sumac, buckthorn, cliffrose, desert olive, sophoras, Arizona rosewood, and Ash.

Semi-Desert Grassland. In Arizona, the Semi-desert grassland adjoins Chaparral communities and Sonoran Desertscrub and is most commonly found in elevations of 3,300 feet to 4,600 feet above sea level. As is the case with other warm-temperature grasslands, the original grass cover of this biome has been large replaced. Many semi-desert grasslands have been invaded by woody plants, leaf succulents, and cacti, and their grasses replaced by shrubs.

Plains and Great Basin Grassland. In Arizona, the Plains and Great Basin Grasslands are situated above 4,800 feet. These grassland communities occasionally come in contact with the Interior chaparral and conifer woodlands.

Madrean Evergreen Woodland. In Arizona, this mild winter-wet summer woodland can be found in southeastern Arizona northward to Yavapai County. This woodland community is most commonly found in elevations of 4,000 feet to 7,200 feet in elevation. This community is characterized by evergreen oak, juniper, and pine trees.



**Fleeting glimpse of forest deer**

In Arizona, a fleeting glimpse of forest deer can be seen in a forest community in-  
between 3 to 10 feet. In Arizona, other common species to this forest community in-



**Mexican Wolf habitat restoration area**

Great Basin Conifer Woodland. In Arizona, this cold adapted evergreen woodland is characterized by the unequal dominance of two conifers-juniper and pinyon. This woodland community is most commonly found in elevations of 4,750 feet to 7,500 feet in elevation.

Rocky Mountain (Petran) Conifer Forest. In Arizona, this wet and cold adapted forest is equivalent to a spruce-fir forest. This woodland community is most commonly found in elevations higher than 7,000 to 10,000 feet. In addition to spruce and fir species, this community also contains ponderosa pines.

These biotic communities contain numerous plant species that vary from desert vegetation found in the lower elevations to spruce/fir forests found in the higher mountain elevations. The diversified landscape character in this region provides an exceptionally attractive environment to a large variety of wildlife. It is estimated that more than 160 species of birds are found in this region of the State, and more than 90 species of mammals. It is estimated that 90% of Arizona's trout waters originate in this area.

### ***Manmade Features***

Most of the manmade features and associated activities along the route are located in the populated centers of Clifton, Morenci, Alpine, Nutrioso, Springerville, and Eagar. These areas provide the major economic structure of the region. Typical features associated with these urban areas are related to residential, commercial, industrial and recreational land uses.

As much of the non-forest areas adjacent to the roadway is rural, non-recreational facilities in the landscape include structures associated with farming and ranching. Watering holes, homesteads, corrals, windmills and livestock are a familiar part of the landscape. Recreation has also played a dominate role in the development of many man-made lakes, public lodging facilities, campgrounds, picnic areas, forest roads and hiking trails. Nelson Reservoir, a 60-acre manmade lake located just south of Springerville, is stocked with Rainbow, German Brown and Brook Trout. Anglers frequent this spot year-round, as ice fishing is also popular here.

However the most striking manmade feature along the route is located at the southern end of the corridor. It is the impressive Phelps Dodge Corporation Morenci Mine site. This mine is one of the largest open pit mines in the world and is a spectacular display of man's potential effects on the environment. The associated mining features such as the large smelter stacks, concentration plant, rail lines, heavy equipment, waste piles and tailing ponds are also dominant features in this area.



**Hannagan Meadow Lodge & Fueling Station**



**View overlooking part of the Morenci pit**



Major man-made landmarks along the route are summarized with reference to their Milepost location in the corridor in Table 4 below.

