

METROPOLITAN NATURAL PARK PANAMA

RECOMMENDATIONS FOR ENHANCING SIGNAGE AND INTERPRETATION



NOVEMBER 2001



Cover photograph: Park interpreter with visitors.

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Recommendations for Enhancing Signage and Interpretation

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EXECUTIVE SUMMARY

This project was undertaken to help the Metropolitan Natural Park upgrade its signs and achieve its communication and interpretive objectives. Existing planning and research information was reviewed, the current sign situation was evaluated, and a series of specific recommendations are presented. Recommendations focus on signs and exhibits that provide information and interpretation for Park visitors. The scope of this report is limited, however. It does not address interpretive tours provided by Park guides, environmental education programs provided to visiting school groups, or pamphlets, all of which contribute significantly to the Park's public programs.

There are current 14 types of signs found along roadways, trails, and public areas, resulting in significant sign clutter in some areas. In addition, signage in the Park is poorly organized, outdated and in generally poor condition. Many of the current signs cannot be read because of their design, size, or location. There are too many signs, too many different types of signs, and no overall planning to make these signs work as an integrated system. Many of these signs are recommended for removal or relocation and several new signs and exhibits are proposed.

An integrated approach to signage is recommended for the Park focusing on specific interpretive and communication objectives and needs developed by the Park and supported by research on current and potential visitors. The center of this strategy is a "family of signs" concept with common design elements to provide a unified approach and look to all signs.

Priority projects are recommended to achieve the greatest benefits in the shortest time with the least cost. These are indicated in the list of recommendations that follows.

Summary of Recommendations

Headquarters Kiosk. Install a six-panel kiosk to provide orientation and interpretation for all Park visitors (priority).

Trail Orientation Maps. Design a series of “You are Here” maps to clarify hiking trails and provide general recreational information about the Park. Use these to replace existing metal signs at each trailhead (priority).

Park Headquarters Map. Develop a new map to show detailed information on visitor facilities at the Park Headquarters. Use this map at the headquarters kiosk (priority).

Directional Signs at the Headquarters. Install new information and directional signs to help guide visitors (priority).

Trail Directional Signs. Install a few directional signs with arrows at strategic locations to help guide visitors.

Entrance Portals. Redesign and relocate the two entrance portals along Via Juan Pablo II.

Headquarters Monument. Enhance the monument to make it more colorful and inviting.

Secondary Entrance Kiosk. Replace the existing metal sign with a visitor information board near the guard house.

Corredor Norte Highway “Welcome” Signs. Remove and reuse these signs.

Highway Overpass Murals. Consider adding colorful painted murals on the two Corredor Norte overpasses to help advertise the Park.

Highway and Roadway Directional Signs. Add the Park name and arrows to 4 or 5 existing directional signs to help visitors find the Park and increase Park visibility.

Park Boundary and Welcome Signs. Remove all or most existing metal roadside Park boundary signs and provide large, wooden welcome signs along Via La Amistad and at the secondary entrance.

Park Limits Signs. Redesign all small metal Park limit signs.

Roadside Environmental and Public Information Signs. Remove all existing signs and add a new fire-prevention sign along the Corredor Norte.

Accident Prevention and Safety Signs. With one exception, maintain and enhance existing signs.

Roadside Attraction and Approach Signs. Remove or repair the signs along Via Juan Pablo II and add two new approach signs for the Park Headquarters.

Trail signs. Remove all numbered signs from outdated interpretive trail stops. Add a new sign to discourage visitors from defacing the large cuipo tree on the La Cienaguita trail.

Prohibition Signs. Remove all existing signs and include this information on the kiosk.

Interpretive Exhibits and Signs. Remove and replace all existing interpretive signs and exhibits. Consider future interpretive exhibits or kiosks at the Los Trinos overlook and at the “castle” building along the Camino del Mono Titi trail, an interpretive sign at Hill 66, and an interactive exhibit for children at the playground at the headquarters.

Official Park Colors, Font, and Letterhead. Use official Park colors, font, and letterhead design whenever possible in all signs and interpretive exhibits.

Park Map. Update the map that shows the entire Park. This revised map could be used at the Park headquarters, in visitor brochures, and elsewhere in the Park where additional information is needed to supplement the trail orientation map.

1. INTRODUCTION AND BACKGROUND

1.1 Purpose and Scope of this Project

This project evaluates the current signage and wayside interpretive exhibits in the Metropolitan Natural Park and provides recommendations for improvements which will help the Park achieve its interpretive and communication objectives. It does not address brochures, guided tours, or environmental education programs for school children. Planning for informational and interpretive signs in the Curundu Heights portion of the Park, which includes the Equestrian Club, a shipping facility and private homes rented by the Park, will be developed in the future. Detailed sign designs are provided in a separate document to help guide the development of specific products. Additional interpretive planning will be needed to develop other wayside exhibits for trails and points of interest within the Park.

1.2 Fieldwork and Team

The initial field session from August 27 to September 7, 2001 reviewed the current situation. All trails were hiked and all roads carefully driven to identify existing signs. The general approach used was one applied previously for the Soberania National Park (Loste et. al 2000) and is based upon principles of interpretation promoted by Dr. Sam Ham (Ham 1992). Team members included Jerry Wylie and Jerry Bauer, USDA Forest Service, Evelyn Samaniego, Jessica Rosas, and Miguel Serrano from the Metropolitan Natural Park, and Beatriz Schmitt and Francisco Cedeño from GreenCom.

A draft report was prepared in September and October 2001. In addition, the Metropolitan Natural Park staff reviewed all recommendations, proposed signing and designs. All recommended changes were incorporated into the draft report.

A second field session was conducted from October 25 to November 9, 2001 to review the results of the initial assessment and the recommendations and develop sign designs for kiosk and sign panels.

1.3 Metropolitan Natural Park

Created in 1985, the Metropolitan Natural Park, includes 265 hectares (655 acres) on the western edge of Panama City and is the only rainforest protected area in Central America inside a major urban center. Approximately 75% of the Park is covered by dry lowland Pacific forest, an endangered ecosystem. It is home to 322 animal species and 284 plant species, including trees more than 35 meters (100 feet) in height, and is part of a biological corridor composed of protected areas stretching from the Pacific to the Atlantic.

The Park is the most visited protected area in Panama, receiving approximately 20,000 visitors annually, most of them students from local schools. However, because of its attractive setting and proximity to Panama City, the Park also attracts many local residents and

international visitors, who come to enjoy its 4 kilometers (2.5 miles) of hiking trails.

The Park is part of Panama's national system of protected areas and is administered by a non-governmental organization (NGO). The Board of Trustees is composed of civic and environmental NGO institutions, as well as representatives of the local and central government. The Park is staffed by professional interpreters, environmental educators and environmental management experts (PNM 1999).

1.4 Management Objectives

The general objectives of the Park are to:

- Provide the community with outdoor recreation opportunities.
- Promote education and environmental interpretation.
- Facilitate research and other scientific and cultural activities.
- Conserve natural and cultural resources.

The management plan for the Park has identified seven zones, three of which affect public use and interpretation along trails: the Intensive Use zone, the Extensive Use zone, and the Primitive Use zone (PNM 1999). These three zones cover all five trails, and except for Camino del Mono Titi, all trails overlap more than one zone. Although it appears that the objectives and norms in all three zones are the same or are silent for interpretation and signage, the plan's general direction is to: a) establish a plan for education and interpretation, b) facilitate guided and self-guided tours, c) interpret the Park's natural and cultural resources, d) design interpretive exhibits and materials for use inside and outside the Park, and e) provide information on the Park and its facilities to orient visitors and invite visitation.

Specific guidance is also provided in the Plan, including the following interpretive objectives:

- Interpret the Park's pre-Columbian, Colonial, and US military history.
- Make visitors and the general public aware of the importance of conservation.
- Make visitors aware of the objectives of protected areas in general and in particular the role of the Park in the metropolitan area and the interoceanic region.
- Interpret the Colonial trenches (but allow visitation only under strict control.)
- Improve the interpretation of the city vista and reverted areas at the Cerro Cedro mirador.
- Provide interpretation of natural and historic resources in the vicinity of Hill 66.

In addition, because of its proximity to Panama City, it is hoped that in the future the Park can serve as the gateway to help inform local residents and visitors about other protected areas within the Panama Canal Watershed.

1.5 Visitor Information

Currently, there are about 20,000 visitors to the Park annually. Most of these are school children who come as part of structured environmental educational programs. Between 1997 and 2001, 709 different school groups visited the Park. However, a recent study has illuminated many interesting things about the preferences and expectations of adult Park user groups and potential users.

The majority of Park visitors are male, between the ages of 25 and 59, live in Panama City, and have a professional background. Most have visited before and are accompanied by other adults. However, 46% are first-time visitors, suggesting the need for good orientation materials. For example, more than 30% of visitors surveyed did not know about the mirador at the summit of Cerro Cedro, and although more than half of those living in surrounding communities had heard about the Park, most had not visited (Silvera 1998). This indicates a need for better advertising and marking of the Park boundaries and entrance portals.

Specific types of information and services that the Park should provide were recommended by tour operators, institutions, NGOs, Park visitors, and focus groups. These included:

- Information on things to see in the Park
- Information on the environment
- Activities offered by the Park
- Drinks and snacks available
- Locations of bathrooms
- Availability of guides
- Information on trails
- Park regulations
- Prices
- Maps

The most popular activities for Park visitors related to signs and interpretation were the identification and observation of birds, mammals and plants, hiking recreational trails, and visiting vistas/miradores. Recommendations from the different groups for improving visitor information and interpretation were similar. These included:

- Improve access to the Park.
- Increase information on services available at the Park.
- Improve publicity and visibility for the Park.
- Increase signage and information panels.

This information provides a useful foundation for establishing a plan for signage and interpretation for the Park.



2.0 EXISTING SITUATION

2.1 Interpretation

The Park's interpretive signs and wayside exhibits are outdated and in generally poor condition. They are not integrated parts of a larger whole and they focus more on providing information rather than revealing meaning and connections. They appear to have been installed as individual projects, at different times, and by different groups, without the benefit of coordinated interpretive planning. Generally, they lack many of the characteristics experts say are necessary for effective interpretation; specifically, they could be more entertaining, relevant, organized and unified by themes, compatible with the site, and short and concise (Ham 1992:8; Trapp, Gross and Zimmerman 1994:5.)

2.2 Signage

Because it is an urban park, Metropolitan Natural Park is surrounded and heavily influenced by roadways and motor vehicles. Access to the Park is confusing and difficult because of this complex road system, as well as by urban-scale traffic, high-speed driving, and poor road planning.

In particular, the Corredor Norte is a serious psychological and physical barrier between the Park and the city. This is a four-lane, divided freeway and toll road with controlled access. Although the Park's eastern boundary is the Curundu River, visitors coming from this direction are confronted by the sights and sounds of the industrial world - - a modern highway - - rather than nature...a poor introduction to a "natural" park (Photo 1).

In addition, Via La Amistad, which defines the northwestern boundary, is scheduled for expansion to two lanes in each direction in the near future. This will not only increase traffic and animal road-kill, it will further isolate the Park from the neighboring Camino de Cruces National Park across the road.

2.3 Sign Pollution

Metropolitan Natural Park suffers from serious sign pollution (Photo 2). There are too many signs, too many different types of signs, and no comprehensive sign coordination or planning. There are *14 different types* of signs and over *60 individual signs* in the Park. Each type of sign is described below and illustrated in Figures 1-4.

Added to this are the many highway directional signs. Along the approximately 1 km stretch of Via Juan Pablo II between the Corredor Norte and Avenida Ascanio Villalaz, for example, there are a total of *43 park and highway signs!* That is an average of one sign every 23 meters through the heart of the Park. Clearly, to enhance the visitor experience and improve the scenic values of the Park it is essential to reduce the number of signs and create a more systematic approach to signage.

Table 1. Current types and quantity of signs in Metropolitan Natural Park.

Type of sign (number)	
1.	Entrance portal signs (2)
2.	Headquarters monument (1)
3.	Highway welcome signs (3)
4.	Roadside park boundary signs (6)
5.	Park limits signs (16 or more)
6.	Roadside environmental and public information signs (3)
7.	Accident prevention and safety signs (7)
8.	Roadside attraction or approach signs (5)
9.	Visitor facility and directional signs (several)
10.	Park orientation sign and poster maps (3)
11.	Trailhead orientation signs (4)
12.	Trail signs (numerous)
13.	Prohibition signs (several)
14.	Interpretive signs and exhibits (6)

If signage is a good thing, then how can an abundance of signs be bad? It is because too many signs and poor design can cause overload and confusion, thus *reducing* the amount of information that is transmitted and understood. Too many signs is like being in a crowded room where everyone is talking. You cannot hear anyone. Reducing this visual clutter and clarifying and focusing the message is our primary goal.

2.4 Entrance Portals

It is critical to establish a good first impression when entering a protected area. Entrance portals are important because they signal a transition from the urban to the natural world and create or reinforce certain visitor expectations about the Park. They are the primary visual cue to the fact that visitors are entering a special place. Although they are usually located at the Park boundary, if needed, portals can be located slightly inside the boundary to create the proper effect.

There are two portal signs on either end of Via Juan Pablo II, one at the north entrance to the Park and the other at the south. Neither is effective. The northern portal has stone pillars supporting three wooden boards (Figure 2a). It is located just before the entrance to the Corredor Norte, where it is obscured by other signs and all but lost against the dark background (Photo 1).

A new “psychological portal” could be constructed further into the Park, beyond the highway. This would be a much better introduction to the Park because it *looks* more like a park rather than a freeway on-ramp (Photo 3). It would welcome visitors to the forest, not to a concrete roadway. If the legal boundary of the Park needs to be identified, it could be done with a smaller boundary limit sign at the Curundu River.

