



**Draft Application for a New License**  
**Major Project – Existing Dam**

**Recreation Facilities Plan**

**Security Level: Public**

**Yuba River Development Project**  
**FERC Project No. 2246**

Draft – December 2013

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<sup>1</sup> Currently, Attachment C does not contain any drawings, but is included as a placeholder for future as-built drawings from work completed as part of this Plan.

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# GLOSSARY – DEFINITIONS OF TERMS, ACRONYMS AND ABBREVIATIONS

Term	Definition
Developed Recreation Site	A recreation site that contains formally managed recreation improvements or enhancements, such as gravel or paved parking areas and roads, restrooms, steel fire rings, signage and picnic tables.
Enhancement -Major -Minor	The construction, installation, or assembly of a new fixed asset, or the significant alteration, expansion, or extension of an existing fixed asset to accommodate a change of purpose or level of use. Enhancement is also used synonymously with “improvement”.  <u>Major</u> recreation enhancements require significant planning and implementation (generally over a 3 to 5-year periods that include, survey, design, implementation planning and permitting), that results in the construction/installation of a new facility that did not previously exist or work that changes the site layout or footprint of an existing facility.  <u>Minor</u> recreation enhancements do not require significant planning and implementation timeframes, and generally enhance an existing facility without altering the site layout/footprint or involves construction or installation of a new basic fixed asset that does not require survey or design work (e.g., bear-proof lockers, signs, vehicle barriers, auto-shutoff water hydrants, etc.).
Existing Site Plan	A conceptual schematic that illustrates the layout, location, size, shape, and relationship between existing recreation facilities and features.
Feasible	An analysis of a proposed project to determine if it is technically feasible based on site terrain and setting and is feasible within a reasonable cost.
FERC	Federal Energy Regulatory Commission
Forest Service	United States Department of Agriculture, Forest Service
Ft	Feet
Minor Maintenance	Minor maintenance includes repairs and replacement of parts that result in fewer breakdowns and fewer premature replacements, and helps achieve the expected life of the fixed asset. Minor maintenance does not include construction of new facilities or the replacement of an existing fixed asset. Minor maintenance activities will arrest deterioration and appreciably prolong the life of a property. Examples include: installing a new roof, new floor, or new siding, replacing electrical wiring or heating systems, repairing or replacing pipes, pumps and motors, and repairing the paths, walks, or walls of recreation facilities.
Routine Maintenance	Keeping fixed assets in acceptable condition, including minor repairs, painting, replacement of minor parts and minor structural components. Routine maintenance neither materially adds to the value of the property nor appreciably prolongs its life. The work serves only to keep the facility in an ordinary, safe and efficient operating condition. Examples include interior painting, repair of broken amenities (tables, doors, fire rings, risers, etc.), light bulb replacement, cleaning, greasing, servicing, inspecting, oiling, adjusting, tightening, aligning, sweeping, and hazard tree removal.
Major Rehabilitation/ Reconstruction	Making recreation enhancements and reconditioning or replacing an existing fixed asset or any of its components in order to restore the functionality or life of the asset. Replacement is the substitution or exchange of an existing fixed asset or component with one having essentially the same capacity and purpose. The decision to replace or rehabilitate a fixed asset or component is usually reached when replacement is more cost effective or more environmentally sound than repairing the existing asset. Replacement of an asset or component usually occurs when it nears or has exceeded its useful life. Major rehabilitation is also used synonymously with “reconstruction”.
NFS	National Forest System
O&M	Operations and maintenance
Open Season	The open season refers to the season when facilities are generally open; and varies by type of facility.
Peak Season	Peak season extends from Memorial Day to Labor Day holiday weekends.
Plan	Recreation Facilities Plan
PNF	Plumas National Forest
Project	Yuba River Development Project, FERC Project No. 2246
Project Recreation Road	A Project Recreation Road: 1) connects a Project recreation facility to a non-Project general access road or a Project road; or 2) provides access through a Project recreation facility (e.g., campground loop roads and parking areas). A Project Recreation Road includes the recreation access roads, primary facility circulation roads, and parking areas; but <u>excludes</u> camping spurs, boat ramps, and other paved surfaces.
Recreation Day	Each visit by a person to a development for recreation purposes during any portion of a 24-hour period.
Paving	The term paving in the text refers to Asphalt Concrete (AC) paving.
PNF	Plumas National Forest
ROS	Recreation Opportunity Spectrum

Term	Definition
Site Concept Plan	This plan presents a preliminary graphic illustration of proposed facilities and utilities in relationship to existing site features, facilities, and utilities. The Site Concept Plan will communicate proposed development ideas or alternatives. The Site Concept Plan may include enlargements of the area that indicate placement and orientation of the proposed facilities. This may include the use of aerial photography or topographic maps.
Site Development Plan	This plan presents a comprehensive graphic illustration of the facilities and utilities (both existing and proposed) to be built. The development plan is based on an accurate survey, usually drawn to a scale ranging from 1" = 20' or 1" = 100', with appropriate contour information, and may also include descriptions or lists of features. The plan developed is to be consistent with the Site Concept Plan. This plan also identifies the site design details (i.e., picnic tables, fire rings, restrooms, signage, road surface materials, etc.).
Suitability-Feasibility Analysis	Before site development planning, the monitoring program provides for a feasibility and suitability analysis to determine if site development is possible at a Project reservoir or impoundment. A proposed development will be considered suitable, if the development is: 1) practical and reasonable based on the site conditions; 2) appropriate for the ROS Class regulations, standards and policy; and 3) appropriate for the level of use desired based on direction by applicable land and resource management plans, including revisions or amendments to land management plans. Further, YCWA on YCWA land, and the Forest Service on NFS land, will make the final determination as to whether a proposed development is considered suitable and feasible.
TNF	Tahoe National Forest
Undeveloped Recreation Site	An informal, user created recreation site that contains no formally managed recreation facilities or enhancements. It is typified by user-created bare and compacted ground areas and trails and, in some locations, rock fire rings.
Undeveloped Shoreline Campsite	An informal, user-created campsite below the high water line that contains no formally managed recreation facilities or enhancements along the shoreline of New Bullards Bar Reservoir. It is typified by user-created bare and compacted ground areas and trails and, in some locations, rock fire rings.
USACE	United States Army Corps of Engineers
YCWA	Yuba County Water Agency



## SECTION 1.0

# INTRODUCTION

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In April 2014, the Yuba County Water Agency (YCWA), pursuant to Section 5.18 of Title 18 of the Code of Federal Regulations, filed with the Federal Energy Regulatory Commission (FERC) an Application for a New License for Major Project – Existing Dam – for YCWA’s 361.9 megaWatt Yuba River Development Project (Project), FERC Project Number 2246. The initial license for the Project was issued by the Federal Power Commission (FERC’s predecessor) to YCWA on May 16, 1963, effective on May 1, 1963. The Federal Power Commission’s May 6, 1966, Order Amending License changed the License’s effective date to May 1, 1966, for a term ending on April 30, 2016.

YCWA includes in its Application for New License this Recreation Facilities Plan (Plan).

## 1.1 Background

### 1.1.1 Yuba River Development Project

The Project is located in Yuba, Sierra and Nevada counties, California, on the main stems of the Yuba River, the North Yuba River and the Middle Yuba River, and on Oregon Creek, a tributary to the Middle Yuba River. Major Project facilities, which range in elevation from 280 feet to 2,049 feet, include: 1) New Bullards Bar Dam and Reservoir; 2) Our House and Log Cabin diversion dams; 3) Lohman Ridge and Camptonville diversion tunnels; 4) New Colgate and Narrows 2 power tunnels and penstocks; 5) New Colgate, New Bullards Minimum Flow and Narrows 2 powerhouses; and 6) appurtenant facilities and features (e.g., administrative buildings, switchyards, roads, trails and gages). The existing Project does not include any aboveground open water conduits (e.g., canals or flumes) or any transmission lines.

In addition, the existing Project includes 16 developed recreation facilities all at New Bullards Bar Reservoir. These include: 1) Hornswoggle Group Campground; 2) Schoolhouse Campground; 3) Dark Day Campground; 4) Cottage Creek Campground;<sup>2</sup> 5) Garden Point Boat-in Campground; 6) Madrone Cove Boat-in Campground; 7) Frenchy Point Boat-in Campground; 8) Dark Day Picnic Area; 9) Sunset Vista Point; 10) Dam Overlook; 11) Moran Road Day Use Area; 12) Cottage Creek Boat Launch;<sup>3</sup> 13) Dark Day Boat Launch, including the Overflow Parking Area; 14) Schoolhouse Trail; 15) Bullards Bar Trail; and 16) floating comfort stations.<sup>4</sup> All of the recreation facilities are located on NFS land, with the exception of the Dam Overlook,

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<sup>2</sup> Cottage Creek Campground was burned in 2011 and has not been rebuilt. YCWA is in discussions with the Forest Service regarding rebuilding the burned campground.