**Table 4. Major man-made landmarks and Facilities along US 191 from Threeway to Springerville**

	HIGHWAY 191 N & S	Miles from Morenci	Miles to Alpine	HIGHWAY 191 N & S	Miles from Morenci	Miles to Alpine	HIGHWAY 191 N & S	Miles from Morenci	Miles to Alpine
130.6	US 70/191 Intersection			176.5	Five Trail #12	13.3	203.0	Small Rocky Cut	39.8
147.0	Threeway/Safford Maint. Boundary			176.7	Chase Creek Overlook	13.5	203.7	White House	40.5
153.5	Gila River Bridge (El Puente)			177.0	Painted Bluff Trail #13	13.8	205.0	Upgrade to Rose Peak	41.8
154.6	3 Way Intersection			177.2	Shale Pit	14.0	206.1	Bear Canyon Trail #19	42.9
155.0	Coal Creek Canyon Bridge			178.3	Cherry Lodge Picnic Area	15.1	207.4	DPS Boundary: S=Safford N=Springerville	44.2
155.8	Buzzard Roast Canyon Bridge			178.4	Granville Campground	15.2	207.5	Rose Peak Rim Trails	44.3
156.0	Guthrie Road			178.9	Aspen Curve	15.7	208.5	L & L Curve	45.3
156.3	Rattlesnake Canyon Bridge			179.2	Spur Cross Trail #8	16.0	209.4	Robinson Mesa Trailhead #27	46.2
157.7	Sky Line View Road			179.7	Cave on Side of Road	16.5	212.4	Sheep's Saddle Picnic Area/ Trail #16	49.2
157.9	Niger Canyon Bridge			179.8	Tomato Curve	16.6	214.2	Old Burn Cattleguard	51.0
159.0	Old Stock Pens Turnout			180.7	Saw Mill	17.5	215.5	Hagan Corals Trail #31	52.3
162.4	Sheriff's Office			181.4	Sardine Saddle Picnic Area	18.2	216.3	Cattleguard	53.1
162.7	Ward's Canyon			182.3	H L Saddle Picnic Area	19.1	217.0	Rock Pit-Camping Area	53.8
163.4	San Francisco Bridge			183.8	Deerhead Rd. (Tule)	20.6	217.9	Crabtree (E. Eagle #33/Lengthy #89) Trails	54.7
164.1	Circle K			184.1	Smith Canyon (Old Yard)	20.9	219.7	Haji-Port	56.5
166.0	Horseshoe (Big) Curve			185.1	Pull out above State Yard	21.9	220.0	Stiray Horse USFS Camp	56.8
167.1	Light in Morenci (Naccanti's)	0	90.5	186.0	Grey's Peak Stairs Yard	22.8	220.6	Stiray Horse CG (Highline #47/Rashberry #35)	57.4
168.0	Old Telephone Office (white bldg.)	0.9	90.4	188.1	Upper Eagle Crk Rd (FS #217)	24.9	220.8	Rattlesnake State Yard	57.6
168.2	PD General Offices	1.1	90	189.0	Juan Miller Rd. (FS #475)	25.6	223.1	Arrow: Tree	59.9
169.0	PD Main Gate-light--(start of 10%)	1.9	89.4	189.2	Turn Table & Stock Pile	25.8	224.8	Blue Vista Lookout:	61.6
170.0	PD Tunnel	2.9	88.4	189.2	Cattleguard	26.0	225.0	Blue LO Rd. (FS #84) Sall House Trail #18	61.8
171.0	Cedar Loop-Siargo Area	3.9	87.4	192.4	South 4-Bar Cattleguard	29.2	226.1	FS #54 Rim Trails	62.9
172.3	Lower Eagle Creek Road	5.2	86.1	195.0	North End of 4-Bar	31.8	226.4	KP Cienega CG & Reno LO Rd (FS #25)	63.2
173.9	Pit Look Out	6.8	84.5	195.7	Cattleguard	32.5	228.4	Cattleguard	65.2
177.0	PD Overpass (Haul Rd Bridge)			196.1	K 6 Ranch Road (FS #515)	32.9	229.2	Acre Lake Rd. (FS#8312)	66.0
178.0	Acid Dump			197.2	Asphalt Spill	34.0	229.4	KP Rim Trails	66.2
179.3	Ties Back to Old Road	16.1	74.4	199.3	Pipestem Corals (metal)	35.1	231.1	Cattleguard	67.9
173.8	Gomez	10.6	79.9	200.2	A D Bar Trailhead #14	37.0	232.2	Hannigan's Meadow	69.0
174.0	Box Above Gomez's	10.8	79.7	200.9	Red Mountain Overlook	37.7	239.8	Beaver Head Rd/Bufalo Crossing (FS #26)	76.6
174.9	Forest Boundary	11.7	78.8	201.3	Cattleguard	38.1	243.7	Campbell Blue	80.5
175.0	Bottom of Switch Backs	11.8	78.7	202.0	Art Lee Corals	38.8	250.8	Alpine Divide	87.6
175.5	Switchback's	12.3	78.2	202.5	Bear Pen Springs Trail #32	39.3	253.7	Intersection US180	90.5