The southern portal, made of similar wooden planks supported by wooden posts, is in poor condition. Both its appearance and location do not project a positive image for the Park (Figure 2c). The sign is situated in a triangle formed by intersecting roads, in an area cluttered by a utility building and a small monument to Juan Pablo II and surrounded by a sea of metal highway signs. It is not visible from traffic going south on Avenida Ascanio Villalaz and is easily lost amongst vehicles and the cluttered background for those driving north. A much better location would be on the right-hand side of the roadway for northbound traffic, surrounded by grass and with a natural backdrop of trees (Photo 4).

2.5 Headquarters Monument

The massive brick monument at the Headquarters entrance is a key landmark and an important part of the image of the Park (Figure 2b). However, it stands at an angle to the roadway so that it is less visible to those driving north on Via Juan Pablo II, a problem that could be solved by adding a roadside approach sign from that direction. The wooden sign on the monument says “PARQUE NATURAL METROPOLITANO – SEDE ADMINISTRATIVA,” which is somewhat outdated and misleading.

In addition to being the administrative Headquarters, this is the primary location for visitor orientation and environmental education. This area also offers picnic facilities, a children’s playground, a self-guided botanical trail, gift shop, library, public bathrooms, and access to three hiking trails. The term “Sede Administrativa” fails to convey all this. An alternative is to have the Park name followed by “SEDE” or simply “BIENVENIDOS.”

The monument is also sterile and a somewhat unfriendly in appearance. It could use more color and life; for example, flowers, banners, a flag on the second flagpole, or painted wooden figures of children, plants and animals. Restoring lighting would also help. This is the Park’s front door and most important billboard, and needs to be more attractive and inviting.

2.6 Corredor Norte Welcome Signs

There are three large wooden “PARQUE NATURAL METROPOLITANO / BIENVENIDOS” signs located along the Corredor Norte (Figure 1h). One is on the west side of the Corredor near the northern Park boundary, one is on the east side near the southern boundary, and the third is on a hill along the east side just to the north, facing *north* to southbound traffic on the opposite side of the highway. The latter is especially difficult to

see because of the distance to oncoming traffic, its height above the roadway, and its dark brown color against a dark background (Photo 5).

Because of their size, color and placement, none of these signs are especially visible nor easy to read from a fast-moving vehicle. The contrast between these and the highway signs is striking. Highway signs have 10” high black letters on a white background, twice the size of the lettering on the Park signs (Photo 6). Since they are difficult or impossible to read, the value of these signs is questionable and they could be removed and perhaps reused elsewhere in the Park.

There is also a fourth large, wooden “welcome” sign at the northern end of the Park along Via La Amistad and it is treated as a Park Boundary sign below.

2.7 Roadside Park Boundary Signs

There are rectangular roadside metal signs that indicate the Park boundary (Figure 1a,b). Some of these contain environmental educational messages, such as fire prevention, driving carefully to protect wildlife, etc. Others have lengthy lists of prohibitions, phone numbers for reporting violations, and references to the law creating the Park. However, it is unlikely that passing motorists have much interest or opportunity to read these. The lettering is too small, there is too much text, and viewing distances are too great. Therefore, the usefulness of these signs is questionable and they could be removed and replaced by a few larger signs at strategic locations more visible to motorists. Some could be retained for use at areas with special management needs.

In addition, there is one large wooden roadside Park boundary and welcome sign at the northern end of the Park at the intersection of Via La Amistad and Via Chino-Panamañeo (Photo 18). It is similar in size and style to the Corredor Norte welcome signs, except that it has a tile roof like the Vivero and Equestrian Club attraction signs. The visibility of this sign could be increased by altering its location and angling it more toward on-coming southbound traffic.

2.8 Park Limit Signs

These differ from the Park roadside boundary signs in being smaller and affixed to trees. They come in two types, yellow and white, both with green or black lettering (Figure 1d). These signs are frequently placed at locations along the roadways where people could pull off and enter the forest on foot, presumably to engage in illegal activities. Those signs posted along Via Juan Pablo II, which bisects the Park, are actually inside the Park, not on the boundary.

If the purpose of these signs is to discourage unauthorized activities and/or entry, then they could be redesigned to be more effective. The use of an red-orange background and large letters in all capitals, for example, would send a much stronger message.

2.9 Roadside Environmental and Public Information Signs

There are a few roadside signs whose sole purpose is to provide an environmental protection or public information message to motorists (Figure 1c,j,m). One is a large, billboard type fire-prevention sign with a cartoon figure of a coatimundi and one advertises a long-past reforestation project using native species. Another announces the intention of a local politician to provide funding for a “sports trail” within the Park. These signs are unnecessary and could be removed to reduce sign pollution. However, a new, smaller fire-prevention sign could be used at one or two other locations where cigarettes tossed from passing cars cause problems.

2.10 Accident Prevention and Safety Signs

Other highway signs warn motorists to reduce speed and to be alert to animals crossing the roadway (Figure 1f,i,g). Of these, perhaps the animal crossing icon signs are most useful, although even these could be improved by trimming tree branches, cleaning, and repainting. A separate “SLOW” sign could also be added to the support posts.

2.11 Roadside Attraction and Approach Signs

Approach signs alert motorists to coming attractions along the road, whereas attraction signs are usually placed at the entrance to that site (Figure 1e,k,l). Thus, they can be nearly identical except for their location. In the Park, these road signs announce such points of interest as the Vivero (greenhouse), Equestrian Club, Los Momótides Trail, and, in a single large sign, the “Centro de Visitantes and Mirador.” Except for the Equestrian Club, these signs have limited value and could be removed.

The “CENTRO DE VISITANTES – MIRADOR” sign, in particular, may add to the confusion at a dangerous intersection. There is no “Visitor Center” as indicated and the next sign down the road identifies this as the “SEDE ADMINISTRATIVA.” In the opposite direction indicated by the “MIRADOR” arrow, there is a secondary entrance providing access to the mirador, but there are other attractions as well. Frequently, taxi drivers think this is the main Park entrance. Another problem is it can only be read from traffic coming from the north.

Options include leaving this sign as-is, modifying it to clarify the information, removal, or moving it across the road and reorienting it at a 90 degree angle to the road so that it would be more visible from both directions. However, this is an awkward intersection and none of these would be a perfect solution, so removal might be the best option.

Although we should be careful not to add to the existing sign clutter, it is important to assist motorists through the confusing and sometimes dangerous roadways to find the Park Headquarters. This is especially important for those driving north on Via Juan Pablo II, because the entrance monument cannot be seen until the last second. Drivers from this direction also need time to slow and make a left hand turn across traffic. Therefore, it would be helpful to

place an approach sign 50 to 100 meters back along the right hand side of the road. A similar sign could also be placed north of the entrance for southbound traffic.

2.12 Visitor Facility and Directional Signs at the Park Headquarters

Visitor facility signs identify basic visitor services such as the location of bathrooms, drinking water, trails, etc. at the Park Headquarters and other places where people are concentrated. The focus should be on first-time visitors. Directional signs are presently limited to a sign on the front of Headquarters building identifying the library, a temporary sign for the environmental educational center currently under construction, and several small wooden “SENDERO” arrows directing visitors to nearby trails (Figure 4).

What is needed at the Park Headquarters is a series of small signs welcoming visitors to the main entrance to the gift shop/reception area, as well as directing visitors to the new kiosk, drinking fountain, public bathrooms, and the three nearest trailheads.

2.13 Park Orientation Sign and Poster Maps

General orientation maps for the entire Park are currently available at two locations. There is a large metal sign and map at the secondary entrance to the Park, opposite the guard hut (Figure 4a). In addition to a Park map, this sign also contains visitor information. Unfortunately, it seems to be designed more for motorists than pedestrians and the dark letters on a white background is hard on the eyes (light lettering on a dark surface is recommended for signs in direct sunlight.) There are also two large poster maps in the Park Headquarters building. However, these are outdated and need to be replaced.

A new, smaller park orientation map is proposed as part of the visitor orientation kiosk at the Park Headquarters building. It would show the Park in relation to Panama City. This map, along with a map for the Park Headquarters area and new Park trail orientation maps focusing on the core visitor zone, would provide complete orientation for Park visitors.

2.14 Trailhead Orientation Signs

All five hiking trails currently have large, metal trailhead orientation signs (Figure 4g). These feature a very basic trail map and such information as length, hiking time, slope, and difficulty. The sign’s black lettering on a white background is easy to read in shady conditions. All signs are very similar in design.

In addition to having limited map details, however, these signs do not provide overall Park orientation. It is recommended that a replacement map be installed at each trailhead and other key locations. Each of these new maps would be identical except for the “You Are Here” arrow. In addition to color-coded trails, the maps would show key attractions and landmarks, topography, visitor facilities, and a small table summarizing trail information. See Figure 8 for a suggested replacement map.

2.15 Trail Signs

The few signs installed along trails consist of numbered markers for out-of-date interpretive stops. These are located on the ground or affixed to trees. None of these are currently being used and should be removed. It would also be helpful to install a few small arrows at key intersections along the trails to direct visitors to the Park Headquarters.

2.16 Prohibition Signs

There are a wide variety of signs prohibiting illegal activities in the Park (Figure 4b,i). A few are simple icons, such as no littering, picking plants, or bicycling, but most have text. In addition, some of the Park roadside boundary signs and Park limits signs also mention prohibitions. None of these signs say “please,” use humor, are provocative, nor explain the reason for the prohibition, techniques which would make these signs more effective. All of this information could be provided at a new orientation kiosk located at the Park Headquarters, as well as a smaller kiosk or information board at the secondary Park entrance (“La Garita”).

2.17 Interpretive Exhibits and Signs

There are currently six interpretive signs and exhibits in the Park: 1) photosynthesis, 2) carbon dioxide experiments, 3) the STRI research crane, 4) natural “bridges” for animals traveling through the tree canopy, 5) the northwest vista, and 6) the southeast vista (Figure 3). The carbon dioxide and STRI crane signs address one of the six interpretive objectives (scientific research), but neither is very effective in explaining the importance of this work. They are more informational than “interpretive.”

The same is true for the two vista signs; they identify points of interest visible from the hilltop but do not explain the significance of these places. The photosynthesis exhibit, in particular, has been seriously damaged by weather and is illegible. The “natural bridges” sign, while it does describe how animals move through the tree tops, is not particularly relevant at this site nor does it reveal deeper meaning. In other words, it fails the “so what” test (the fact that some animals move through the trees is obvious).

None of these six interpretive signs and exhibits are recommended for retention.

In addition, there are tentative plans to develop interpretive signs and materials for some of the trails, for example: **Los Caobos** - migratory birds (in cooperation with Cleveland Metro Park); **La Cienaguita** - medicinal plants; and **Los Momótides** – “What’s Happening in the Forest” focused on younger school children. Although they may have individual signs interpreting specific topics along the trail, **Camino del Mono Titi** and **El Roble** do not have a single overarching interpretive theme or message. It is not yet determined if La Cienaguita’s ethnobotany topic will be delivered by guided tours or through a self-guided tour pamphlet.

2.18 Highway and Roadway Directional Signs

There are currently no directional signs to assist visitors in finding their way through the multitude of roads surrounding the Park. From downtown Panama City, the best route is by way of Via Juan Pablo II, requiring a turn at the Edison intersection with Via Ricardo J. Alfaro (Photo 7). Directional signs here indicating “PARQUE NATURAL METROPOLITANO” would be a great help, as would one at or near the “Y” just before the Corredor Norte entrance (Photo 8).

Coming south on the Corredor Norte, the best route to the Park is the La Amistad/Juan Pablo II exit, which could also use a directional sign (Photo 9). Then, at the intersection of Aveneda Ascanio Villalaz with Via Juan Pablo II, a smaller directional sign for this right hand turn is needed (Photo 10). In all cases, “PARQUE NATURAL METROPOLITANO” signs should be added to existing signs to avoid increasing sign clutter.

If large highway and roadway signs of the same size as existing sign boards cannot be added, then the use of smaller signs with “PARQUE NATURAL METROPOLITANO” and the Park logo affixed to existing *sign supports* should be considered. These could be similar to those used throughout the city to direct motorists to the Corredor Norte and Corredor Sur.

3.0 DISCUSSION

3.1 Communication and Interpretive Objectives and Planning

It is important to carefully plan for visitor information and interpretation. The key question is “*what do visitors need to know and what does the Park want people to do with this information?*” Interpretive and communication objectives can be educational, behavioral, or emotional. In other words, what do we want visitors to learn or know, how do we want them to act, and how do we want them to feel during or after their visit? The following are some examples.

Motorists, local residents and visitors traveling to the Park will:

- Be directed to the Park at key road intersections.
- Know where the Park is located.
- Know when they have reached the Park.

Visitors arriving at the Park will:

- Feel and know they have entered a special place (protected area).
- Understand what is available at the Park and know where facilities and trails are located.
- Feel welcomed.

As a result of their visit, the majority of visitors will:

- Know why this Park is special and different from other protected areas (see below).
- Understand that the Park is operated by an NGO and not the government.
- Feel proud about the Park (Panamanians).
- Feel a personal connection with nature.
- Understand and obey rules and regulations.
- Experience relaxation and feelings of enjoyment/fun.
- Return for repeat visits.
- Tell their friends about the Park.
- Purchase gifts and/or make donations.

Visitors will understand the Park is important and a special place because:

- It is one of the most accessible rainforests in the world.
- It is a classroom for school children.
- It serves as the first link in a trans-oceanic biological corridor.
- It is an outdoor laboratory for scientific research conducted by the Smithsonian Institution and other organizations.
- It protects rare Pacific dry forest type...home for special plants and animals.

-
-
- It contains historical sites and artifacts from pre-Columbian, Colonial, and the US military eras.

3.2 How Would Visitors Experience a Trip to the Park in the Future?

With recommended changes, future visitors to the Metropolitan Natural Park would encounter an integrated system of signage and interpretation that enhances their total experience.

Driving to the Park. Park visitors, both local residents as well as international tourists, would be directed to the Park by strategically placed highway signs at key intersections both in the city as well as at the primary exit from the Corredor Norte. As they approach the Park boundary, they pass beneath colorful murals painted on a highway overpass.