<sup>3</sup> Emerald Cove Marina provides visitor services at Cottage Creek Boat Launch, including houseboat and boat rentals, boat slips and moorings, fuel and a general store. The marina is operated under a lease from YCWA by a private company.

<sup>4</sup> The Project recreation facilities included one campground that is no longer part of the Project. Burnt Bridge Campground was closed initially by the Forest Service in 1979 due to low use levels. FERC, in an August 19, 1993 Order, which approved YCWA’s Revised Recreation Plan, directed YCWA to remove all improvements and restore the Burnt Bridge Campground to the condition it was in prior to development of the facility. YCWA consulted with the Forest Service and all that remains of Burnt Bridge Campground today is the circulation road and vehicle spurs; all other facilities were removed.

Cottage Creek Boat Launch and small portions of the Bullards Bar Trail, which are located on land owned by YCWA. All of the developed recreation facilities are located within the existing FERC Project Boundary, except for a few short segments of the Bullards Bar Trail to the east of the Dark Day Boat Launch. The Project also includes two undeveloped recreation sites at Our House and Log Cabin diversion dams located on NFS land within the existing FERC Project Boundary.

Figure 1.1-1 shows the Project Vicinity,<sup>5</sup> proposed Project, and proposed FERC Project Boundary.<sup>6</sup>

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<sup>5</sup> For the purpose of this Plan, “Project Vicinity” refers to the area surrounding the proposed Project on the order of United States Geological Survey (USGS) 1:24,000 quadrangles.

<sup>6</sup> The FERC Project Boundary is the area that YCWA uses for normal Project operations and maintenance. The Boundary is shown in Exhibit G of YCWA’s Application for New License, and may be changed by FERC with cause from time to time during the term of the new license.

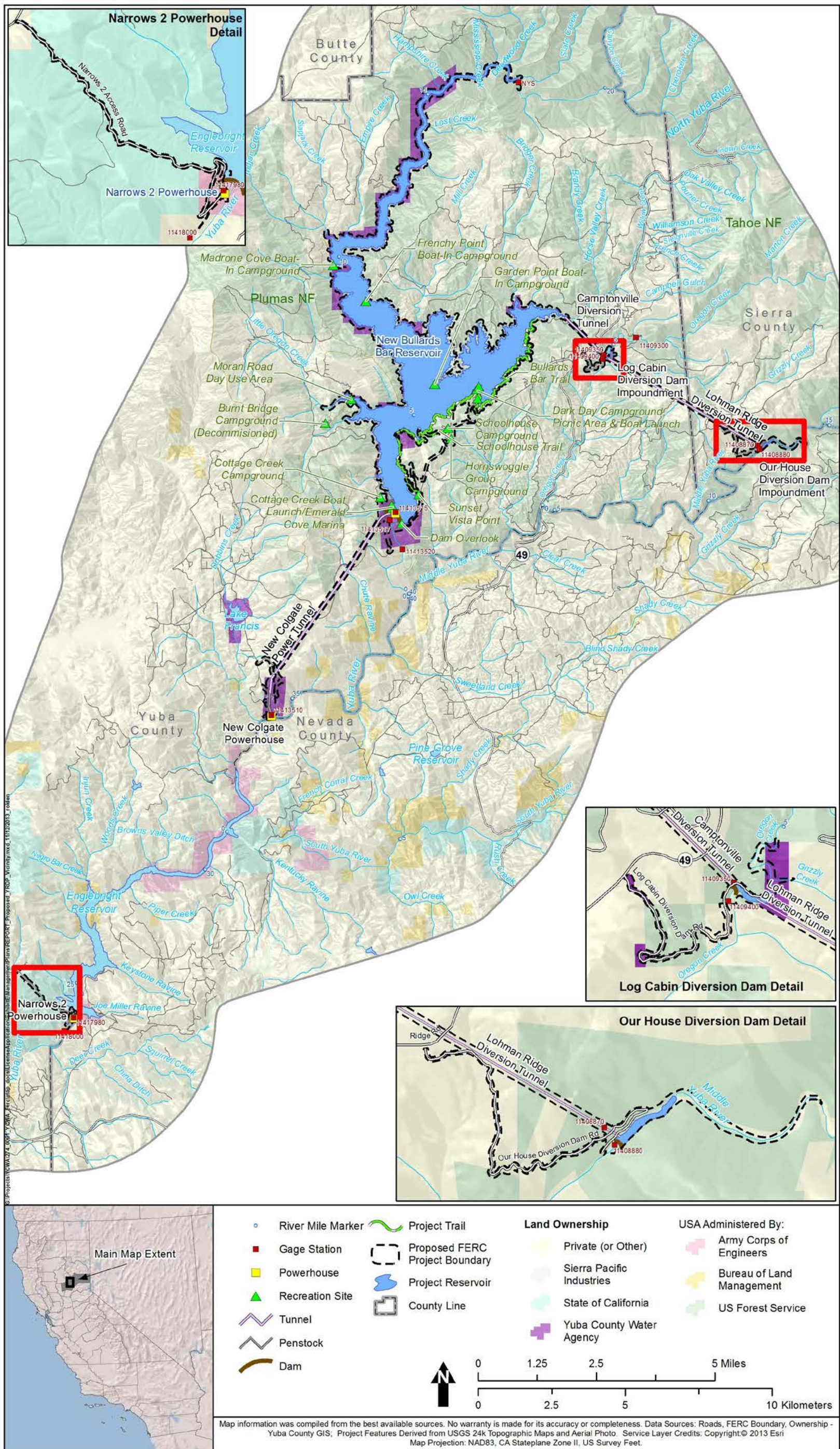


Figure 1.1-1. Yuba County Water Agency's Yuba River Development Project and Project Vicinity.

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## **1.2 Purpose of the Recreation Facilities Plan**

The overall purpose of the Plan is to propose appropriate protection, mitigation, and enhancement recreation measures for the Project by incorporating the information from the Recreation Use and Visitor Survey Study (Technical Memorandum 8-1) into a Recreation Facilities Plan. In 2013, YCWA consulted with the appropriate federal and state agencies on the outline of the Plan, including meetings on March 27, 2013 and June 25, 2013. In addition, YCWA entered into extensive discussions and consultation with the United States Department of Agriculture, Forest Service, and other interested parties from June 2013 through November 2013, which included a total of eight meetings.

YCWA will implement this Plan in coordination with implementation of the conditions in the new license, including resource management plans.

## **1.3 Goals and Objectives of the Recreation Facilities Plan**

The primary goal of the Plan is to guide management of public recreation use of the Project's recreation facilities over the term of the new license, and minimize recreation use impacts to natural, historic, and cultural resources within the Project area. The plan includes the following objectives to help achieve this goal:

- To provide recreation facilities that meet the needs of Project recreation users and that are consistent with federal, state, and local legal requirements and guidelines.
- To monitor recreation use over the term of the license to help ensure Project recreation users achieve high quality recreation experiences and that recreation use impacts are minimized and remain within acceptable limits.
- To describe YCWA's responsibilities regarding operation, maintenance and rehabilitation of the Project recreation facilities under the new license.

## **1.4 Contents of the Recreation Facilities Plan**

The Plan includes the following:

- Section 1. Introduction. This section includes this introductory information, including the purpose and objectives of the Plan.
- Section 2. Existing Project Recreation Resources. This section describes existing Project recreation resources, facilities, land ownership, condition, accessibility and current and projected use levels.
- Section 3. Recreation Facility Measures. This section describes the Project's proposed recreation enhancement measures, including development of recreation facilities and rehabilitation of existing recreation facilities and the Project's proposed recreation operation and maintenance (O&M) program.

- Section 4. Recreation Monitoring Program. This section describes the Project's proposed recreation monitoring program that defines how Project recreation facilities, use, needs, and potential associated impacts will be monitored and addressed over the license term.
- Section 5. Future Recreation Facility Development. This section describes YCWA's required actions when monitoring triggers are met as part Section 4 (i.e., Recreation Monitoring Program).
- Section 6. Annual Forest Service Coordination and Consultation. This section describes the annual coordination and consultation required as part of this Plan.
- Section 7. Plan Revision. This section describes when and why the Plan will be revised over the term of the new license.
- Section 8. References Cited. This Section identifies the references cited in this Plan.

