# **Design Study Report**

The existing nature center building is an icon for the neighborhood and community. As the area has grown and developed, the nature center improved and upgraded its facilities as resources allowed. Improvements to the facility to date have included additions to the log building and other deferred maintenance projects.

The existing building has been evaluated several times for its code compliance and is lacking compliance in several areas, including its electrical wiring and roofing. While nostalgia for the existing building is understood, both the division and the Friends of Eagle River Nature Center feel that continuing to maintain and operate the existing structure, even if its footprint was extended, is not in their, and the community's, best interest. The State Historic Preservation Office also found that the building has no historical value (see Appendix D).

The existing facility is on the edge of Chugach State Park and bordered to the north and west by residential property. The division requested to evaluate the surrounding area of the existing nature center for a land base that would facilitate an estimated 20 acres of new development within Chugach State Park, but with a sufficient buffer from adjacent property owners.

During the fall of 2009, the division prepared and evaluated the four site locations (see Figure 3). Each site was evaluated based on planning issues, environmental resources, critical habitat, view shed, potential engineering and drainage issues, and natural and cultural history. Three sites are located on lands within the Bureau of Land Management (BLM) Power Withdrawal. The division currently has a management agreement with BLM and will be applying for a complete land transfer by the end of 2011.

## **Parameters and Considerations:**

- The objective of site selection is to minimize the impact of the undisturbed mature forest.
- The community endorsed a short access road and minimizing the development's impact.
- Proposed park access roads have seasonal drainage and defined drainages flowing north to south down to the Eagle River floodplain or lowland wetlands.
- To reduce maintenance costs, a compact development that minimizes the road length and size of the parking area is preferred.
- The park entrance road will be a two-lane, 24'-wide paved access road with a maximum running grade of six percent.
- The design vehicle is a school bus or a recreational vehicle towing a passenger car.
- All proposed sites have mountain views and wildlife viewing opportunities.
- All sites are outside avalanche zones and are within upland areas.

# **Site Descriptions**

#### Site "A"

Location: Mile 11.5 Eagle River Road, Falling Water Creek (approximately one mile from the existing nature center)

**Description:** Site "A" is located within the Chugach State Park boundary and the BLM Power Withdrawal Land. Site "A" has a year-round open water stream with spawning salmon and bears present in the fall. Vegetation in the site area is comprised of mixed birch and spruce, bordered to the south by a black spruce bog and an alluvial gravel fan with cottonwood trees and alders.

The closest neighbor is 0.15 miles to the northwest; mature trees screen the proposed site from the home. An overgrown pioneer road traverses the site parallel to Eagle River Road, which is used by local hunters and hikers to access the area.

Access to the site would require constructing a 0.33-mile road. Development at the site would require 10 to 20 acres of impact, including roadways, parking, building sites, trails, and interpretive exhibits. Development would require relocating existing trails and constructing a new one-mile trail connecting to the existing Crow Pass/ Iditarod Historic Trail.

### Site Location "B"

Location: Mile 12.5 Eagle River Road, south of the existing nature center

**Description:** Site "B" lies within a disturbed area that was an old dirt race track oval and staging area developed by the original homesteader. It is within the Chugach State Park boundary and the BLM Power Withdrawal. The surrounding mountains, fresh water stream habitat, and mixed forest dominate the viewshed. Salmon and bears are present in the site area; the freshwater stream to the south lies within the Eagle River floodplain and includes a series of beaver dams and lodges. Bears follow the stream east and west, and cross through the neighborhood south to north to the high country peaks.

The elevation at the site is a moderate slope with an average of 12% cross slope. The soils are primarily glacial moraine silts & gravel with clay layers. The area is overgrown with secondary growth cottonwood, spruce, and birch trees.

The closest neighbor is 0.15 miles from the site. Access to the site would require constructing a 0.11- to 0.45-mile road and the proposed development would impact 10 to 22 acres of existing disturbed secondary growth of cottonwood, birch, and spruce. Screening using landforms and vegetation would be required to minimize light pollution and noise disturbance to neighbors.

Site "B" would enable the nature center to retain much of the existing trail infrastructure. The trail system does not, however, meet ADA standards and would need to be upgraded.