Arriving at the Park. At the northern boundary, they are greeted by a large wooden roadside Park welcome sign. Driving along the Park boundary, they would also see smaller Park boundary signs within the forest. Upon entering the Park on Via Juan Pablo II, the primary entry corridor, they would pass by a large Park portal sign constructed of natural materials (wood and perhaps stone) and observe a roadside approach sign alerting them to the Park Headquarters entrance. Turning into the parking lot, they would immediately see the information kiosk and the main building clearly marked by a friendly “BIENVENIDOS” over the main entrance. Arriving by vehicle at the secondary entrance, they would be greeted by a large wooden “BIENVENIDOS / PARQUE NATURAL METROPOLITANO” sign and guard at the guard hut.

Park Orientation and Interpretation. After parking their vehicles at the Headquarters building, visitors can quickly orient themselves by visiting the outdoor information kiosk. Within a few minutes, they can see where the trails are located, determine which ones they are interested in hiking, plan their route, and learn a few interesting facts about the Park, including the history of the buildings and why the Park is important. The kiosk will also direct them to public facilities and inform them about fees, hours, and regulations. They will also learn that the gift shop has souvenirs and cold drinks. Well-placed directional signs mark the trailheads.

Orientation at the Secondary Entrance. Visitors arriving at the secondary entrance find maps and basic Park information. These materials are located on a small, 2-panel information board near the guard hut. At a minimum, this includes Park hours and fees, regulations, and a trail orientation map.

Trail Orientation. At the beginning of each trail and at critical junctions, visitors can check their location and reorient themselves using the same map they first observed when they arrived. Also, small directional arrows are placed at points where they could become confused. These direct them to specific trails and to the main office and parking lot.

Interpretation of Scientific Research. The importance of the Park as a site for scientific research is introduced at the Headquarters kiosk. This theme is interpreted in detail at specific sites, including the carbon dioxide experiment at the Headquarters and the STRI canopy crane. These signs explain the importance of this research for scientists and its relevance to the general population.

Interpretive Trail Signs. One or more trails will eventually have a series of signs explaining that trail's interpretive theme, such as migratory birds or medicinal plants. Other trails have interpretive signs at selected points of interest or to encourage hikers not to carve their names on a particular tree.

Miradors Interpretation. At the summit of Cerro Cedro, the two primary vistas are important focal points for visitor information and interpretation. The northwest vista will have a display illustrating the Park's key role in the transisthmian biological corridor. From here visitors can clearly see the unbroken forest cover of Camino de Cruces and Soberania National Parks and visualize this chain of protected areas stretching all the way to the Caribbean. A future display adjacent to the northwest vista could also interpret Cerro Cedro's historic significance as a defensive military installation from Colonial to WWII times.

On the opposite side of the summit, the southeast vista of Panama City provides a dramatic contrast. The interpretive display here will emphasize not only the history and growth of the city, but its increasing pressure on undeveloped areas such as the Park.

If a new observation tower is constructed at the summit, both displays could be installed at this location.

3.3 Interpretive Themes and Locations

The difference between information and interpretation can be confusing. Information signs inform visitors on where facilities and opportunities are located, or specific information such as the name of a tree. Interpretation explores the bigger story of the connection between things and reveals deeper meanings. Not just the name of the tree, but how it grows, and the role it plays in the forest and the life of people.

An interpretive theme is the principal message you want to communicate to visitors about a topic. They should be stated as a short, simple, complete sentence; contain only one idea; reveal the overall purpose of the presentation; be specific; and be interestingly worded, preferably with active verbs (Ham 1992). The main interpretive theme is the single most important message that we want visitors to take away from their experience: **Metropolitan Natural Park is special and different from other protected areas.**

There are seven interpretive sub-themes or messages at the Park that reinforce the main theme (Table 2). Future interpretative signs or exhibits at the Mirador or along trails will provide detailed information on each of these. However, at present, only one, "scientific

research,” is interpreted. The sign for the STRI research crane focuses on the pioneering efforts of Dr. Alan Smith, and the sign explaining the carbon dioxide experiments is overly scientific and poorly written. Both of these projects have extremely interesting-looking equipment that could serve as a visual “hook” for grabbing people’s attention. However, the information has to be equally interesting and relevant if it is going to be effective.

Table 2. Interpretive themes and key messages.	
Main Theme	
The Park is <i>special</i> and <i>different</i> from other Protected Areas	
Sub Themes	
<ul style="list-style-type: none"> • It is one of the most accessible rainforests in the world. • It is a classroom for school children. • It is the first link in a trans-oceanic biological corridor. • It is an outdoor laboratory for scientific research. • It protects rare Pacific dry forest type . . . home to many interesting plants and animals. • It contains historic sites and artifacts. • It is managed by a Board of Trustees, not the government. 	

Each of the seven sub-themes will be interpreted in at least one site in the Park and be linked to each other through interpretive planning. For example, an orientation kiosk at the Park Headquarters should introduce all seven themes. It can also explain the administration of the Park, its history, and its use as a classroom, and emphasize the Park’s accessibility by pointing out that visitors have just arrived by car after a very short trip, and/or using a map to show how close the Park is to Panama City.

Another unifying concept is the fact that the Park is connected to other protected areas as part of a biological corridor through the heart of the Panama Canal Watershed. Thus, it could serve as an educational and interpretive gateway to introduce visitors to these other important areas. Whenever possible, therefore, reference to these other protected areas will be made when interpreting the seven sub-themes. For example, the northwest vista biological corridor exhibit can show all neighboring parks. Also, interpretation of the historic Camino de Cruces might indicate its route through neighboring parks. And the interpretation of the STRI canopy research crane should certainly mention a similar STRI facility located within the San Lorenzo Protected Area on the Atlantic side.

The sub-themes could be treated in detail at the following locations:

Northwest Vista

- The Park is part of a biological corridor stretching across the isthmus.
- Historic defensive sites from Colonial to WWII times.

Southeast Vista

- The Park has a special relationship to Panama City (Park accessibility).
- Growth of Panama City.
- You can see three Panama Cities.

STRI Research Crane

- Scientific research is conducted at the Park.
- The Park protects rare Pacific dry forest.

Carbon Dioxide Experiment

- Scientific research is conducted at the Park.

WWII Military Sites (“The Park Has An Interesting Past”)

- “El Castillo” building (US military history).
- Other sites and artifacts along trails.

Los Caobos Trail

- The Park shares migratory birds with North America.

Los Trinos Vista on Camino del Mono Titi

- The Park is home to residential and migratory birds.

3.4 Integrated Signage

Family of Signs. A visually-integrated system of signage can help create a “sense of place” and identity for the Park. By using common design elements, shape, materials and colors, this family of signs can provide a unified approach and look to all directional, informational and interpretive signs. The members of the Park sign family are listed in Table 3.

Color and materials. Color in signage sets the stage for the interpretive and communication message. This is one element of planning that is often overlooked. The use of background color is essential to highlight text and make it readable. Color can be used to indicate a change of subject within a sign, to highlight the importance of certain information, to evoke a mood, or complement the theme or landscape.

Use of official Park colors and font will help unify signage and enhance the Park’s identity. Blue and green are already part of the logo and reflect natural colors of the Park (vegetation, water, sky). Red-orange is the “split-complementary” (contrasting) color for both these colors. These three colors, and their various shades, are illustrated in Figure 10.



Sign materials also reinforce message and image. Natural materials such as wood and stone reflect “nature.” Rustic-style routed lettering, round poles, and rough-cut wooden sign panels all communicate a natural park image. Although highway signs may have to conform to transportation department standards, these metal signs might be able to use Park colors. The closer to the main entrance a sign is, the more it should look like a Park sign and the more it should feature natural materials and a simple, rustic style. The use of plastic and metal signs within the Park should be considered carefully so that they fit their location and contribute to the Park’s natural image.

Table 3. Family of signs for Metropolitan Natural Park.	
Sign Type	
1.	Highway and roadway directional
2.	Entrance portal
3.	Highway mural
4.	Headquarters monument
5.	Roadside approach
6.	Park welcome
7.	Park limits
8.	Trail orientation
9.	Trail or site interpretation
10.	Vista interpretation
11.	Directional
12.	Kiosk

3.5 Caveats

For all wayside interpretive exhibits and signs, careful analysis is needed to determine if: 1) signs are the best way to deliver the interpretive message, 2) existing trail volume justifies the installation of expensive signs, 3) signs will adversely impact scenic values, 4) signs are compatible with the site, and 4) signs can be limited to maintain interest and avoid overloading visitors with too much information.

The Park should also consider keeping one or more trails free of any interpretive signs. This would provide a wider range of settings for different visitor experiences. Trails could range from highly developed, with many signs, high numbers of users, easy access, and the use of complex structures and synthetic materials, to undeveloped areas where there is less evidence of modern man and more opportunity for “self-discovery,” challenge, and solitude. Trails and specific sites could also be interpreted at different levels to provide something for all age levels, degree of interest, and expertise.

4.0 SUMMARY OF RECOMMENDATIONS

There are many changes in signage and interpretive exhibits that could enhance the visitor experience and help the Park achieve its interpretive and communication objectives. These are summarized below and in Table 4.

To achieve the greatest impact in the shortest time with minimum cost, certain priority projects are recommended. These include 1) **Trails Orientation Maps** for use throughout the Park, 2) **Directional Signs at the Headquarters**, and 3) a **Headquarters Orientation Kiosk**. Because of their importance and complexity, the Kiosk and Trails Orientation Map are described in greater detail. For locations of these recommended actions, please refer to Figures 5-7.

4.1 Headquarters Kiosk (highest priority)

It is recommended that a kiosk be installed at the Headquarters to provide “self-service” visitor information. It would orient visitors to the Park’s trails and facilities and introduce the major interpretive themes and messages of the Park and for specific trails.

The kiosk would be two-sided with room for up to six 2’ x 3’ panels (Figure 11). It should be supported by two posts and protected by a small roof with sufficient overhang to provide shelter from the sun and rain. It should be visually inviting and provide a focal point for first-time visitors. The best location for a kiosk is to the right of the main entrance. This is centrally located, highly visible, and easily accessible.

Clearly, the design of the kiosk should signal its purpose as a primary source of visitor information. But to reinforce this, a sign should be installed on the front showing the universal symbol for information (“?”) and “INFORMATION” in capitol letters. Depending on the final kiosk design, this sign could either be a vertical or horizontal format.

Content of the kiosk would include the following:

A. Maps for Orientation (Figure 13)

A series of maps and photographs would quickly orient visitors to the Park and its relationship with its surroundings. This panel would include:

- Title: “WELCOME”
- Park orientation map showing the relationship to Panama City.
- Trail orientation map (same map used on trails).
- Detailed map of visitor facilities in the Park Headquarters.

These elements could be integrated into a single plastic panel.

B. General Visitor Information (Figures 12 and 14)

- Title: “INFORMATION”
- Brief characteristics of the trails
- Other things to do in the Park
- Hours
- Prices
- Visitor ethics/regulations

Because of the large amount of text, it is necessary to have a separate panel in English and Spanish. These are located on either side of the central map panel, so that visitors can read them and easily refer to map locations.

C. General Park Interpretation (Figure 15)

This panel explains why the Park is special and different from other protected areas, and introduces the major interpretative themes.

- Title: “WHY IS THIS PARK SPECIAL AND DIFFERENT?”
- It is one of the most accessible rainforests in the world.
- It is the first link in a trans-oceanic biological corridor.
- It is a classroom for school children.
- It is an outdoor laboratory for scientific research.
- It protects rare Pacific dry forest type...home to many interesting plants and animals.
- It contains historic and prehistoric sites and artifacts.
- It is managed by a non-profit organization, not by the government.

The top half of this panel is in Spanish, the lower is in English.

D. History of the Park (Figure 11, Panel D)

This panel will briefly introduce the cultural history of the Park in both English and Spanish.

- Title: “THIS PARK HAS AN UNUSUAL PAST.”
- Photographs or graphics illustrating all three eras.
- Brief text explaining the pre-Columbian, Colonial, and military history of the Park.

E. Plants and Animals (Figure 11, Panel F)

This panel will contain photographs of common plants and animals in the Park.

Explanatory text should be limited to common names (not scientific names).

- Title: “PLANTS AND ANIMALS OF THE PARK.”
- Photographs of common plants and animals.

4.2 Trail Orientation Map (highest priority)

A new trail orientation map is recommended to clarify the hiking trails and provide general information about the Park (see Figure 8 for a mock-up). This map would be located at all trailheads and at other strategic locations around the Park, including the kiosk at the Headquarters building and the guard station at the north entrance.

The trail orientation map would include the following information, in a 16”x 24” or larger vertical format.

Each trail location and name (color coded)

- Topography (contour lines).
- Key attractions and visitor services (universal symbols for water, bathrooms, etc)
- Scale in meters.
- Ethics message: “Please stay on the Trail...Leave Nothing But Footprints and Take Nothing But Pictures.”
- Table of detailed information for each trail, color-coded, including:
 - +Name
 - +Distance
 - +Degree of difficulty
 - +Hiking time
- Emphasize official Park colors.

There are at least two options for installing these signs. Those constructed on sufficiently sturdy base material (1/4 to 1/2 inch thick) could simply be drilled and mounted on wooden posts with bolts. (However, care would have to be taken to ensure that these could not be unscrewed and stolen, perhaps by using special lock nuts.) Signs manufactured with a thinner, less expensive base could be mounted on a wooden frame that could then be affixed to wooden posts. Wooden frames, with or without small roofs, would also help soften the look of these high-tech signs and help them harmonize with their natural surroundings (Figure 20a).

However, it would be wise to conduct a field test of these maps to examine the suitability of the design, size, colors, and locations. Inexpensive plastic poster copies could be installed first to test the signs and obtain comments by visitors and Park personnel. This would also allow time to determine the new location of the STRI research crane, plans for development of the Mirador, as well as time for Park staff to consider sign placement and finalize their ideas on interpretation of individual trails. Later, more permanent orientation signs could be purchased and installed.