Color Designations

Temporary Road--Designate on Radio

Cattleguard

DPS Boundary

ADOT/Forest Boundary Change

The Apache-Sitgreaves National Forests are currently operating under a Comprehensive Resource Management Plan published in 1987 and updated in 1990 and 1996. The plan describes alternatives for resource management, resource protection and providing public services on the forests. The plan emphasis is geared toward recreation, wildlife and fish habitats and watershed conditions while maintaining a viable timber program. A major revision of the forest plan is programmed to begin in 2006.





U.S. Forest Service facilities at trailhead and camping areas adjacent to the roadway

## LONG TERM & SHORT TERM ACTION ITEMS

- i) Provide roadway safety services and improvements consistent with periodic traffic volume projections for different development scenarios, reflecting differences in land uses for different corridor segments, and seasonal variation.
  - i) Marshal all available information about emergency and public safety communications and emergency services delivery pertaining to known corridor hazards, including vehicle accidents, accidents and injuries involving hikers and campers, criminal activities, and ecosystem disturbances. Assess current response capabilities for different service types and different corridor segments.
  - ii) Identify major ways to improve emergency communications for public safety on the roadway, both in general and in relation to different corridor segments. Determine technical and financial feasibility of providing effective safety-related communications systems and services; establish performance requirements, secure stakeholder endorsement and support, a schedule for implementation, and responsibility for ongoing operation.
  - iii) Develop a plan to coordinate communications systems improvements and emergency services delivery for the ADOT Clifton District and both US Forest Service districts with White Mountain Apache and San Carlos authorities, Phelps-Dodge Corporation, and public emergency service agencies for Greenlee County, Apache County, Clifton, Morenci, Alpine, Eagar, and Springerville.
  - iv) Assemble roadway improvements plans for the entire corridor. Then marshal endorsements from public interest groups and support from leading agencies and economic development promoters for expedited implementation in the interest of public safety.
- b) Improve effective coordination with US Forest Service planning and development activities, as follows:
  - i) For activities occurring on National Forest land, follow standards and guidelines as outlined in the Apache-Sitgreaves National Forests Land and Resource Management Plan.
  - ii) Focus on maintaining and rehabilitating existing venues/facilities including: campgrounds, day use facilities (picnic areas, vista points, pull outs, rest areas), and trailheads.
  - iii) Provide for vegetation manipulation/prescribed fire use to increase safety, achieve visual quality goals, increase wildlife habitat and reduce fuels.
  - iv) Enhance existing and facilitate new or historic scenic vista points.
  - v) Provide opportunities to meet management objectives in Wilderness and Primitive Areas along the route.
  - vi) Provide for wildlife habitat improvements and wildlife viewing opportunities.
  - vii) Provide for interpretative opportunities along the route (including cultural/archaeological/historical/conservation education).