**SECTION 2.0**

**EXISTING PROJECT RECREATION RESOURCES**

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**2.1        Background**

The Project provides a variety of recreation facilities and opportunities, including family campgrounds, group campgrounds, boat-in campgrounds, day use areas, boat ramps, vistas and overlooks, recreational trails, and undeveloped shoreline camping. The existing Project recreation facilities are identified in Table 2.1-1 and shown in Figure 1.1-1 with respect to land ownership and to the FERC Project Boundary.

**Table 2.1-1. Existing Project recreation facilities and undeveloped recreation sites.**

Recreation Facility	Fee	Manager	Land Ownership	Campsites						Picnic Sites	Boat Ramp		Parking Spaces			Restrooms			Trail-head
				Type	Total	Single	Double	Triple	Group		No.	Lanes	Total	Single	Double	Total	Vault	Flush	
<b>NEW BULLARDS BAR RESERVOIR</b>																			
Schoolhouse Campground	Yes	USFS	NFS	tent/RV	57 <sup>1</sup>	44	13	0	0	0	0	0	20 <sup>2</sup>	20 <sup>2</sup>	0	5	1	4	Yes
Hornswoggle Group Campground	Yes	USFS	NFS	tent/RV	6	0	0	0	6	0	0	0	0	0	0	4	2	2	No
Dark Day Campground	Yes	USFS	NFS	tent	10	6	3	1	0	0	0	0	0	0	0	2	2	0	Yes
Cottage Creek Campground <sup>3</sup>	Yes	USFS	NFS	--	0	0	0	0	0	0	0	0	0	0	0	1	1	0	No
Garden Point Boat-In Campground	Yes	USFS	NFS	tent	16	12	4	0	0	0	0	0	0	0	0	3	3	0	No
Madrone Cove Boat-In Campground	Yes	USFS	NFS	tent	10	10	0	0	0	0	0	0	0	0	0	1	1	0	No
Frenchy Point Boat-In Campground <sup>4</sup>		USFS	NFS	tent	7	6	1	0	0	0	0	0	0	0	0	0	0	0	No
Dark Day Boat Launch	Main	No	USFS	NFS	--	0	0	0	0	0	1	2-3	103	39	64	1	1	0	Yes
	Overflow	No	USFS	NFS	--	0	0	0	0	0	0	0	73	18	55	1	1	0	No
Cottage Creek Boat Launch	No	YCWA	YCWA	--	0	0	0	0	0	0	1	2	209	130	79	2	2	0	No
Dark Day Picnic Area	No	USFS	NFS	--	0	0	0	0	0	13	0	0	14	14	0	1	1	0	No
Sunset Vista	No	USFS	NFS	--	0	0	0	0	0	1	0	0	60 <sup>2</sup>	60 <sup>2</sup>	0	1	1	0	Yes
Dam Overlook	No	USFS	YCWA	--	0	0	0	0	0	0	0	0	24 <sup>2</sup>	24 <sup>2</sup>	0	0	0	0	No
Moran Road Day Use Area	No	USFS	NFS	--	0	0	0	0	0	0	1	1	8 <sup>2</sup>	8 <sup>2</sup>	0	1	1	0	No
Bullards Bar Trail	No	USFS	NFS/ YCWA	--	0	0	0	0	0	0	0	0	N/A <sup>5</sup>	N/A <sup>5</sup>	N/A <sup>5</sup>	0	0	0	No
Schoolhouse Trail	No	USFS	NFS	--	0	0	0	0	0	0	0	0	N/A <sup>5</sup>	N/A <sup>5</sup>	N/A <sup>5</sup>	0	0	0	No
Floating Comfort Stations	No	YCWA	N/A	--	0	0	0	0	0	0	0	0	0	0	0	7	7	0	No
<b>PROJECT IMPOUNDMENTS</b>																			
Our House Diversion Dam	No	--	NFS	--	0	0	0	0	0	0	0	0	25 <sup>2</sup>	25 <sup>2</sup>	0	0	0	0	No
Log Cabin Diversion Dam	No	--	NFS	--	0	0	0	0	0	0	0	0	N/A <sup>6</sup>	N/A <sup>6</sup>	N/A <sup>6</sup>	0	0	0	No
<b>Project Total</b>	--	--	--	--	<b>106</b>	<b>78</b>	<b>21</b>	<b>1</b>	<b>6</b>	<b>14</b>	<b>3</b>	<b>5-6</b>	<b>536</b>	<b>338</b>	<b>198</b>	<b>30</b>	<b>24</b>	<b>6</b>	<b>--</b>

<sup>1</sup> Includes a host site.

<sup>2</sup> Parking area is not striped so the total number of spaces is estimated.

<sup>3</sup> Cottage Creek Campground was used for overflow camping; however, the facility burned in a 2011 fire and has been closed since. All facilities were destroyed in the fire, except the vault restroom.

<sup>4</sup> Frenchy Point Boat-in Campground is no longer managed as a developed campground, but rather for dispersed shoreline camping. The restroom facility has been removed and only the campsite amenities remain, including the picnic tables, fire rings and Klondike stoves.

<sup>5</sup> Trailhead parking is available where the trail intersects other existing parking areas, including at the Schoolhouse Campground overflow parking area (20 spaces), Sunset Vista Point (20 spaces), Dark Day Picnic Area (16 spaces) and Dark Day Boat Launch (39 single spaces).

<sup>6</sup> Parking at Log Cabin Diversion Dam impoundment is informal along the shoulder of Highway 49, which does not have a defined area to estimate the parking capacity.



During the relicensing process, YCWA completed a facility inventory and condition assessment at each of the existing Project recreation facilities, and estimated recreational use. These efforts were conducted in accordance with the collaboratively developed and FERC-approved Study 8.1, *Recreation Use and Visitor Surveys*. The methods and study results, including detailed descriptions of the Project recreation facilities, visitor survey data, and recreation use and facility capacity data, are documented in detail in YCWA's Technical Memorandum 8-1, *Recreation Use and Visitor Surveys* (YCWA 2013). The section below summarizes the key results from Study 8.1.

## **2.1.1 New Bullards Bar Reservoir**

### **2.1.1.1 Campgrounds**

#### **Schoolhouse Campground (NFS Land)**

Schoolhouse Campground is located between New Bullards Bar Reservoir and Marysville Road across from the Hornswoggle Group Campground. The campground is approximately 0.5-mile (mi) from the reservoir shoreline on NFS land. The campground has 57 campsites, which includes 43 single sites, 13 double sites and 1 host site. The single sites amenities include a picnic table, cooking grill/fire ring, food locker, and vehicle parking spur with a capacity of 6 people and 1 vehicle for \$22 per night. The double sites amenities include 2 picnic tables, a cooking grill/fire ring, 2 food lockers and vehicle parking spur with a capacity of 12 people and 2 vehicles for \$44 per night. The campground has 5 restrooms (4 flush and 1 vault), a potable water system and an overflow parking area for 20 vehicles. The campground does not have any recreation vehicle (RV) hookups or a dump station. The campground has 1 facility identification sign at the entrance; 5 information boards (one 3-panel board at the entrance station and four 1-panel information boards at each restroom); 12 directional signs along the circulation roads; 29 information/regulation signs throughout the facility; and a site marker sign at each campsite.

The campground also has a trailhead for the 1.0-mi Schoolhouse Trail (Project trail), which connects to the 14.0-mi Bullards Bar Trail (Project trail); and includes two trail signs, where the trail intersects the campground. In addition, the 8 Ball Trail (non-Project trail) passes through the campground and leads to Dark Day Campground.

In 2012, the campground was in good overall condition. Most of the campground facilities were in good or excellent condition, including the campsite amenities (tables, fire rings, food lockers, vehicle barriers, etc.), water hydrants, circulation roads and camping spurs. In contrast, the six restrooms were in fair-to-good condition with well maintained exteriors but deteriorating interiors. The campground does not meet current accessible standards for NFS lands - Forest Service Outdoor Recreation Accessible Guidelines (FSORAG) or Architectural Barriers Act Accessible Standards (ABAAS) (YCWA 2013).