Similarly, it would be prudent to purchase a few permanent signs first to test the manufacture and installation process before committing to a complete set.

4.3 Park Headquarters Map (highest priority)

A new Park Headquarters Map should contain detailed information of all visitor facilities in the Sede Administrativa area, including:

- Gift shop
- Bathrooms
- Library
- Office
- Drinking water
- Playground
- Picnic area
- Greenhouse
- Carbon dioxide experiment
- Environmental Education Center
- Trailheads for Los Momótides, Los Caobos, and El Roble trails

This map would be displayed on the orientation kiosk at the Park Headquarters. See Figure 9 for details.

4.4 Directional Signs at the Headquarters (highest priority)

Figure 5 shows the recommendations for new visitor information and directional signs at the Park Headquarters. These include:

- Install icons to direct visitors to the drinking fountain and bathrooms.
- Paint a “BIENVENIDOS-WELCOME” sign over the main entrance.
- Paint a “BANOS” sign over the bathrooms.
- Install directional arrow signs for all three trailheads (Los Caobos and Los Momótides can be on the same sign, see Figure 22).
- Be sure to locate all icons and trail signs so that they are clearly visible when the parking lot is full of cars.
- Use official Park colors.

4.5 Other Directional Signs on Trails (Figure 6 shows the recommendations for trail signs and Figure 22 illustrates the signs)

- Install a directional arrow sign “OFICINA” at the intersection of Los Caobos and El Roble Trails (on same support as the trail orientation map sign).
- Install directional arrow signs with “LA CIENAGUITA” and “EL ROBLE & OFICINA” near the guard house at the north entrance to the Park.
- Use official Park colors.

4.6 Entrance Portals (Figure 2a and c)

- Remove both existing portal signs (Figure 2a and c).
- Install a new entrance portal sign at the southern entrance to the Park.
- Build a new portal sign at the *psychological* northern entrance to the Park.
- Use natural materials (wood and perhaps stone).
- Text: “PARQUE NATURAL METROPOLITANO / BIENVENIDOS.”
- Yellow (or light red-orange) painted lettering on routed boards.
- Top board painted blue, bottom board green (official Park colors).
- Consider safe locations to avoid creating hazards for vehicles.
- Consider lighting (solar?)

These portals could either have massive (perhaps multiple) wooden posts or stone supports for large horizontal wooden planks. A simple interim solution would be to use materials salvaged from other signs. A more ambitious design utilizing stone and concrete could be planned for the future (see Figure 17 for options).

4.7 Headquarters Monument (Figure 2b)

- Text: “PARQUE NATURAL METROPOLITANO / SEDE.”
- Massive brick with horizontal board panels.
- Make more colorful and inviting.
- Yellow or light red-orange letters on routed boards.
- Top board painted blue, bottom board green (official Park colors).
- Restore lighting.

This monument is an important advertising tool. Consider adding banners, flowers, a flag on the second flagpole, and painted wooden figures of children, plants and animals to make it more colorful and inviting. The existing monument signs can be kept essentially as-is, with the possible exception of dropping the “SEDE ADMINISTRATIVA,” or perhaps just shortening it to “SEDE” to reduce confusion, or replacing it with “BIENVENIDOS” (see Figure 21 for some options).

4.8 Secondary Entrance (“La Garita”) Information Board

- Remove existing large metal orientation sign.
- Add a visitor information board behind the guard house.
- Include a trail orientation map and basic trail information.
- Add visitor information on the guard house.
- Add an “INFORMATION” sign on the guard house.

A simple two-panel information board would provide more information and make a much better first impression than the existing metal sign (figure 20b). It would be easier to read and

located away from the road, out of the sun, in a location that is not muddy in the rainy season (Photo 17). Information on hours, prices and regulations should also be added to the guard house.

4.9 Corredor Norte Highway “Welcome” Signs (Figure 1h)

- Remove all three welcome signs along the Corredor Norte.
- These signs could be re-used as Park portal signs or Park welcome signs.

4.10 Highway Overpass Murals

- Create murals to highlight the Park’s northern and southern boundaries.
- Use children’s art.
- Emphasize official Park colors.

The highway overpass bridges at the Corredor Norte Curundu interchange (Photo 15) and the El Dorado interchange would make excellent sites for colorful murals to augment traditional entry portals and advertise the Park. Both are at or very near the southern and northern corners of the Park and are seen by thousands of people daily. Painted animals and rainforest scenes would turn these sterile bridges into vibrant park portals, perhaps as part of school art and environmental education programs.

(Note: The creation of art by various schools, perhaps including an art show and other products, could be as effective a tool for Park advertisement, environmental education and communication as the final mural itself.)

4.11 Highway and Roadway Directional Signs

Add “PARQUE NATURAL METROPOLITANO” and an arrow to existing directional signs at the following locations:

- Edison intersection of Via Ricardo J. Alfaro with Via Juan Pablo II, both directions (Photo 7).
- Via Juan Pablo II just before the entrance to the Corredor Norte on-ramp (Photo 8).
- La Amistad/Juan Pablo II southbound exit from the Corredor Norte (Photo 9).
- Before the Curundu intersection of Via Juan Pablo II and Avenida Ascanio Villalaz (Photo 10).
- Use PNM colors for background and/or fonts, if possible.

These signs will be standard metal highway signs with highly reflective lettering, either full-size panels matching existing signs or smaller metal signs attached to existing sign supports.

Even if signs have their own color standards established by the highway department, it may be possible to include one or more official Park colors in the background panel or font.

4.12 Roadside Park Boundary and Welcome Signs

- Remove all metal roadside boundary signs (Figure 1a,b) except where needed to reinforce Park authority and resolve management problems.
- Move and reorient the existing large wooden Park boundary/welcome sign at the La Amistad / Chino-Panamá intersection (Photo 18).
- Install a new large wooden Park boundary/welcome sign at the Albrook / Clayton intersection and at the secondary entrance (“La Garita”).
- Text: “BIENVENIDOS / PARQUE NATURAL / METROPOLITANO.”
- Use official Park colors.

If necessary, relocate some of these metal signs to reinforce Park authority and resolve problems with illegal activities, such as the entry road to the cargo warehouse. The three large, wooden Park welcome signs would feature three horizontal wooden plank panels on wooden supports. The use of natural materials and rustic routed lettering would set the tone for *Metropolitano Natural Park*. The existing large wooden welcome sign at the Via La Amistad / Chino-Panamá intersection could be refurbished, moved 30 feet, and reoriented at a 30-45 degree angle to improve its visibility to oncoming traffic from the north (Photo 18). For the new welcome signs at the Albrook / Clayton intersection and secondary entrance, re-use signs from the Corredor Norte.

4.13 Park Limits Signs (Figure 1d)

- Replace all existing limits signs with redesigned metal signs.
- Locate new signs for viewing by both pedestrian and vehicular traffic.
- Use official Park colors.
- Title: “**PARK LIMIT**” black lettering on orange-red background (very bold).
- Text: “PARQUE / NATURAL / METROPOLITANO” blue text on white background.

A redesigned sign would emphasize the legal boundary of the Park to passing motorists and especially pedestrians. Very simple and bold colors and text are recommended, eliminating the detailed descriptions of prohibitions and legal references. If a protection message is necessary, consider using something simple like “PROTECTED AREA” or “Do Not Disturb Plants & Animals” rather than a long list of prohibitions. It may be possible to reuse and repaint existing signs.

4.14 Roadside Environmental and Public Information Signs (Figure 1c,j,m)

- Remove the sports trail sign near the northern entrance.
- Remove the native species reforestation sign near the Vivero.
- Remove the coatimundi fire-prevention sign.
- Add a new fire-prevention sign along the Corredor Norte.

Removing these signs will help reduce sign clutter. Install the new fire-prevention sign at a location along the Corredor Norte where fires are commonly started by people tossing cigarettes out of their cars. Another possible location is on the north end of the Park across the road from the Chino-Panamaneño school.

4.15 Accident Prevention and Safety Signs

Clean and remove all obstructions around the animal and pedestrian crossing signs. Add “SLOW” to the animal crossing sign posts. Remove the “Reduce Speed” wooden sign (Figure 1i).

4.16 Roadside Attraction and Approach Signs

- Remove, simplify, or relocate the large wooden “CENTRO DE VISITANTES / MIRADOR” sign (Figure 1k).
- Remove both Vivero attraction signs.
- Remove the roadside sign for the Momótides Trail (Figure 1e).
- Add two new Park Headquarters approach signs on Via Juan Pablo II 50 to 100 meters on either side of the entrance.
- Use official Park colors (except for the new Vivero signs).

Removing some or all of these signs will reduce sign clutter and confusion. The Vivero sign frequently confuses drivers, who think this building is the Park Headquarters. The old “park style” signs may contribute to this confusion. One option is to replace the two existing signs with a new modern metal sign on the fence that looks more like a commercial establishment. As a first step, at least one of the two old signs could be removed, and a new commercial sign added at a latter date.

Consider re-using the Vivero signs as approach signs for the Park Headquarters or as replacement parts for repairing the Equestrian Club sign. If the “CENTRO DE VISITANTES / MIRADOR” sign is retained, it should be repainted using official Park colors. This sign could either be simplified and retained in its current location or relocated to a position across the road and reoriented at 90 degrees to the road so that it is visible from both directions (Figure 19).

4.17 Trail Signs

- Remove all numbered signs from outdated interpretive trail stops.
- Add an “OUCH!...TREES FEEL PAIN, TOO” sign to discourage visitors from carving names on the large cuipo tree on La Cienaguita trail.
- Use official Park colors.

4.18 Prohibition Signs

- Remove all existing prohibition signs.
- This information can be included with Park regulations at the new orientation kiosk and the guard house at the secondary entrance.

4.19 Interpretive Exhibits and Signs (Figure 3)

- Interpret the history of the Park and its significance in a new kiosk at Park Headquarters.
- Replace the northwest vista exhibit with a new biological corridor exhibit.
- Replace the southeast vista exhibit with a new one on the history and growth of Panama City.
- If possible, re-use the existing support structures for both new vista exhibits.
- Assist STRI in re-designing the interpretive sign for the research crane.
- Assist researchers in re-designing the interpretive sign for the carbon dioxide research project.
- Remove the “Natural Bridges” interpretive sign on Camino del Mono Titi.
- Remove the deteriorated photosynthesis exhibit at the Los Trinos vista.
- Plan for an interpretive kiosk on birds for the Los Trinos vista.
- Consider a future exhibit near the northwest vista to interpret the Colonial and WWII military defenses of Cerro Cedro.
- Consider a future exhibit of the natural and cultural resources of Hill 66.
- Conduct careful planning before installing interpretive trail signs and exhibits.

4.20 Official Park Colors, Font, and Letterhead

- Recommended official Park colors are blue, green, and red-orange.
- Select an official font for “PARQUE NATURAL METROPOLITANO.”
- Use official Park fonts and colors whenever possible.

Having official Park colors does not prevent the use of other colors needed for visibility, clarity or impact. For example, yellow routed lettering may be appropriate for many Park roadside signs. In addition to official colors, it is important for the Park to select a particular font for “PARQUE NATURAL METROPOLITANO” on signs, maps, and printed letterhead. See Figure 10 for some possibilities.

4.21 Park Map

- Update the map that shows the entire Park.

This revised map could be used at the Park Headquarters, in visitor brochures, and elsewhere in the Park where additional information is needed to supplement the trail orientation map.

Table 4. Summary of proposed visitor information panels, signs, and interpretive exhibits, Metropolitan Natural Park.

Sign Type	Kind of Material	Size	Quantity Needed	Figure Reference
HEADQUARTERS KIOSK				
<i>Kiosk structure</i>	wood	TBD	1	Figure 11
<i>Panel A – Information (English)</i>	plastic	24" x 36"	1	Figure 12
<i>Panel B – Orientation Maps</i>	plastic	24" x 36"	1	Figure 13
<i>Panel C – Information (Spanish)</i>	plastic	24" x 36"	1	Figure 14
<i>Panel D – Historic Interpretation</i>	plastic	24" x 36"	1	TBD
<i>Panel E – General Interpretation</i>	plastic	24" x 36"	1	Figure 15
<i>Panel F – Plants and Animals</i>	plastic	24" x 36"	1	TBD
LA GARITA INFO BOARD				
<i>Information board structure</i>	wood	60" x 52"	1	Figure 20b
<i>Panel A – Trail Orientation Map</i>	plastic	16" x 22"	1 of 7	Figure 8
<i>Panel B – Trail Information</i>	plastic	16" x 22"	1	Notebook
LA GARITA				
<i>"INFORMATION"</i>	wood	5" x 24"	1	Notebook
<i>Visitor Information (Spanish)</i>	plastic	10" x 18"	1	Notebook
<i>Visitor Information (English)</i>	plastic	10" x 18"	1	Notebook
INTERPRETIVE EXHIBITS				
<i>Northwest Vista</i>	plastic	TBD	1	TBD
<i>Southeast Vista</i>	plastic	TBD	1	TBD
<i>STRI Research Crane</i>	plastic	TBD	1	TBD
<i>Carbon Dioxide Experiment</i>	plastic	TBD	1	TBD
<i>WWII "El Castillo" Building</i>	plastic	TBD	1	TBD
<i>Spanish Colonial Fortifications</i>	plastic	TBD	1	TBD
<i>Los Trinos Birds</i>	plastic	TBD	1	TBD
<i>Hill 66 History and Nature</i>	plastic	TBD	1	TBD

TBD = To Be Determined

Table 4. Continued.