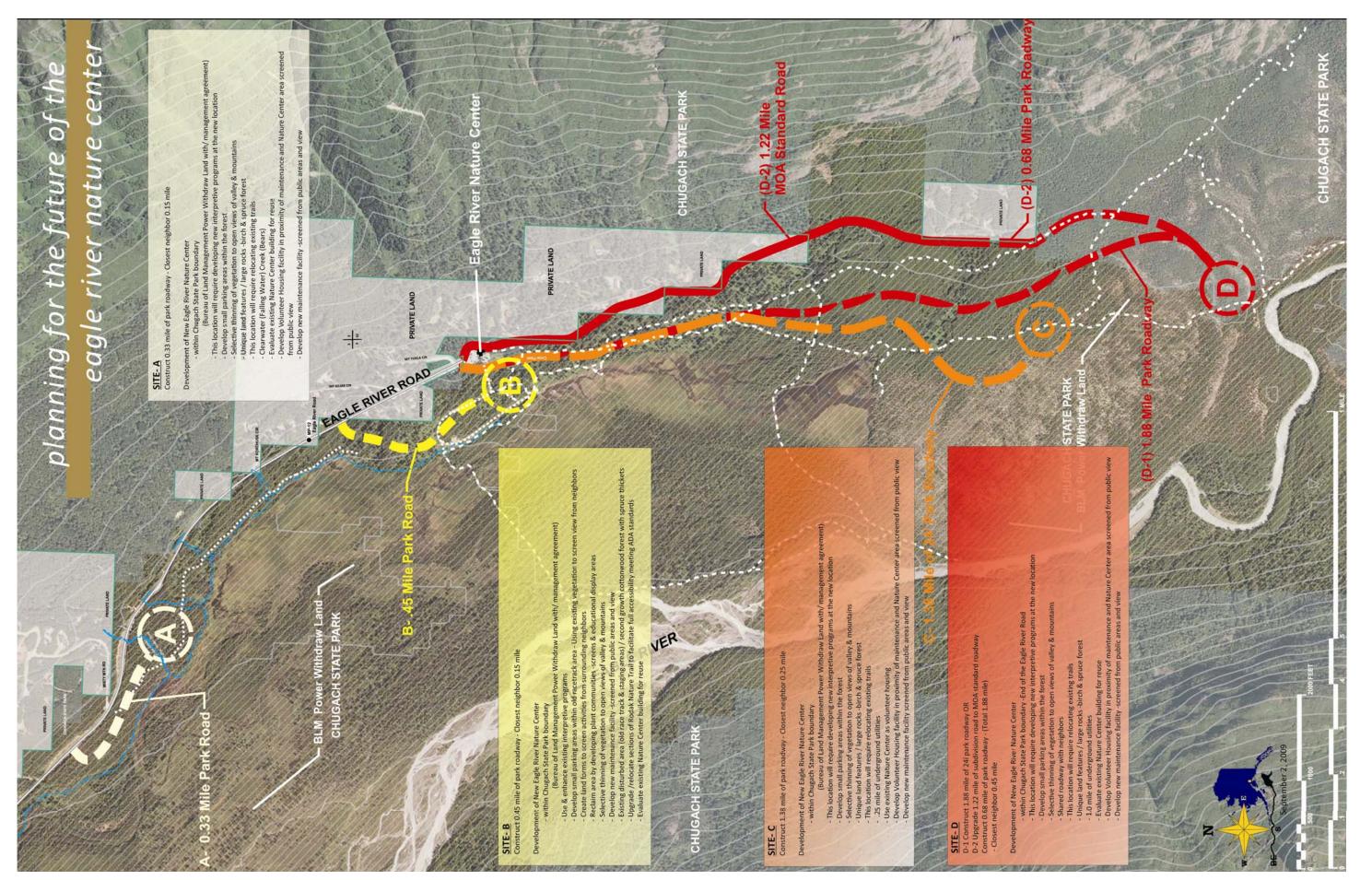


Figure 3. Site location alternatives

#### Site Location "C"

**Location:** Approximately 1.38 miles east of the existing center

**Description:** Site "C" is located entirely within the Chugach State Park boundary, outside the BLM Power Withdrawal. The site is fairly flat and located on the edge of a boulder field, lowland wetlands, and a floodplain. Of all the site locations, Site "C" was considered the most unique and offered a high wilderness experience.

The closest neighbor is 0.25 miles from the site. Construction of a 1.38-mile park access road would be required; the entrance road would impact 1.38 miles of the Crow Pass/ Iditarod Historic Trail and the Rodak Nature Trail would need to be relocated. The site would impact 10 to 20 acres of a mixed spruce and birch forest. Selective thinning would be required to provide views of the surrounding mountains. Due to the relocation of trails, Site "C" would also require developing new formal programming.

### Site Location "D"

**Location:** Approximately 1.88 miles east of the existing center

**Description:** Site "D" would create an up-valley wilderness experience for visitors, similar to Site "C." The site's proximity to the main Eagle River channel makes it a beautiful location for a nature center. The closest neighbor is 0.45 miles from the proposed site. Construction of a 1.88-mile park access road would be required, including an upgrade of 1.22 miles to the existing subdivision road. This site is entirely in uplands and would impact 10 to 20 acres of a mixed spruce and birch forest. Selective thinning would be required to allow for views of mountain peaks. This site would also require developing a new trail system and formal programming.

## **Conclusions**

The preferred site location, determined from an evaluation of alternative site locations and public input, was Site Location "B."

Site "A" was not a preferred choice primarily because of potential impacts to bear habitat and the additional cost of trail construction. Site "A" also did not meet the Friends of Eagle River Nature Center's goal to maintain their existing trail network and programming.

Sites "C" and "D" did not meet the Friends of Eagle River Nature Center's core objectives. The community also did not support the locations because of their potential impact to upper valley development. The cost of constructing the access roads and extending underground electric and phone utilities did not add to the desirability of development at these sites.

Site "B" has the highest value for wildlife viewing because of its proximity to the clear water stream. Although Site "B" had a greater grade change compared to the other three sites, which will require a higher development cost to reduce grades and open views, the grade change will add architectural variety to the design of the facility. Importantly, Site "B" retains much of the existing trail infrastructure and will enable the nature center to keep its current programming.