### **Dark Day Campground (NFS Land)**

Dark Day Campground is located approximately 4 mi from the New Bullards Bar Dam via Marysville Road and Dark Day Road on the southeast shoreline of the Willow Creek arm of the reservoir. The facility is approximately 0.2-mi from the reservoir shoreline. The campground complex has 10 campsites for tent camping only, with 6 single sites, 3 double sites and 1 triple site. The single sites amenities include a picnic table, cooking grill/fire ring, food locker, and vehicle parking spur with a capacity of six people and one vehicle for \$22 per night. The double sites amenities include 2 picnic tables, a cooking grill/fire ring, 2 food lockers and vehicle parking spur with a capacity of 12 people and 2 vehicles for \$44 per night. The triple site amenities include 3 picnic tables, a cooking grill/fire ring, 3 food lockers and vehicle parking spur with a capacity of 18 people and 3 vehicles for \$66 per night. The campground has three vault restroom buildings and a potable water system. The campground has 2 information boards (a 3-panel and 1-panel board), 9 information/regulation signs throughout the facility; and 3 campsite marker signs (one for each cluster of campsites).

In 2012, the campground was in good overall condition. Most of the campground facilities were in good or excellent condition, including the campsite amenities, circulation roads and camping spurs. In contrast, the two restrooms and water hydrants were in fair condition. The campground does not meet current accessible standards for NFS land (FSORAG or ABAAS) (YCWA 2013).

### **Hornswoggle Group Campground (NFS Land)**

Hornswoggle Group Campground is located on Marysville Road, 2.5 mi northeast of the New Bullards Bar Dam, and 3.3 mi southwest of the Highway 49 junction. The facility is approximately 0.6 mi from the southeast shoreline of the reservoir on NFS land. The facility consists of 6 group campsites with 5 campsites that accommodate up to 25 people-at-one-time (PAOT) (\$80 per night), and 1 group campsite that accommodates up to 50 PAOT (\$140 per night). The group site amenities include tables, food lockers and a group fire ring/grill. The campground has 4 restrooms (2 flush and 2 vault), a potable water system, and parking areas at each campsite. The campground has 1 facility identification sign at the entrance; 6 1-panel information boards; 3 directional signs along the circulation road; 7 information/regulation signs throughout the facility and 6 campsite marker signs.

In 2012, the campground was in good overall condition. Most of the campground facilities were in good condition, including the campsite amenities, circulation roads, camping spurs and parking areas. In contrast, the four restrooms and most of the water hydrants were in fair condition. The campground does not meet current accessible standards for NFS land (FSORAG or ABAAS) (YCWA 2013).

### **Garden Point Boat-in Campground (NFS Land)**

The Garden Point Boat-in Campground is accessed by boat only and is located on a peninsula on the north side of the reservoir at the junction between the North Yuba River and Willow Creek arms of the reservoir on NFS land. The campground is approximately 3.0 mi by boat from the

Cottage Creek Boat Launch, and 1.5 mi from the Dark Day Boat Launch. The campground has 16 campsites, which includes 12 single sites and 4 double sites. The single sites amenities include a picnic table, a fire ring, and Klondike stove for a maximum of six people for \$22 per night. The double site amenities include 2 picnic tables, a fire ring, and Klondike stove for a maximum of 12 people for \$44 per night. The campground has four restrooms (all vault) and does not have a potable water system. The campground has 1 facility identification sign; 1 2-panel information board; 1 information/regulation sign and 16 campsite marker signs.

In 2012, the campground was in good overall condition. Most of the campground facilities were in good condition, namely the campsite amenities. In contrast, the restrooms and the Klondike stoves were in fair condition. The campground does not meet current accessible standards for NFS land (FSORAG or ABAAS) (YCWA 2013).

### **Madrone Cove Boat-in Campground (NFS Land)**

The Madrone Cove Campground is accessed by boat only and is located along the west shore of the North Yuba River arm of the reservoir on NFS-owned land. By boat, the campground is approximately 7.5 mi from the Cottage Creek Boat Launch and 6.0 mi from the Dark Day Boat Launch. The campground has 10 single campsites (maximum of 6 people per site for \$22 per night). Each site's amenities include a picnic table, fire ring and Klondike stove. The campground has 2 restrooms (both vault) and does not have a potable water system. The campground has 1 facility identification sign; 1 2-panel information board; 2 information/regulation signs and 10 campsite marker signs.

In 2012, the campground was in fair overall condition. Most of the campground facilities were in fair condition, namely the campsite amenities. However, all the restrooms, retaining walls (at each site) and Klondike stoves were in poor condition as well as some of the tables. The campground does not meet current accessible standards for NFS land (FSORAG or ABAAS) (YCWA 2013).

### **Frenchy Point Boat-in Campground (NFS Land)**

Frenchy Point Boat-in Campground was once a developed campground facility, but is now used as an undeveloped shoreline camping area due to very low use in the past.<sup>7</sup> The site is accessed by boat only and is located along the west facing shore of the North Yuba River arm of the reservoir on NFS land. By boat, the campground is approximately 6.0 mi from the Cottage Creek Boat Launch and 4.5 mi from the Dark Day Boat Launch. The remnant facilities include 7 campsites (6 single and 1 double). The single site amenities each include a picnic table, fire ring and Klondike stove; and the double site amenities each include a picnic table, fire ring and 2 Klondike stoves. The site has one site identification sign; two 1-panel information boards; and

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<sup>7</sup> This facility was converted to a shoreline camping area due to low use. The location of the facility is not ideal for visitor use as the shoreline access is very steep, particularly below the normal maximum water surface elevation (NMWSE). As the reservoir elevation recedes early in the peak recreation season, the access issue results in a very short period of use. Historically, the use of this facility only occurred within 15 vertical ft of the NMWSE or roughly one month typically in the June-July period (YCWA 1993).

one information/regulation sign. The site does not have a restroom facility<sup>8</sup> or potable water system.

In 2012, the remnant facilities and amenities were in fair-to-poor overall condition. The site does not meet current accessible standards for NFS land (FSORAG or ABAAS) (YCWA 2013).

#### **2.1.1.2 Day Use Areas**

##### **Dark Day Picnic Area (NFS Land)**

The Dark Day Picnic Area is located adjacent to Dark Day Campground on NFS land. The picnic area consists of 13 picnic sites, each with a picnic table and cooking grill/fire ring. The day use area also has 1 restroom (vault), a potable water system, and a paved and striped parking area for 14 vehicles. A trailhead for the Bullards Bar Trail is located near the parking area. The facility has 1 facility identification sign; 2 1-panel information boards; 14 information/regulation signs; 2 directional signs on the road and 1 trailhead sign.

In 2012, the facility was in good overall condition, but the individual facilities' condition varied widely. The parking area was in excellent condition; however, the site amenities (tables and Klondike stoves) and the restroom were in fair condition. The facility does not meet current accessible standards for NFS land (FSORAG or ABAAS) (YCWA 2013).

##### **Sunset Vista Point (NFS Land)**

This scenic overlook is located near the southeast corner of the reservoir approximately 1.0 mi east of New Bullards Bar Dam via Marysville Road and Vista Point Road. The facility consists of 1 restroom (vault), 1 picnic table, and a gravel parking area for approximately 60 vehicles. The facility also serves as a trailhead for the Bullards Bar Trail (Project trail). The facility has one facility identification sign; a single 1-panel information board; four information/regulation signs; and an interpretive panel. In addition, the Bullards Bar Trailhead also has three signs including a trailhead sign and two informational signs.

In 2012, the facility was in good overall condition, but the individual facilities' condition varied widely. The parking area was in good condition; however, the site amenities (table and interpretive displays) and the restroom were in fair condition. The facility does not meet current accessible standards for NFS land (FSORAG or ABAAS) (YCWA 2013).

##### **Dam Overlook (YCWA Land)**

The Dam Overlook is located at the southeast corner of New Bullards Bar Dam on Marysville Road on YCWA-owned land. The facility provides a safe place to park a vehicle with an unobstructed view of the dam and reservoir and consists of a gravel parking area for

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<sup>8</sup> A pit restroom was installed during the original construction of the facility, but was removed due to low campground use and high maintenance of the restroom. Currently, a floating comfort station is moored in the cove next to the campground.

approximately 24 vehicles and an interpretive plaque related to the construction of New Bullards Bar Dam and the Project. The facility does not have any signs other than the interpretive plaque.

In 2012, the facility was in excellent overall condition, with the limited facilities (parking and interpretive display) in good to excellent condition. The facility does not meet current accessible standards for private land (2010 ADA Accessibility Standards) (YCWA 2013).

### **Moran Road Day Use Area (NFS Land)**

The Moran Road Day Use Area is located on the west shoreline of New Bullards Bar Reservoir at Moran Cove on NFS land. The day use area is accessible by vehicle 6.4 mi from the Town of Challenge via Oregon Hill Road and Moran Road. The rustic developed facility consists of a gravel parking area for eight vehicles, one restroom (vault) and an informal car top boat ramp (gravel surface). The facility has a single 1-panel information board and four information/regulation signs.