- viii) Review and validate the Forest Service Coronado Scenic Byway Management Plan's Identified Site Development Opportunities. If still valid, pursue fulfilling these opportunities.
- ix) Create new recreational opportunities that enhance and promote the Scenic Byway.
- c) Improve ongoing coordination of Forest Service management and improvements plans with ADOT and county roadway improvement programs that offer a realistic prospect of contributing to the following results:
  - i) Public recognition that the NIMBY reaction can and should accommodate equally important concerns for public safety and orderly economic development.
  - ii) Integrated open public participation activities for all three forest service districts and roadway management agencies as well as BLM administration of the Black Hills Back Country Highway, for better corridor improvements planning and review.
  - iii) Better access to roadside amenities and recreational facilities now accessible only from the Coronado Trails roadway, e.g. more effective wayfinding and public safety signage, and installation of more pull-offs and turn-around facilities.
  - iv) Upgrades to and better maintenance of existing recreational facilities, particularly those facilities within reasonable driving reach of available tourist accommodations, both north and south of the major peaks in the corridor.
  - v) Expansion of the range of recreational and ecotourism opportunities, particularly as related to vegetation manipulation, and Wilderness and wildlife habitat management.
  - vi) Increased availability of land and facilities to support recreation and tourism in the corridor, e.g. lodging accommodations and other travel support services.
  - vii) Integrated interpretive systems and programs that improve public understanding of the unique environmental and historic values of the region served by the corridor.
- d) Create and maintain an interpretive collaboration between agencies, institutions and individuals with special information about or insight into the historic, cultural and environmental heritage of the primary region(s) served by the corridor.
  - i) Pull together knowledgeable archivists, old timers, archaeologists, regional ethnographers, ecologists, technologists and historians in a series of workshops with the following goals:
    - (1) identify major reliable sources of information about the geophysical and social history of the region,
    - (2) explore the varieties of ways to organize and preserve existing information about the past,
    - (3) identify ways and means of supplementing, interpreting and presenting existing information for visitors and newcomers.

- (4) recommend ongoing programs and practices for developing and incorporating new information into ongoing interpretive systems and installations, and
  - (5) Document and distribute findings and recommendations.
- ii) Enlist institutional and financial sponsors for an interpretive center chartered to implement the findings of the participants at the workshops.
- e) Future extension of the extents of the corridor. The northmost extent of the official State corridor designation for the route falls short of Springerville. The south most extent ends somewhere near the middle of the Morenci mine, a couple of miles north from Clifton. This situation has already created considerable confusion, and could prevent mobilization of public sentiment in support the CMP initiative. Expressed public opinion envisions the immediate future extension of the corridor in both directions.
- i) Springerville provides a *population* anchor for the north end of the corridor. However, the pre-Columbian ruins of Casa de Malpais just north of Springerville might prove to be a suitable physical anchor for the corridor, adding weight to the claim of intrinsic historical and / or archaeological value. Such an extension would also bring important support for eco tourism and archaeological values into the CMP matrix.
  - ii) The town of Clifton is an integral part of the history of US 191 out of Morenci. It is also the county seat of Greenlee County, through which county a significant portion of the corridor passes northward. There is little doubt its claim for inclusion would be an asset to the future successful implementation of the Coronado Trail CMP. It would also provide a more stable south anchor to the route than the town of Morenci and the part of the alignment of US 191 that passes through Morenci. Nevertheless, Clifton was not physically included in the original designation. Community sentiment was that it should be included.
  - iii) A well known monument to Francisco Coronado is located near the international border at Douglas, Arizona. US 191 runs northward from Douglas. It joins IH 10 west of Wilcox. From there it runs NE with IH 10 through Wilcox to a point just east of Wilcox. Then it separates from IH 10 to head due north again, toward Clifton. The state designation of the corridor as the “Coronado Trail” has attracted some sentiment that it should be extended southward to the Coronado monument near the international border and the Coronado National Forest.
  - iv) Residents of Duncan, Arizona, which is situated on US 70 several miles SE of Three Way (location of the Clifton District HQ for the U.S. Forest Service) claim their community should also be included in the designation for the Coronado Trail. According to a representative of the U.S. Forest Service, the Duncan claim is based on artifacts alleged to show that the Coronado Expedition of 1540 actually passed along the Gila River near Duncan.
  - v) Whether either claim should be endorsed for extension of the corridor further south than Clifton has yet to be determined. An effective means of resolving the matter should be explored.