Sign Type	Kind of Material	Size	Quantity Needed	Figure Reference
HIGHWAY AND ROADWAY SIGNS				
<i>Highway and Roadway Directional</i>	metal	various	5	Figure 18
<i>Park Entrance Portal</i>	wood/stone	various	2	Figure 17
<i>Park Welcome</i>	wood	8' x 10'	2	TDB
<i>Roadside Approach</i>	metal	TBD	2	Figure 19
TRAIL SIGNS				
<i>Trail Orientation Map Board</i>	wood	60" x 32"	7	Figure 20a
<i>Trail Orientation Map</i>	plastic	16" x 22"	7	Figure 8
<i>Trail Directional</i>	wood	various	5	Figure 22
HIGHWAY MURAL				
Mural on existing structure	painted	TDB	2	none
HEADQUARTERS MONUMENT				
Monument at entrance	wood/painted	TDB	1	Figure 21
MISCELLANEOUS				
<i>Park Limits</i>	metal	TBD	20-30	TBD
<i>Headquarters Directional</i>	wood/painted	Various	TBD	Notebook
<i>Fire Prevention</i>	TBD	TBD	2	None

TBD = To Be Determined

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Figures



Figure 1. Examples of existing roadside signs.



a



f



i



b



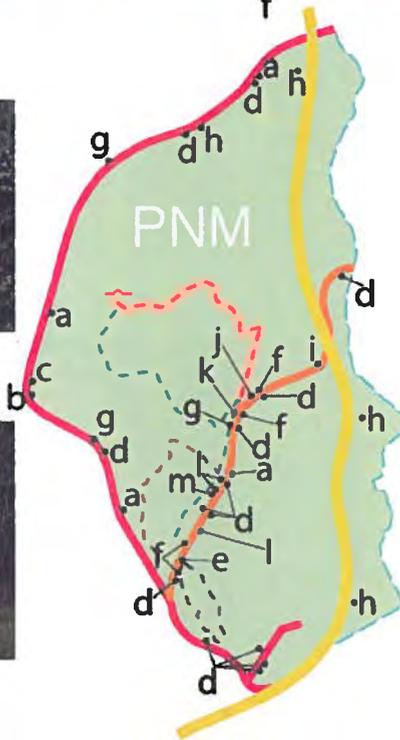
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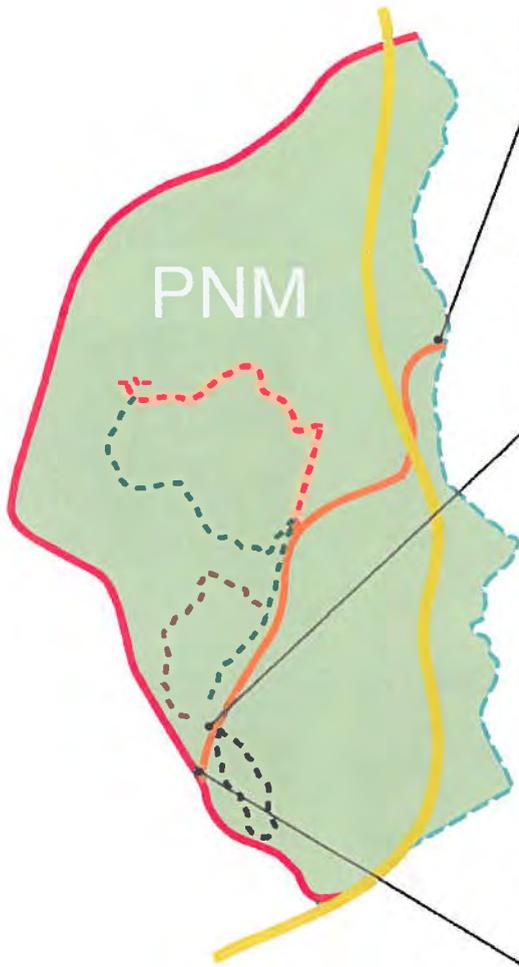
h



m



Figure 2. Existing portal and monument signs.



a. Western portal sign



b. Headquarters entrance monument



c. Southern portal sign

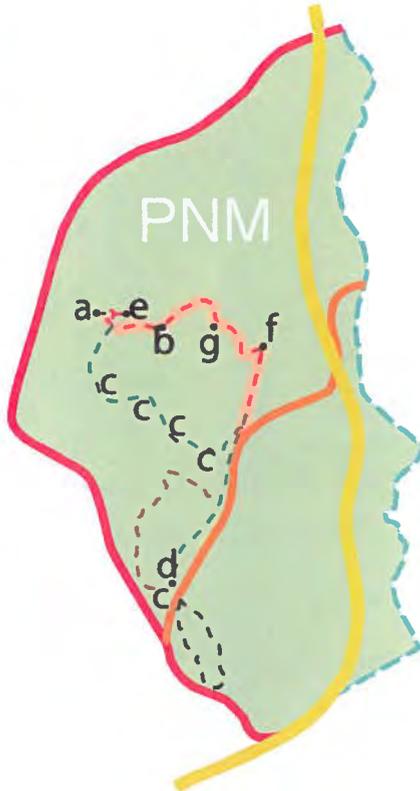
Figure 3. Existing interpretative signs and exhibits.



a. Northwest vista



e. Southeast vista



b. Natural bridges



f. STRI crane



c. Scientific names



d. Carbon dioxide



g. Photosynthesis

Figure 4. Existing trail and visitor information signs.



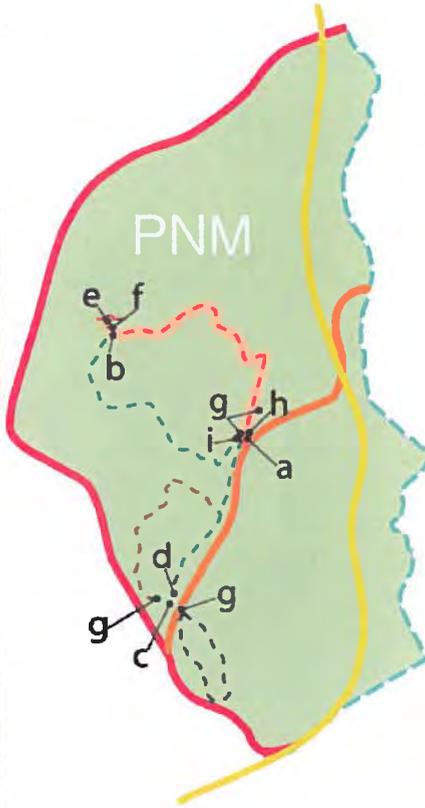
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i



Figure 5. Recommendations for signs and interpretation at the Park headquarters.

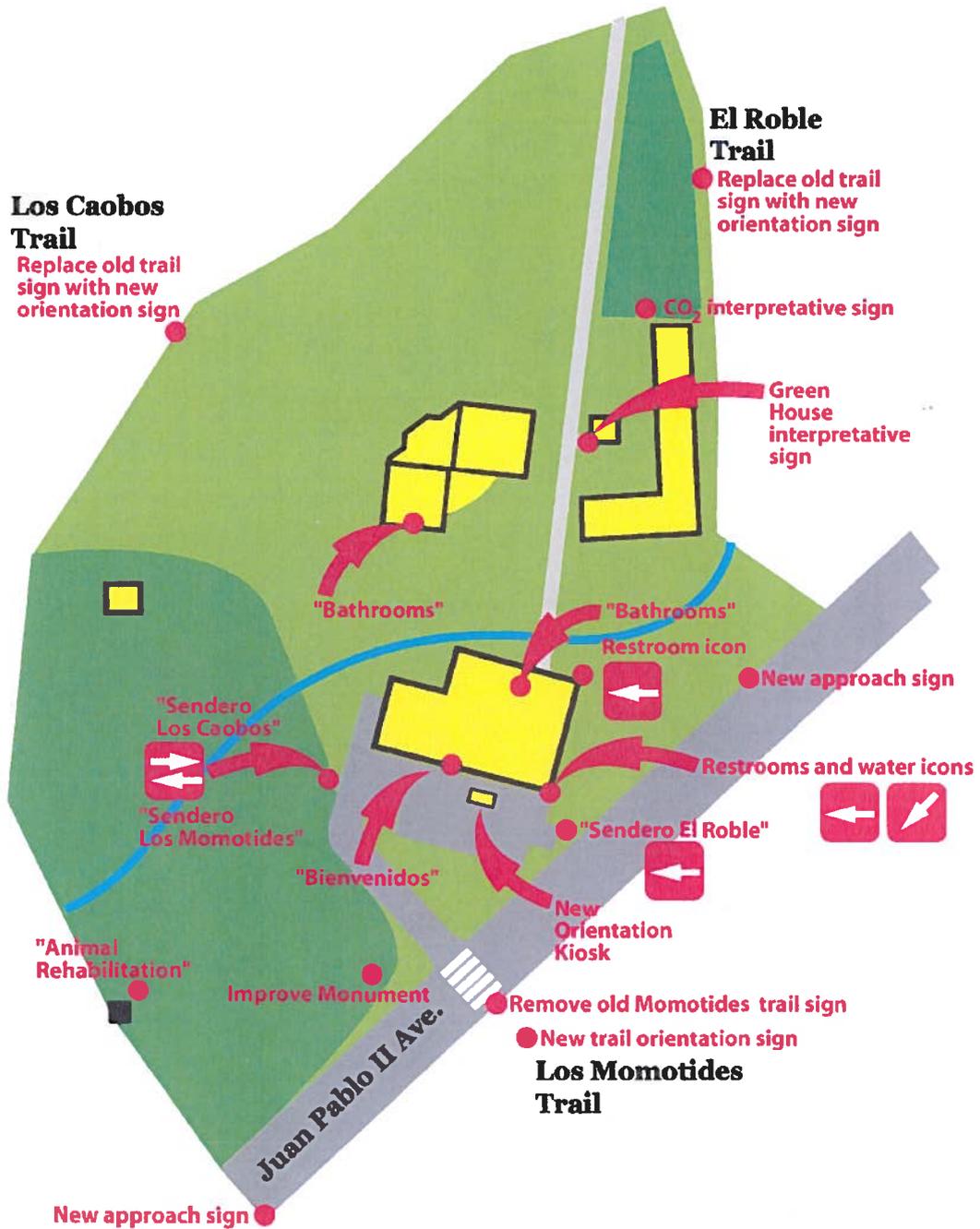


Figure 6. Recommendations for trail signs and interpretation.

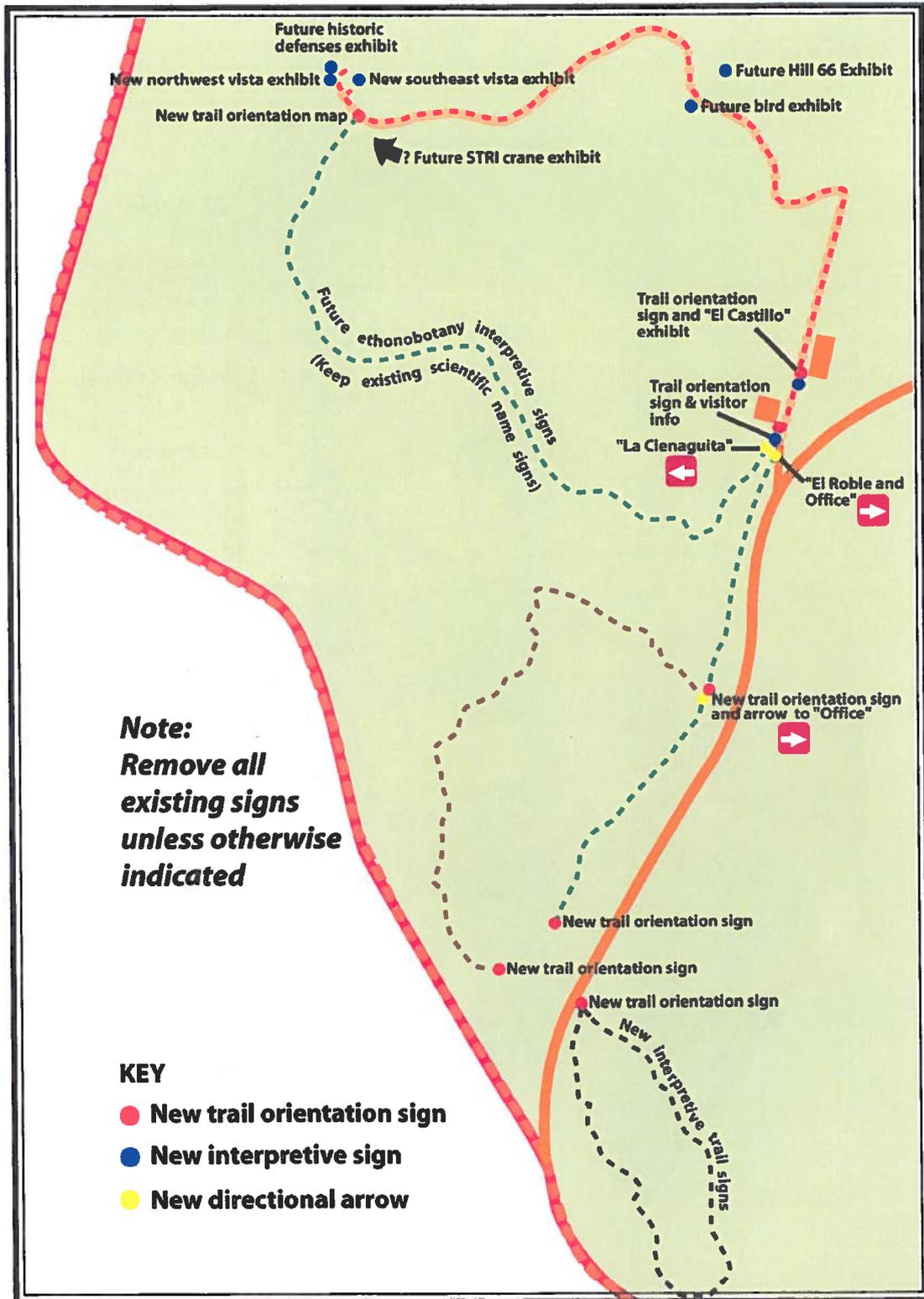


Figure 7. Recommendations for roadway signs.



Figure 8. Trail orientation map.