In 2012, the facility was in good overall condition with most of the facilities (parking area, trash receptacles and boat ramp) in good condition. In contrast, the restroom was in excellent condition and the signs and access road were in poor condition. The facility does not meet current accessible standards for NFS land (FSORAG or ABAAS) (YCWA 2013).

#### **2.1.1.3 Boat Launch Facilities**

### **Cottage Creek Boat Launch (YCWA Land)**

Cottage Creek Boat Launch is located on YCWA-owned land along the southwest corner of the reservoir off County Road 169 approximately 0.1-mi from its intersection with Marysville Road. The launch ramp facility consists of a 900-ft long 2-lane concrete launch ramp, 2 restrooms (vault), and a paved and striped parking area for 209 vehicles (130 single spaces and 79 double spaces). The facility has two facility identification signs and 33 information/regulation signs.

In 2012, the Cottage Creek Boat Launch was in excellent overall condition as most of the facilities and amenities were recently constructed or installed, including the parking area, restrooms and circulation roads. However, the concrete boat ramp is in good overall condition. However, the majority of the concrete ramp (upper portion) is in good condition compared to the lower and recently extended portion that is in excellent condition. The parking area and restrooms all met accessible guidelines (2010 ADA Accessibility Standards). Notably, due to the steep terrain/slope where the boat ramp is located, the boat ramp access route cannot meet the accessible standards; and was accepted as a condition of departure from the standards as part of the California Department of Boating and Waterways design of the facility in 2005. This scenario is typical of boat ramps at reservoirs located in steep canyons such as New Bullards Bar Reservoir (YCWA 2013).

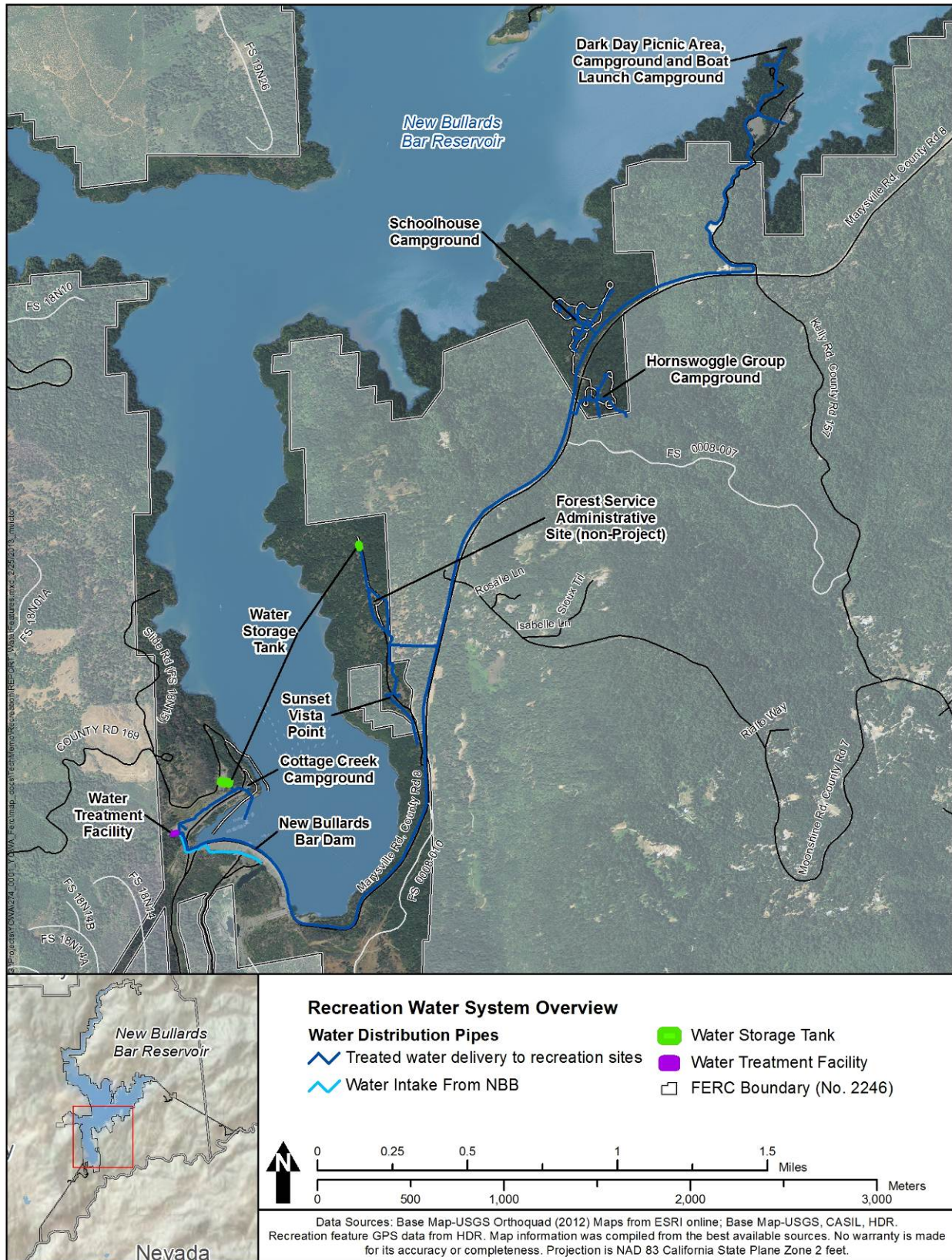
## **Dark Day Boat Launch (NFS Land)**

The Dark Day Boat Launch facility is located on Dark Day Road. The facility consists of a main facility (original construction) and an overflow parking area (constructed in 2003). The main facility has a 2-lane concrete boat ramp (3-lane concrete boat ramp at the top of the ramp) with a floating boat dock, a 4-unit restroom (vault) and a paved and striped parking area for 103 vehicles (39 single spaces and 64 double spaces). Exterior, solar-powered lights are provided at the restroom and at the top of the boat ramp. The overflow parking area facility (named Dark Day Boat Launch Overflow Parking Area) has a paved and striped parking area for 73 vehicles (18 single spaces and 55 double spaces), and a 2-unit restroom (vault). Overall, the facility has 2 facility identification signs; one 2-panel information board; 45 information/regulation signs; and 5 directional signs on the access and circulation roads off Marysville Road.

In 2012, the Dark Day Boat Launch facility was in good overall condition, but the facilities' condition varied significantly between the main or original constructed facility and the newer overflow parking area. The main facility amenities were generally in fair condition, including the concrete boat ramp, parking area and restroom. In contrast, the overflow parking area was in excellent condition, including the parking area and the restroom. The main facility does not meet current accessible guidelines (FSORAG or ABAAS) due to the steep slope of the entire parking area and boat ramp. The overflow parking area and restroom meet the accessible guidelines (ABAAS) (YCWA 2013).

### **2.1.1.4 Recreational Water Supply System**

A schematic of the existing recreational water supply system for the Project recreation facilities is provided in Figure 2.1-1.



**Figure 2.1-1. Schematic of the recreational water supply system for the Project recreation facilities.**

## **Water Treatment Facility**

The water treatment facility<sup>9</sup> is located on the north side of New Bullards Bar Dam at the west end of the Cottage Creek Boat Launch facility on YCWA land. The water treatment facility consists of the following primary elements: 1) a water treatment building, containing filters, valves, gages, electronics, office, pumps and equipment; 2) two 10,000 gallon storage tanks; 3) concrete dechlorination basin; and 4) extensive, separate piping for raw water and treated water. The facility has a storage capacity of 20,000 gallons and a filter rate of 30 gallons per minute or 43,200 gallons per day.

### **Distribution Segment 1: Water Treatment Facility to Cottage Creek Boat Launch**

The treated water leaves the water treatment facility and is piped underground directly to the Cottage Creek Boat Launch facility along the northern boundary of the facility parking area (Figure 2.1-1). Roughly halfway along the parking area, there is a “T” junction in the piping, where the piping emerges above ground and water may either be pumped up the hill to a storage tank near the marina storage/maintenance yard north of the boat launch parking area (off County Road 169) or continue down to the marina. This segment is entirely on YCWA land.

### **Distribution Segment 2: Water Treatment Facility to Sunset Vista Point/Water Storage Tanks**

Treated water serving the recreation facilities on the south side of New Bullards Bar Reservoir along Marysville Road leaves the water treatment facility and is piped across New Bullards Bar Dam (upstream face near crest) and then underground across the entrance road to the upstream side of the dam, where a 2-inch pipe carries it aboveground, across the upstream side, just below the crest of the dam to the south side of the dam (Figure 2.1-1). Here the pipe goes underground near the Dam Overlook (no water facilities) along the north side of Marysville Road until it reaches the south side of the Forest Service administration site (non-project) near Sunset Vista Point. It travels through the Forest Service’s administrative site,<sup>10</sup> mostly between the administrative site road and the reservoir, until the 2-inch pipe connects to the top of both water storage tanks at the north side of the Forest Service administrative site. This segment is on YCWA and NFS land.

The primary storage of treated water occurs near the Forest Service’s administrative site (non-project on NFS land), where two storage tanks are located - a 28,000 gallon concrete tank and a newer 10,000 gallon polypropylene tank (Figure 2.1-1).

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<sup>9</sup> The source for the recreational facility water system is raw water from New Bullards Bar Reservoir at the low level outlet of New Bullards Bar Dam. YCWA pumps and pipes the raw water up the downstream side of New Bullards Bar Dam (north side) and under County Road 169 at the entrance to the Cottage Creek Boat Launch facility, where the source water enters the water treatment facility.

<sup>10</sup> The Forest Service administrative site is a non-Project facility used by the Forest Service for a variety of Forest Service needs, and is not open to the public. It includes a Forest Service operational headquarters, barracks and residences for Forest Service fire response. FERC, in an August 19, 1993 Order that approved YCWA’s Revised Recreation Plan, directed YCWA to remove the administrative site from the Project facilities, and redraw the FERC Project boundary to exclude the administrative site.



### **Distribution Segment 3: Sunset Vista Point/Water Storage Tanks to Schoolhouse and Hornswoggle Group Campgrounds**

The treated water leaves the storage tanks at the Forest Service administrative site via the underground delivery system (8-inch pipe) to the Project recreation facilities along Marysville Road (Hornswoggle Group Campground, Schoolhouse Campground, and the Dark Day complex) (Figure 2.1-1). The 8-inch mainline pipe then turns and follows Marysville Road north, and delivers the water to the Project recreation facilities along Marysville Road.

The connection to Hornswoggle Group Campground occurs at a “T” junction in the main distribution line several hundred feet before the Schoolhouse Campground access road (Figure 2.1-1). The treated water is diverted off the main distribution line underneath Marysville Road to the south to Hornswoggle Group Campground, where water is piped underground to the campground water facilities (e.g., flush restrooms, water hydrants and fire hydrant).

The connection to Schoolhouse Campground occurs at a “T” junction in the main distribution line several hundred feet past the Schoolhouse Campground access road, near the middle of the facility complex (Figure 2.1-1). The treated water is connected underground to the campground water facilities (e.g., flush restrooms and water hydrants). This segment is on YCWA and NFS land.

### **Distribution Segment 4: Schoolhouse and Hornswoggle Group Campgrounds to Dark Day Complex**

The connection to the Dark Day recreation complex occurs at a “T” junction in the main distribution line just before the Dark Day access road (Figure 2.1-1). The main distribution line then follows the west side of Dark Day Road, where it connects to the Dark Day Overflow Boat Ramp Parking Area, Dark Day Campground, Dark Day Picnic Area and Dark Day Boat Launch. The main distribution line runs along the western edge of the road that accesses Dark Day Campground and Picnic Area with several “T” junctions to run treated water to the campsites and picnic area along the road; as well as east to the water hydrant at Dark Day Boat Launch facility. Figure 3.1-3 shows the approximate locations of the underground septic and leach field systems.

### **2012 Condition Summary**

The primary below-ground infrastructure of the water system is more than 40 years old. Based on incidental information from both YCWA staff, which operates the water treatment facility and occasionally maintains aspects of the water system, and Forest Service staff, which regularly maintains the above-ground and some segments of the below-ground facilities, YCWA understands that the infrastructure is showing its age. Further, the above-ground facilities (i.e., primarily water hydrants) at recreation facilities are generally in fair condition and categorically do not meet accessible guidelines.

### **2.1.1.5 Project Recreational Trails**

#### **Bullards Bar Trail (NFS and YCWA Land)**

The Bullards Bar Trail is a 14-mi non-motorized, multi-use trail offering an easy, relatively level, and scenic route along the shoreline of the reservoir from the Sunset Vista Point near the dam up to Old Camptonville Road near the Willow Creek arm of the reservoir. The non-motorized, multi-use trail is located within the existing FERC Project Boundary, except for the eastern end of the trail (approximately 1.5 mi) which extends beyond the FERC Project Boundary along Willow Creek, ending at Old Camptonville Road. The trailheads, including parking, are located at the Sunset Vista Point day use facility, Dark Day Picnic Area and Dark Day Boat Launch. The trail is located on NFS and YCWA-owned land and is managed by the Forest Service.

#### **Schoolhouse Trail (NFS Land)**

The Schoolhouse Trail is a 0.7-mile non-motorized, multi-use trail that descends approximately 250 ft steeply from Schoolhouse Campground to the Bullards Bar Trail. The trailhead including parking is located at the Schoolhouse Campground with parking nearby in the campground overflow parking area. The entire trail is located on NFS land within the existing FERC Project Boundary land and is managed by the Forest Service.

### **2.1.1.6 Undeveloped Shoreline Camping**

Due to potential fire hazard at New Bullards Bar Reservoir, YCWA allows undeveloped shoreline camping at undesignated locations by permit only through YCWA's lessee operating the marina. Only 44 permits are available on any one day for undeveloped shoreline camping; and this opportunity is only available when the reservoir water elevation is at or below 1,941 ft, or 15 ft below the normal maximum water surface elevation (NMWSE) of 1,956 ft, due to potential fire hazard. Private portable chemical toilets are required as part of the permit and can be rented from the marina. A former boat-in campground (Frenchy Point Boat-in Campground) is now used as an undesignated shoreline camping area and is no longer utilized as a developed facility; although most camping amenities still exist (tables and Klondike stoves).

### **2.1.1.7 Floating Comfort Stations (Restrooms)**

New Bullards Bar Reservoir has seven floating comfort stations (FCS) dispersed throughout the reservoir. Each FCS consists of two stalls on a floating dock with cleats for boats to approach and tie off to and informational signs. Overall in 2012, the FCS were in excellent condition as all of the facilities were new or recently constructed and installed; and the FCS do not meet accessible standards (ABAAS) (YCWA 2013).

### **2.1.1.8 Marina Services (YCWA Lease)**

The marina is provided as a service to Project visitors through a YCWA lease to a private concessionaire. Currently, the marina is called Emerald Cove Marina. The facility is located on

New Bullards Bar Reservoir at the end of Cottage Creek Boat Ramp; and consists of a marina, a floating general store and a floating restroom building. The Emerald Cove Marina provides overnight boat slips and mooring buoys, gasoline pumps, and a floating dump station for houseboat sanitation systems. In addition, the marina provides marine-related repair and maintenance services for nearly any watercraft from complete engine overhauls to cosmetic repairs, including 24-hour emergency watercraft calls/service. The marina has a variety of boat rentals including luxury houseboats, powerboats, pontoon boats, and personal watercraft/wave runners. The general store provides groceries and general supplies to the public. The marina operates a reservation system for overnight camping permits at New Bullards Bar Reservoir facilities, including shoreline camping permits and portable chemical toilet rentals.

## **2.1.2 Undeveloped Recreation Sites at the Diversion Dam Impoundments**

The Project's Our House and Log Cabin Diversion Dam impoundments do not include developed recreation facilities, but offer undeveloped recreation opportunities along the Middle Yuba River and Oregon Creek, respectively. A description of the undeveloped recreation opportunities at each impoundment is provided below.

### **2.1.2.1 Our House Diversion Dam**

The Our House Diversion Dam impoundment provides undeveloped day use recreation opportunities. The site is located on NFS land along the Middle Yuba River (river mile or RM 12.6) and does not have any developed recreation facilities. Vehicle access to the diversion dam occurs via Highway 49 to Ridge Road and then 1.8 mi along the paved Our House Dam Road. Informal parking for approximately 25 vehicles is available at the end of the Our House Dam Road, where visitors have foot access to the shoreline. In 2012, the impoundment area was in good condition; use impact was low; and accessibility was not intended at this undeveloped area (YCWA 2013).