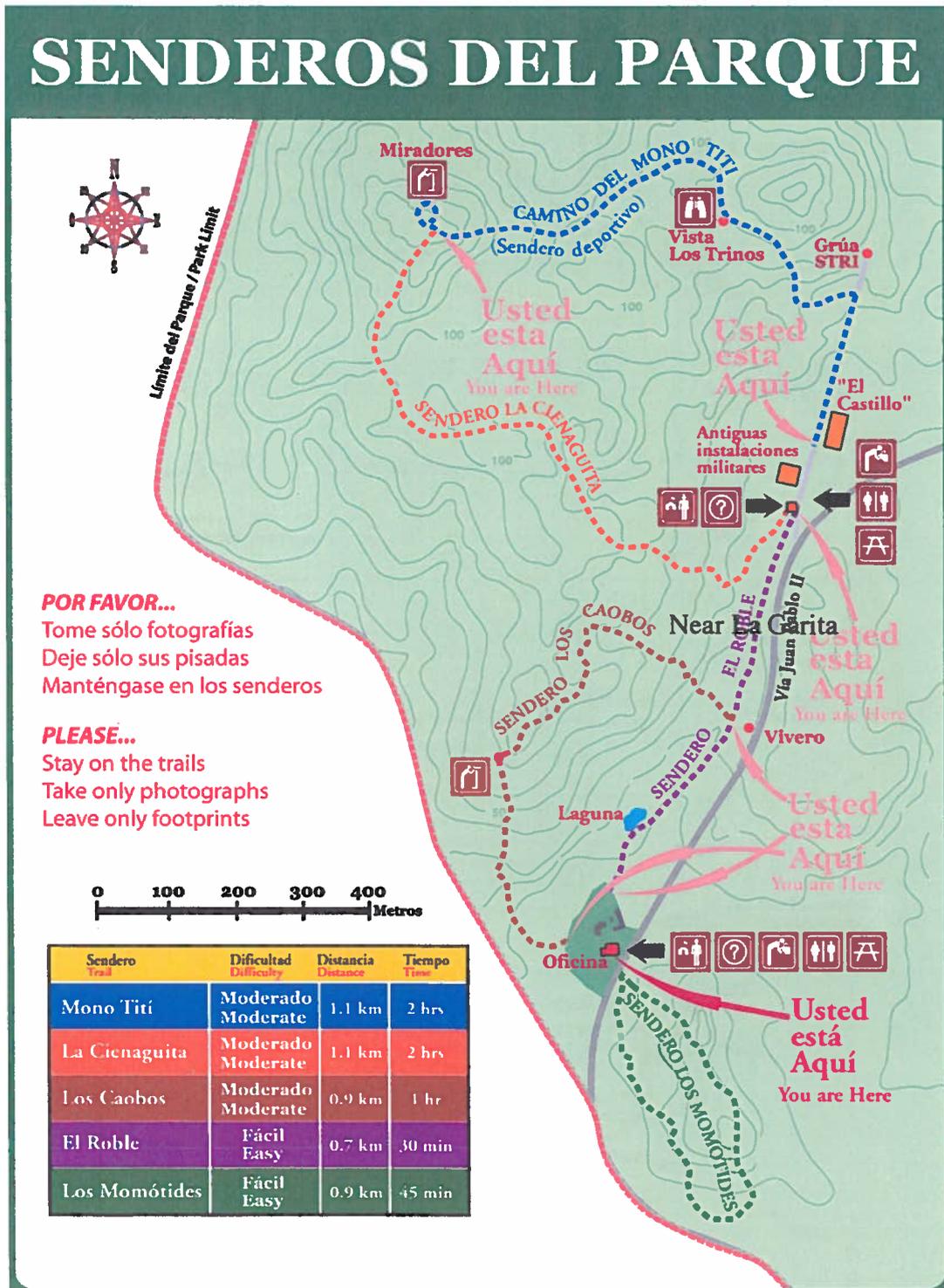


Figure 9. Park headquarters map.

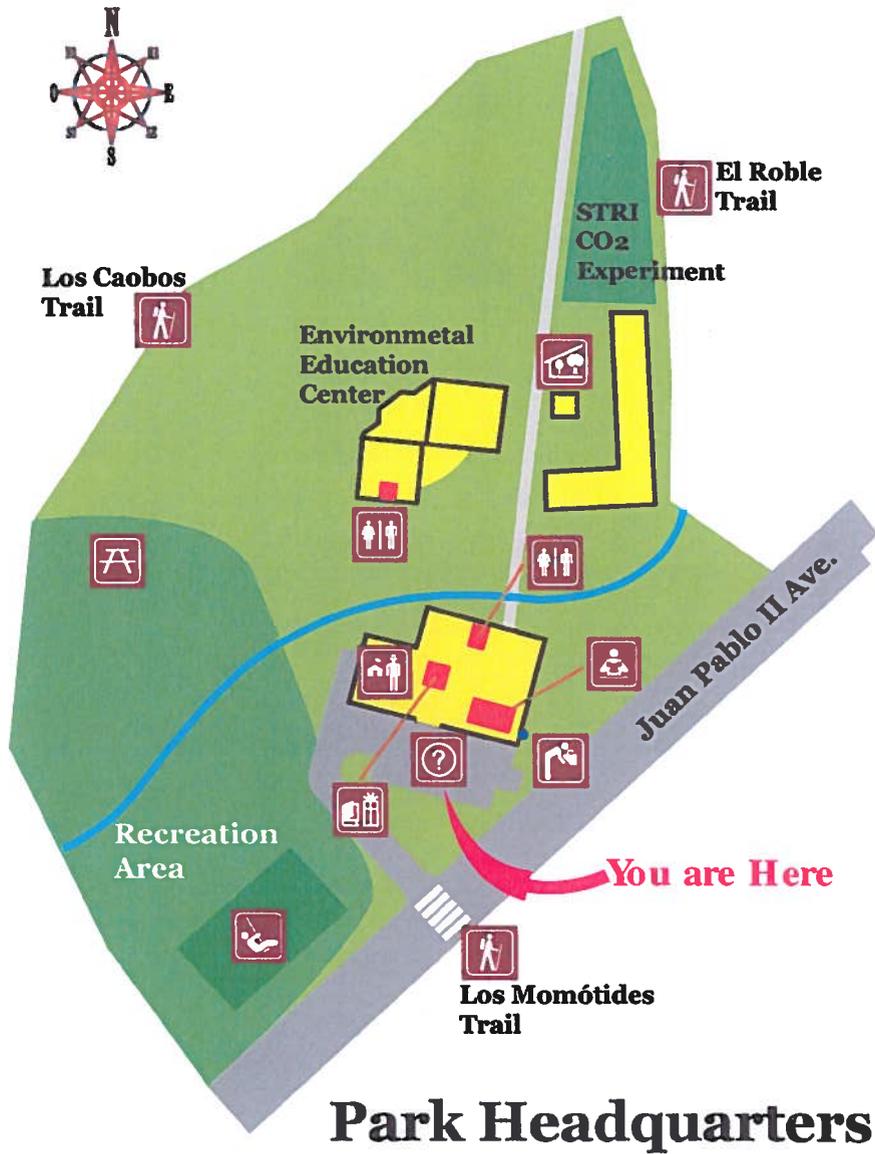


Figure 10. Official Park colors.

Pantone Red 032



100%



80%



60%



50%



40%



20%

10%

Pantone 2935



100%



80%



60%



50%



40%



20%

10%

Pantone 348



100%



80%



60%



50%



40%



20%

10%



Figure 11. Recommended kiosk design.

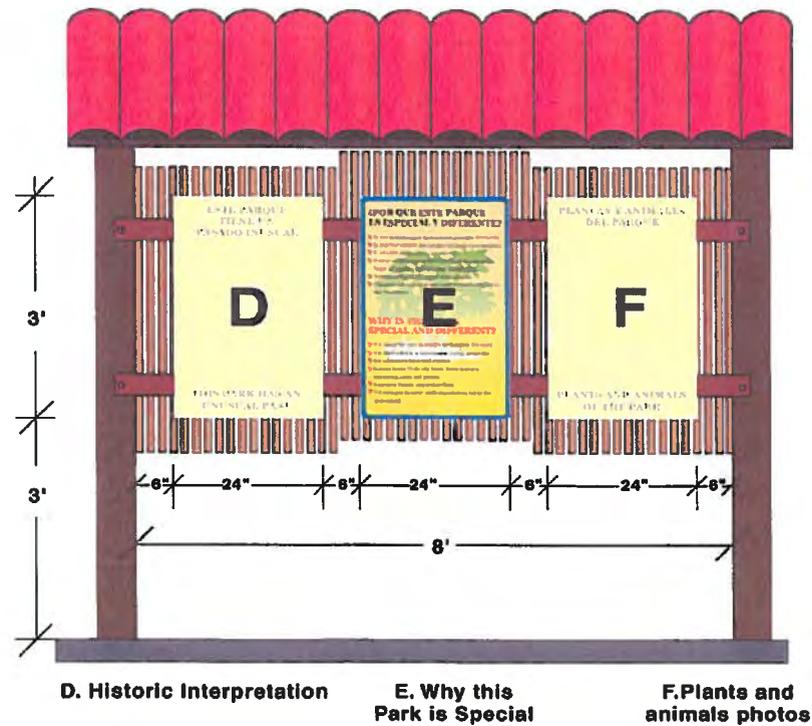
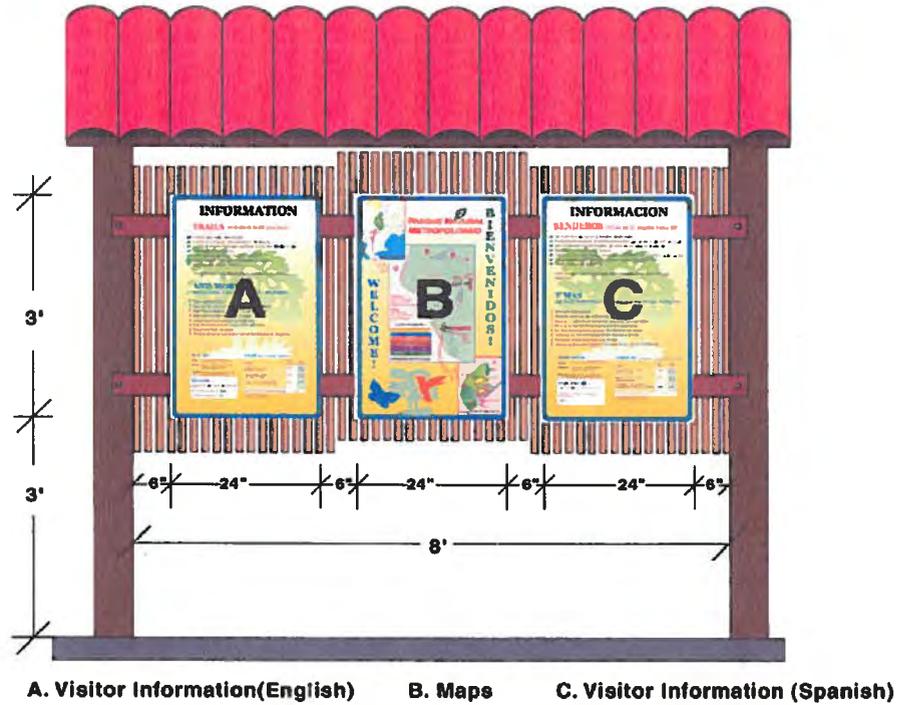


Figure 12. Kiosk panel “A” (2 feet x 3 feet).

INFORMATION

TRAILS WHICH IS BEST FOR YOU?

- A short, easy walk: Momótides.
- A more challenging hike: Caobos or Cienaguita.
- A great look into the forest: Los Trinos on Camino del Mono Tití.
- Avoiding crowds: Caobos.
- Birds: Camino del Mono Tití (by “El Castillo”).
- A view: Cedro Hill on the Camino del Mono Tití.
- Jogging: Camino del Mono Tití.

The best time for wildlife and bird viewing is early and late.

AND MORE WHAT ELSE CAN YOU DO AT THE PARK?

- ✂ Take a guided tour.*
- ✂ See injured animals that are being rehabilitated.
- ✂ Rent the conference room for a special event.
- ✂ Rent the Park van for a special event.
- ✂ Expand your knowledge in the library.
- ✂ Buy souvenirs or cold drinks at the gift shop.
- ✂ Become a Park volunteer.
- ✂ Make a donation to the environmental education program.

HOURS

PARK: Every day 6:00 AM to 5:00 PM

OFFICE: Monday-Friday 8:00 AM to 4:00 PM
Saturday 8:00 AM to 1:00 PM

LIBRARY: Monday-Friday 10:30 AM to 4:00 PM
Saturday 8:00 AM to 1:00 PM

PLEASE...

Leave your cigarettes, pets, bicycles, and radios at home.

Do not disturb the plants and animals...

Because this is *their* home. Thanks!!

FEES HELP SUPPORT THIS PARK

Category	Without Guide	With Guide*
National visitors – adults (Groups of 5 or more)	\$1.00	\$3.00 (\$2.00)
Foreign Visitors – adults (Groups of 5 or more)	\$2.00	\$4.00 (\$3.00)
Under 17 years old, students with ID and Senior Citizens (local & foreign)	\$0.50	\$2.00
Visitor Guide (trail map and Park information)	\$1.50	

*Guided tours by reservation only.



Figure 13. Kiosk panel "B" (2 feet x 3 feet).

WELCOME!