### **2.1.2.2 Log Cabin Diversion Dam**

The Log Cabin Diversion Dam impoundment provides undeveloped day use recreation opportunities. The site is located on NFS land along Oregon Creek (RM 4.3) and does not have any developed recreation facilities. YCWA, with the permission of the Forest Service, has installed and keeps locked a vehicular gate on NFS land at the start of Log Cabin Road at Highway 49. Vehicle access to the diversion dam is restricted. Visitors may park their vehicles along the shoulder of Highway 49 and hike into the diversion dam. In 2012, the impoundment area was in good condition; use impact was low; and accessibility was not intended at this undeveloped area (YCWA 2013).

## 2.2 Current and Projected Recreation Use Estimates

In 2012, the total Project recreation use was 116,700 Recreation Days (RDs)<sup>11</sup> with the majority of that use occurring in the peak season<sup>12</sup> (82% or 95,900 RDs) compared to the non-peak season<sup>13</sup> (18% or 20,800 RDs) (Table 2.2-1).<sup>14</sup> When comparing use by day type overall, total use was highest on the weekends followed by weekdays and holidays. By 2050, use is expected to increase by 51 percent or 59,400 RDs. Use will reach 176,100 RDs overall, 144,700 RDs during the peak season and 31,400 RDs during the non-peak season. Obviously, projecting the future is a speculative activity, especially over a 50-year period. These projections, though, may be useful for general planning purposes to identify potential management issues that may occur in the future.

**Table 2.2-1. Current and projected use estimates by type of use and season in Recreation Days<sup>1</sup>.**

Use Season	Day Type	2012 Use Estimate (RDs)	Projected Recreation Use (RDs)			
			2020	2030	2040	2050
Annual	<b>Overall</b>	116,700	128,800	143,700	159,400	176,100
	Weekday	47,100	51,900	57,900	64,300	70,900
	Weekend	53,900	59,400	66,400	73,600	81,300
	Holiday	15,900	17,500	19,600	21,700	24,000
Peak Season	<b>Overall</b>	95,900	105,800	118,000	131,000	144,700
	Weekday	38,400	42,300	47,200	52,400	57,800
	Weekend	41,700	46,000	51,400	57,000	63,000
	Holiday	15,900	17,500	19,600	21,700	24,000
Non-Peak Season	<b>Overall</b>	20,800	23,000	25,700	28,400	31,400
	Weekday	8,700	9,600	10,700	11,900	13,100
	Weekend	12,200	13,400	15,000	16,600	18,300
	Holiday	N/A <sup>2</sup>	N/A <sup>2</sup>	N/A <sup>2</sup>	N/A <sup>2</sup>	N/A <sup>2</sup>

<sup>1</sup> Rounded to the nearest hundred.

<sup>2</sup> N/A = not applicable. Only the peak season holiday weekends (Memorial Day, Independence Day and Labor Day) are considered for these estimates.

<sup>11</sup> A Recreation Day is each visit by a person to a development for recreation purposes during any portion of a 24-hour period.

<sup>12</sup> The peak recreation season is from Memorial Day Holiday weekend to the Labor Day Holiday weekend, inclusive.

<sup>13</sup> The non-peak recreation season is from after the Labor Day Holiday weekend to immediately before the Memorial Day Holiday weekend.

<sup>14</sup> Current and projected use estimates were rounded to the nearest hundred.

## SECTION 3.0

# RECREATION FACILITY MEASURES

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## 3.1 Annual Operation and Maintenance Responsibilities

### 3.1.1 Operational Maintenance Activities

YCWA is solely responsible for the management, operations and routine maintenance of the Project recreation facilities, including the facilities on NFS land. It is YCWA's responsibility to conduct operational maintenance activities to keep permanent assets in an acceptable condition, which typically includes repairs, painting, replacement of minor parts and minor structural components. Operational maintenance, or reconditioning, neither materially adds to the value of the property nor appreciably prolongs its life. Operational maintenance excludes activities aimed at expanding the capacity of an asset or otherwise upgrading it to serve needs different from, or significantly greater than those originally intended. The work serves only to keep the facility in an ordinary, efficient operating condition.

Examples of regular or routine operational maintenance activities include, but are not limited to interior painting, repair of broken windows, light bulb and plumbing fixture replacement, cleaning, unplugging drains, greasing, servicing, inspecting, oiling, adjusting, tightening, aligning and sweeping. Maintenance activities may include work needed to meet applicable laws, regulations, codes, and other legal direction (such as compliance with accessibility standards) as long as the original intent or purpose of the fixed asset is not changed.

### 3.1.2 Operational Maintenance for Facilities on NFS Land

YCWA has provided an Operating Plan for the Project recreation facilities on NFS land in Attachment A. The plan addresses the roles and responsibilities of YCWA (and the YCWA's concessionaire should YCWA choose to retain one) and Forest Service including coordination, user and other fees, control of user conduct, and user health and safety. Specifically, the Operating Plan also clearly identifies the standard maintenance activities and frequencies for facilities on NFS land, including annual and five-year cycle maintenance on recreational trails.

The Operating Plan states that YCWA will maintain standards for cleaning, operating and maintaining the facilities on NFS land consistent with current Forest Service national and Forest-specific standards and policies, which may change over time. Currently, national Forest Service standards and policies for cleaning recreation sites are addressed in the Forest Service's *Cleaning Recreation Sites* (USDA Forest Service, 1995) and the *Recreation Sites National Quality Standards* (USDA Forest Service, 2002). A summary of these current maintenance standards and frequencies are provided within the Operating Plan in Attachment A. The Forest Service will monitor to assure that YCWA and its concessionaire is following its operating plan.

The Operation Plan covers the following major sections:

- Management of the Facilities – includes sub-sections for liaison officers; local staff; contacts; and seasonal reports
- Operation of the Facilities – includes sub-sections for users fees; length of stay; operating season; other fees; and other structures
- Routine Maintenance of the Facilities – includes sub-sections for developed facilities and recreational trails
- Other Programs – includes sub-sections for public releases and signs; concessionaire-provided services; public service training standards; and special programs
- General – includes sub-sections for amendments and special provisions

YCWA may revise the Operating Plan with the Forest Service as needed. However, YCWA will submit revisions to this plan to FERC, as appropriate, and in order to allow YCWA and the Forest Service to adjust the operating plan in a timely and efficient manner for facilities on NFS land. It is expected that any revisions to the Operating Plan will only enhance YCWA's maintenance of the facilities.

### **3.1.3 Operational Maintenance for Facilities on YCWA Land**

YCWA will maintain the recreation facilities located on YCWA-owned land using similar standards and frequencies as provided in the Operating Plan for facilities on NFS land, including recreational trails in order to provide a consistent level of operational maintenance at all Project recreation facilities. Currently, only three facilities are located on YCWA-owned land - Cottage Creek Boat Launch, the Dam Overlook and a few, intermittent segments of the Bullards Bar Trail. Notably, the vast majority of the Bullards Bar Trail is located on NFS land and maintaining the short, intermittent segments on YCWA land to the same standards as on NFS land will provide a safe and consistently maintained trail surface and corridor.

## **3.2 Major Rehabilitation Guidelines**

This section provides design guidance for facility enhancements over the license period, for major recreation investments, for major maintenance (also known as rehabilitation), and replacement of Project recreation facilities (see Section 3.4). All Project campgrounds, picnic areas or other recreation sites being constructed or reconstructed on NFS land will fully comply with the applicable accessible guidelines (ABAAS or FSORAG). YCWA will provide a primary contact for communicating with the Forest Service whenever planning or constructing new recreation facilities, major maintenance on existing recreation facilities or other major Project enhancements placed on NFS lands within the Project Boundary. YCWA agrees to cooperate with Forest Service through this individual in contract review and work inspection. The YCWA contact person may not always be the same person.

As a benchmark for major rehabilitation and capital enhancements over the term of the new license, YCWA has provided Existing Site Plans for each of the existing Project recreation facilities (Attachment B). An Existing Site Plan is a schematic that illustrates the layout,

location, size, shape, and relationship between existing recreation facilities and features. It is used to represent existing conditions and serves as the baseline for potential changes to Project recreation sites and facilities.

Over the term of the new license, YCWA will be responsible for funding, constructing, and the O&M of all proposed new Project recreation facilities and enhancements, and reconstruction of existing Project recreation facilities, as well as any additional needed NEPA surveys or documentation that was not addressed in the FERC relicensing Environmental Impact Statement (EIS). All new and reconstructed Project recreation facilities will stay the property of YCWA. When constructing Project recreation facilities, YCWA will obtain all necessary permits and approval for survey work, facility design and on-site resource evaluations, including the Forest Service on NFS land.