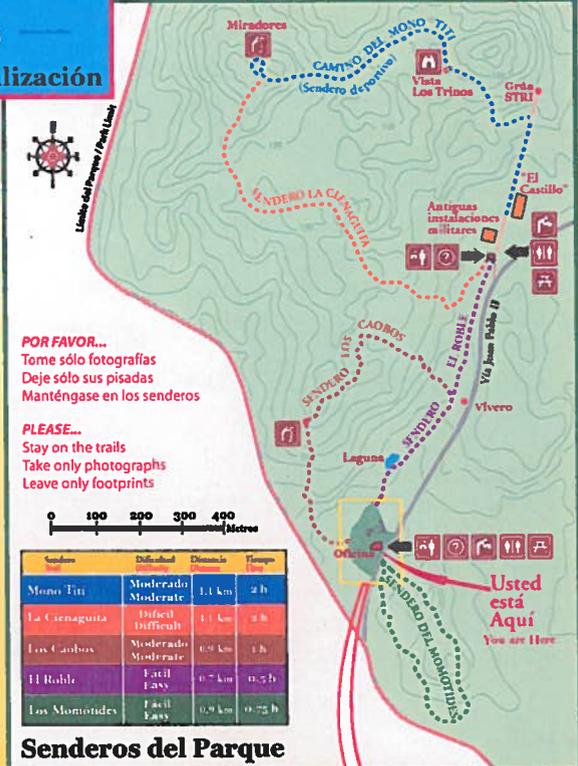


PARQUE NATURAL METROPOLITANO

BIENVENIDOS!



Localización



POR FAVOR...
Tome sólo fotografías
Deje sólo sus pisadas
Manténgase en los senderos

PLEASE...
Stay on the trails
Take only photographs
Leave only footprints

0 100 200 300 400 Metros

Senderos	Dificultad	Distancia	Tiempo
Mono Tito	Moderado	1.1 km	2 h
La Cienaguita	Difícil	1.1 km	2 h
Los Caobos	Moderado	0.9 km	1 h
El Buhle	Fácil	0.7 km	0.5 h
Los Momotodes	Fácil	0.9 km	0.75 h

Senderos del Parque

Usted está Aquí
You are Here





Sede Administrativa

Figure 14. Kiosk panel “C” (2 feet x 3 feet).

INFORMACION

SENDEROS ¿CUAL ES EL MEJOR PARA TI?

- Una caminata fácil y corta: Sendero Momótides
- Pruébate a ti mismo en el sendero con mayor pendiente. Caobos o Cienaguita
- Una mirada dentro del bosque: Los Trinos en Camino del Mono Tití
- Alejate de las multitudes: Caobos
- Observa varias especies de aves: Camino del Mono Tití a la altura de El Castillo
- Una excelente vista: Cerro Cedro por el Camino del Mono Tití
- Trotar: Camino del Mono Tití

Los mejores momentos para ver aves y animales son el amanecer y el atardecer.

Y MAS ¿QUE OTRAS COSAS PUEDES HACER EN EL PARQUE?

- ✂ Una caminata guiada*
- ✂ Mirar los animales en rehabilitación
- ✂ Alquilar el salón de conferencias para eventos especiales
- ✂ Alquilar el bus del Parque para eventos especiales
- ✂ Ampliar tus conocimientos en la biblioteca ambiental
- ✂ Comprar un recordito o bebidas frías en la tienda
- ✂ Participar como voluntario del Parque
- ✂ Hacer una donación para el Programa de Educación Ambiental

HORARIOS

PARQUE: Todos los días de 6:00 AM a 5:00 PM

OFICINAS: Lunes-Viernes 8:00 AM a 4:00 PM
Sábado 8:00 AM a 1:00 PM

BIBLIOTECA: Lunes-Viernes 10:30 AM a 4:00 PM
Sábado 8:00 AM a 1:00 PM

TARIFAS AYUDENOS A MANTENER EL PARQUE

Categoría	Sin Guía	Con Guía*
Visitantes nacionales – adultos (Grupos de 5 ó más)	\$1.00	\$3.00 (\$2.00)
Visitantes Extranjeros – adultos (Grupos de 5 ó más)	\$2.00	\$4.00 (\$3.00)
Menores de 17 años, estudiantes con carnet, jubilados (nacionales y extranjeros)	\$0.50	\$2.00
Gula del Parque (información y mapa)	\$1.50	

*Servicio de Guías con previa reservación

POR FAVOR...

Deja tus cigarrillos, mascotas, bicicletas y radios en casa.

No lastimes a las plantas o animales, porque ésta es su casa.

Gracias!!

Figure 15. Kisok panel “E” (2 feet x 3 feet).

¿POR QUE ESTE PARQUE ES ESPECIAL Y DIFERENTE?

- Es uno de los bosques lluviosos más accesible del mundo.
- Es el primer eslabón del corredor biológico trans-oceánico.
- Es un salón de clases para estudiantes.
- Protege un bosque seco del Pacífico casi desaparecido... hogar de plantas y animales muy interesantes.
- Esta administrado por un patronato sin fines de lucro y no por el gobierno.
- Es un laboratorio natural para la investigación científica.

WHY IS THIS PARK SPECIAL AND DIFFERENT?

- It is one of the most accessible rainforests in the world.
- It is the first link in a trans-oceanic biological corridor.
- It is a classroom for school children.
- It protects rare Pacific dry forest...home to many interesting plants and animals.
- It is managed by a non-profit organization, not by the government.
- It is an outdoor laboratory for scientific research.

Figure 16. Recommended font styles.

**PARQUE NATURAL
METROPOLITANO**

For PNM Signs

ITC ERAS

**PARQUE NATURAL
METROPOLITANO**

General text

GIORGIA BOLD



**PARQUE NATURAL
METROPOLITANO**

**PARQUE NATURAL
METROPOLITANO**

**PARQUE NATURAL
METROPOLITANO**

Figure 17. Possible entrance portal designs.

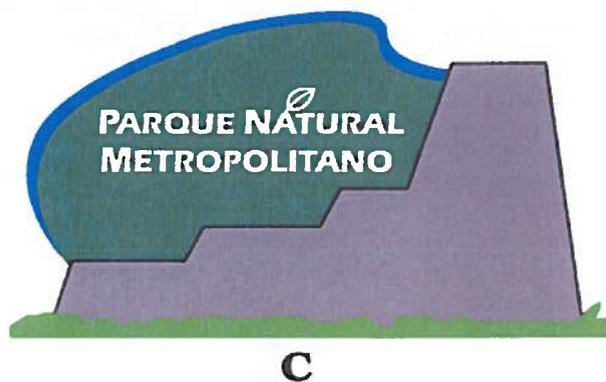


Figure 18. Examples of roadway directional signs for the park.



Figure 19. Headquarters approach and sede/mirador signs.



Figure 20. Recommended sign boards.

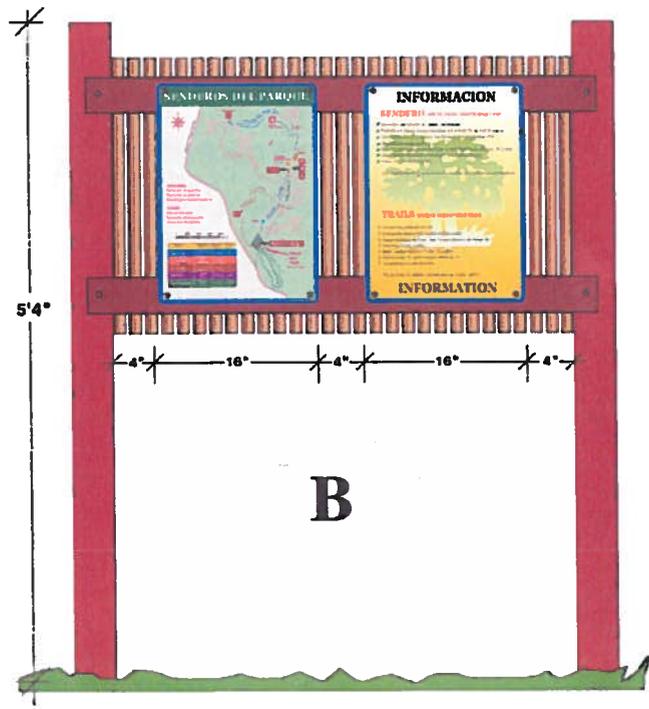
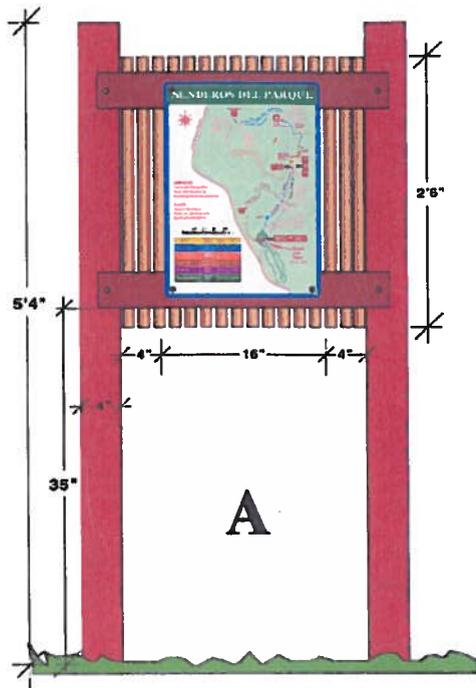


Figure 21. Headquarters monument.



Existing

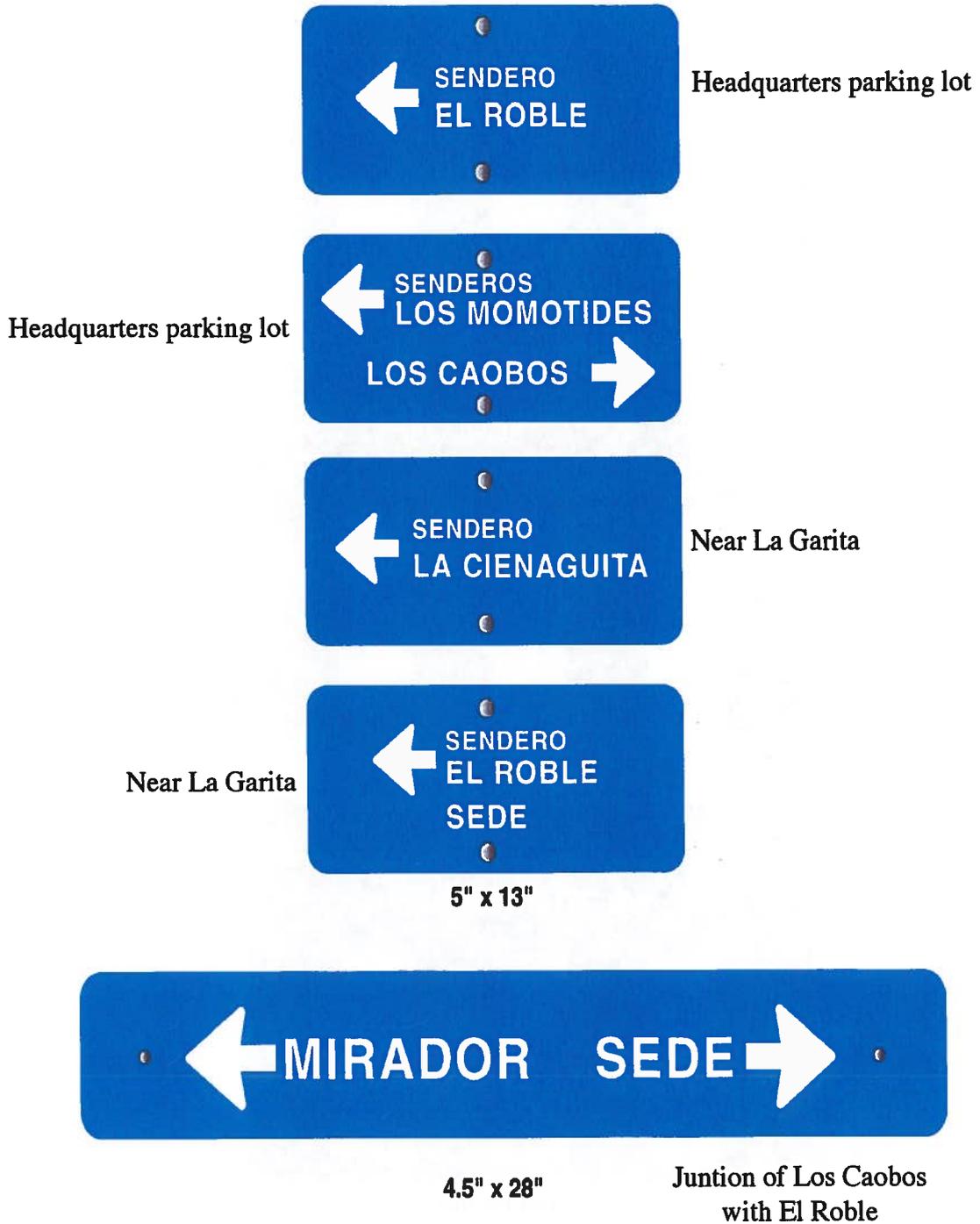


Recommended



Optional design

Figure 22. Recommended trail directional signs.



Photographs





Photo 1. The eastern entrance to the Park on Via Juan Pablo II at the Curundu River is cluttered by signs. The Park portal sign is difficult to see (see yellow arrow). Directional signs to the Park should be added to one or both of the green highway signs.



Photo 2. Sign pollution at the secondary entrance to the Park.



Photo 3. Suggested location for a new entrance portal sign along Via Juan Pablo II near the northern entrance to the Park.



Photo 4. Suggested location for a new entrance portal sign along Via Juan Pablo II near the southern entrance to the Park.

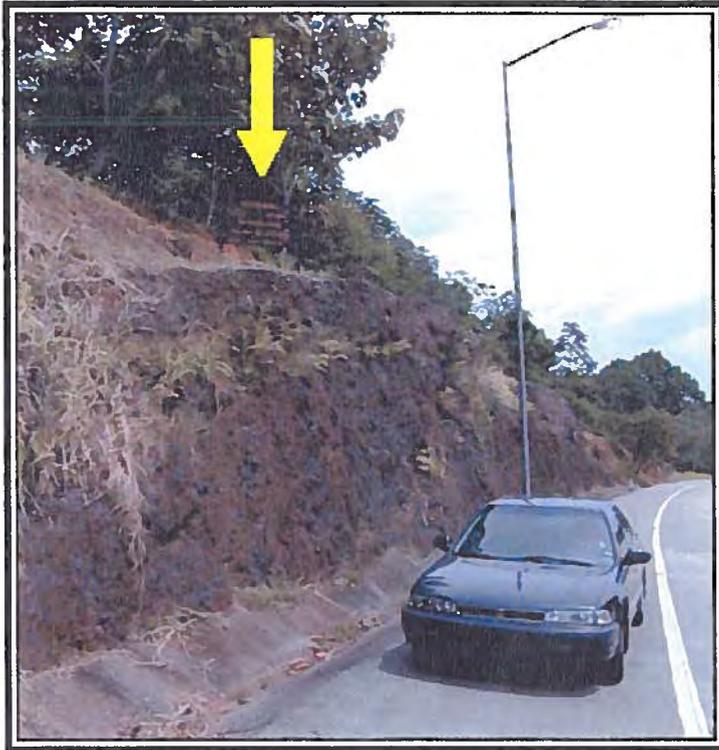


Photo 5. This welcome sign along the Corredor Norte is nearly impossible to see and should be removed.

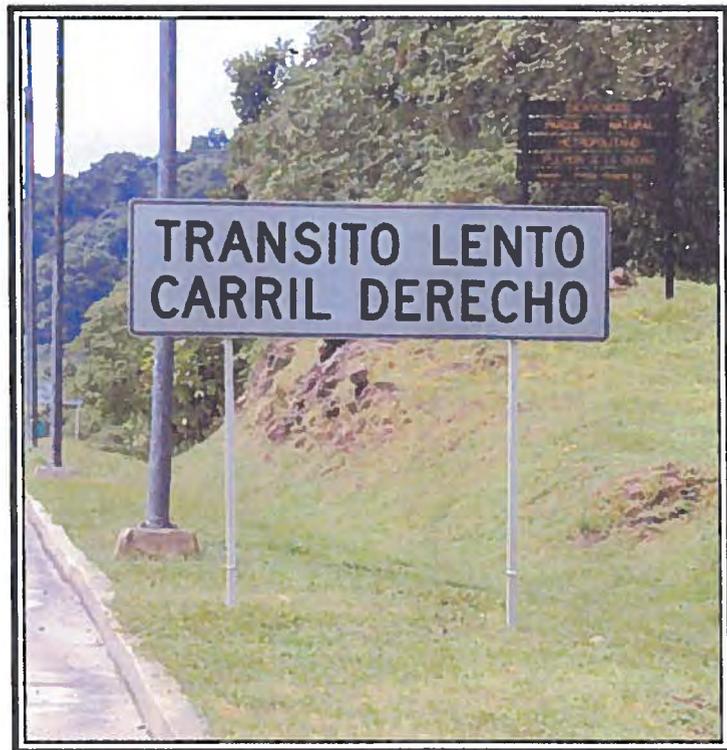


Photo 6. Highway sign and Park welcome signs along the Corredor Norte. Sign size and color make a significant difference in readability.

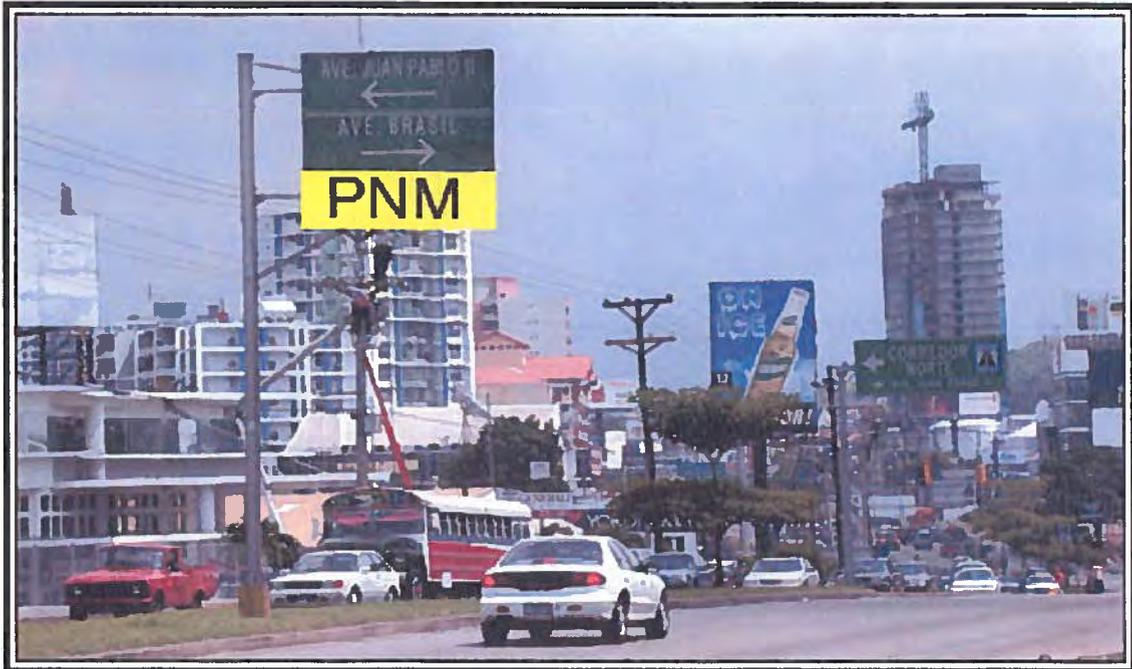


Photo 7. A “PNM” sign and arrow is recommended for the highway signs at the Edison intersection of Via Juan Pablo II and Via Ricardo J. Alfaro (both directions).

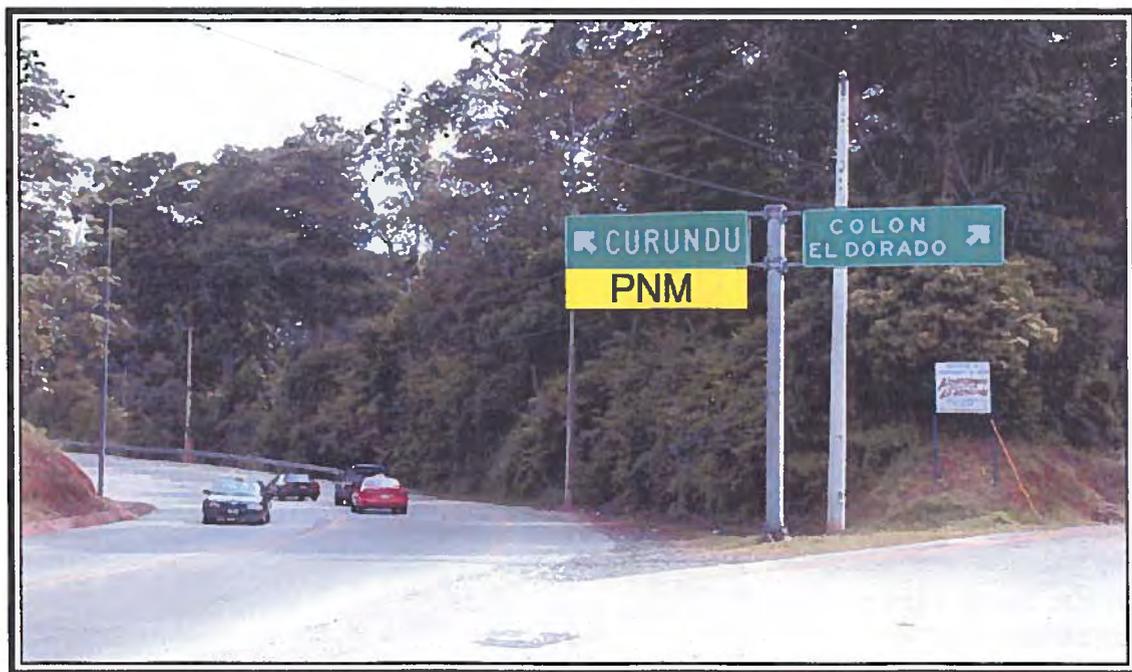


Photo 8. A “PNM” sign and arrow below the Curundu sign would help visitors at this intersection on Via Juan Pablo II.



Photo 9. A “PNM” sign and arrow would help identify this off-ramp on Corredor Norte as the best route to the Park.



Photo 10. A “PNM” sign and arrow to the Park is recommended on this sign along Avenida Ascanio Villalaz.



Photo 11. The Los Trinos overlook is an excellent location for an interpretive display or kiosk on birds.



Photo 12. The northwestern vista is an excellent location for a new interpretive sign on the trans-oceanic biological corridor.



Photo 13. The southeastern vista could interpret the history and growth of Panama City.

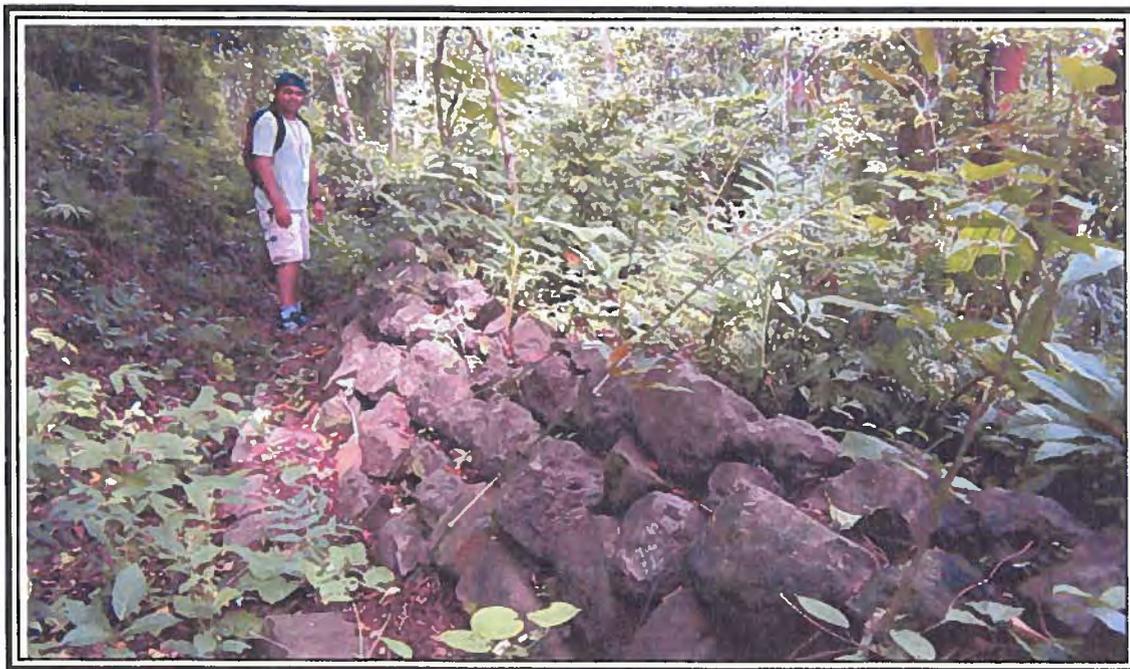


Photo 14. The Colonial-era trench on Cerro Cedro could be interpreted at the northwestern vista nearby.

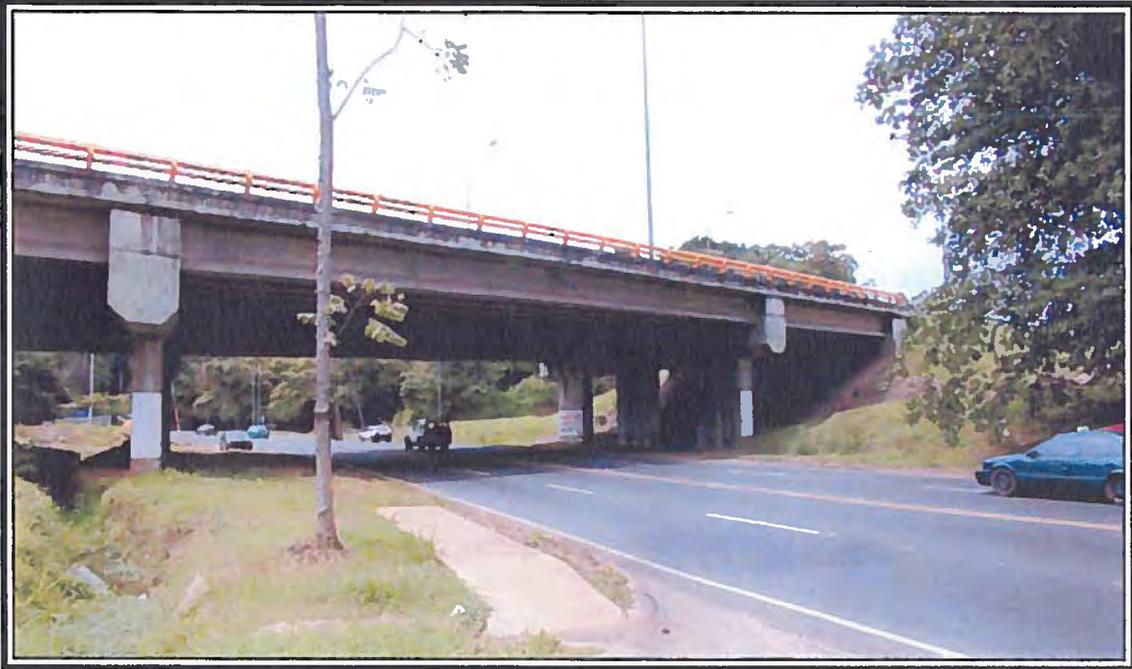


Photo 15. Colorful murals on the Curundu overpass of the Corredor Norte could help advertise the Park.



Photo 16. An interactive interpretive exhibit here at the playground could be developed for children.



Photo 17. A sign board with map and orientation information is recommended at the trail junction behind the guard house at the secondary entrance.



Photo 18. The Park welcome sign at the intersection of Via La Amistad and Chino-Panamañeo should be refurbished and moved and reoriented so that it is more visible to southbound traffic.