### 3.2.1 Recreation Facility Design Guidelines

The Forest Service has developed guidelines and policies for design of Forest Service recreation facilities. These guidelines and policies will be followed in the design and planning of the Project recreation facilities and replacement of existing facilities on NFS land. Below is a summary of some of the most relevant guidance and policy documents that will be used for the design of new and replacement facilities, and rehabilitation of existing recreation facilities on NFS land:

- Forest Service Manual 2300 – Recreation, Wilderness, and Related Resource Management, Chapter 2300 – Publicly Managed Recreation Facilities
- The Built Environment Image Guide
- Forest Service Outdoor Recreation Accessibility Guidelines (FSORAG) and Architectural Barriers Act Accessibility Guidelines (ABAAS)
- Forest Service Trail Accessibility Guidelines (FSTAG) for trails and pathways
- Sign and Poster Guidelines for the Forest Service (SPGFS)

An overall theme of these guidelines is designing facilities, modifying the site, and using materials in ways that are compatible with the designated ROS setting for the area.

**Table 3.2-1. Recreation Opportunity Spectrum (ROS) Classifications and the associated Level of Site Modification.**

ROS Class	Development Scale	Level of Site Modification
Primitive	1	Minimum site modification. Rustic or rudimentary improvements designed for protection of the site rather than comfort of the users. Use of synthetic materials excluded. Minimum controls are subtle. No obvious regimentation. Spacing informal and extended to minimize contacts between users. Motorized access not provided or permitted.
Semi-Primitive Motorized; and Semi-Primitive Non-Motorized	2	Little site modification. Rustic or rudimentary improvements designed primarily for protection of the site rather than the comfort of the users. Use of synthetic materials avoided. Minimum controls are subtle. Little obvious regimentation. Spacing informal and extended to minimize contacts between users. Motorized access provided or permitted in the Motorized class. Primary access over primitive roads. Interpretive services informal.

**Table 3.2-1. (continued)**

ROS Class	Development Scale	Level of Site Modification
Roaded Natural	3	Site modification moderate. Facilities about equal for protection of natural site and comfort of users. Contemporary/rustic design of improvements is usually based on use of native materials. Inconspicuous vehicular traffic controls usually provided. Roads may be hard-surfaced and trails formalized. Development density about 3 family units per acre. Primary access may be over high standard roads. Interpretive services informal, but generally direct.
Rural	4	Site heavily modified. Some facilities designed strictly for comfort and convenience of users. Luxury facilities not provided. Facility design may incorporate synthetic materials. Extensive use of artificial surfacing of roads and trails. Vehicular traffic control usually obvious. Primary access usually over paved roads. Development density 3-5 family units per acre. Plant materials usually native. Interpretive services often formal or structured.

Source: Forest Service Manual 2300 – Recreation, Wilderness, and Related Resource Management. Chapter 2330 – Public Managed Recreation Management (USDA 2006)

In addition, all new, rehabilitated, and reconstructed Project recreation facilities located on NFS land will meet Forest Service national and regional direction, regulations, design and other applicable standards in place at the time of design, such as, but not limited to: FSORAG; Forest Service Manual (FSM) direction; Forest Service Handbooks (FSH); and official correspondence and other applicable direction. At Project recreation facilities on NFS land, YCWA shall provide the Forest Service “as-built” drawings (hard copy and electronic .dwg versions) for altered, improved, new construction, or expanded facilities when they are submitted to FERC.<sup>15</sup> In addition, YCWA shall provide “as-built” drawings (hard copy and electronic .dwg format) for existing facilities, where YCWA has records of these drawings.

At Project recreation facilities on YCWA land, as a general policy, site elements will be replaced with designs that meet current, applicable accessible guidelines (ABAAS) at the time of design for picnic tables, fire rings, pedestal grills, water hydrants, animal-resistant food lockers, restrooms, and other relevant constructed features. YCWA will use the ROS as guidelines, and the generally accepted professional recreation guidelines for its facilities.

### **3.2.2 Planning, Consultation, and Implementation Process for Major Recreation Enhancements**

Major recreation enhancements for new and rehabilitated facilities generally require a topographic site survey, design and engineering work and frequently result in a new site footprint. Such projects typically require multiple years to implement. Examples of major recreation enhancements include construction of new campgrounds, picnic areas, parking areas, and changing the footprint of an existing facility. Minor recreation enhancements, such as the installation or replacement of signs, food lockers or picnic tables, do not need to go through this process. YCWA will obtain prior approval from FERC for all major enhancements to recreation facilities; and, in addition, from the Forest Service for enhancements to recreation facilities on NFS land. Minor enhancements require minimal construction and time to complete.

<sup>15</sup> Once all construction work is completed, YCWA will include all final as-built drawings in Attachment C.



### **3.2.2.1 Planning Timeframe**

Major recreation enhancement work generally involves a three-step planning and implementation process. Steps in this process include preparation of 1) a Site Plan (Design Narrative and Site Concept Plan); 2) a Site Development and Construction Plan; and 3) contracting and construction for each facility. In addition, for all sites located on NFS land, reconstruction plans and minor recreation enhancements (such as constructed feature replacement) will need to meet current Forest Service standards; and each step will require approval by the Forest Service. These steps described below are typical and variances may occur because of the complexity or simplicity of the enhancement work.

#### **Step 1 - Site Planning**

YCWA will conduct the planning and design in consultation with the Forest Service at facilities on NFS land. The planning phase consists of a Design Narrative, a Site Concept Plan, and an environmental analysis/decision if the facilities are on NFS land and not already addressed in the FERC relicensing environmental analysis.

The Design Narrative describes the management objectives, design criteria, and constraints associated with the major rehabilitation of a recreation facility. The Design Narrative typically includes: a) management objectives; b) design criteria, including criteria on type and color of materials and accessibility; c) existing physical conditions; d) any rehabilitation and new construction; e) anticipated management problems that design may minimize; f) site capacity, durability, and protection; and g) user safety.

The Site Concept Plan presents a preliminary graphic illustration of proposed facilities and utilities in relationship to existing site features, facilities and utilities. The Site Concept Plan communicates proposed development ideas and/or alternatives. The Site Concept Plan may include large-scale representations of the area that indicate placement and orientation of the proposed facilities. This may include the use of aerial photography or topographic maps.

#### **Step 2 – Site Development Plan and Construction Plan**

In this step, YCWA will develop a Site Development Plan that adapts the Site Concept Plan to a detailed topographic survey that better represents actual, existing site conditions. This plan also identifies the site design details (i.e., picnic tables, fire rings, restrooms, signage, road surface materials, etc.). YCWA will submit all Site Development Plans to FERC for approval (regardless of land ownership). In addition for facilities on NFS land, YCWA will also provide Site Development Plans to the Forest Service for review prior to submitting the plans to FERC. The goal of this step is to develop: 1) design drawings for the proposed recreation enhancements; and 2) an implementation schedule.

This step also involves the development of a Construction Plan. The Construction Plan has the following elements:

- 1) Description of the proposed enhancements, construction methods, equipment, crews, access routes, and timing;
- 2) Description of measures to avoid impacts to water quality and sensitive resources (i.e., cultural and biological);
- 3) Identification of permitting and other regulatory requirements needed prior to construction;
- 4) Identification of appropriate site-specific erosion and sedimentation control measures; and
- 5) Identification of necessary measures to provide appropriate public and worker safety, recreation traffic and parking during the construction.

At facilities located on NFS land, YCWA will submit the Site Development Plan and Construction Plan to the Forest Service for approval. YCWA will finalize and submit these plans to FERC for final approval.

When new construction or expansion is specified in this Plan, the site capacities in this Plan are estimates only and will be refined based on topographic conditions, resource constraints, design standards and guidelines, relevant regulations, and, when located on NFS land, in consultation with the Forest Service.

### **Step 3 – Contracting and Construction**

This step involves contracting, planning and coordination in preparation of construction activities. For enhancements on NFS land, YCWA will commence construction: 1) after consultation with the Forest Service to ensure construction activities are coordinated with Forest Service; and 2) after FERC approval. YCWA will make a good faith effort to complete the rehabilitation of any one campground or picnic area within one year of commencement of reconstruction activities, so that the facility (or portion thereof) is not closed for more than one calendar year.

YCWA will aim to complete as much work as possible during periods when the facilities are normally closed (immediately before and after the open season); however, it is expected that some work will require closing the recreation facilities during the typical open season to complete all the proposed work. If construction takes longer than one year, and is not overly disruptive, YCWA will consider reconstructing individual campground loops separately, if the construction activity would unduly reduce the capacity of the area during a facility's open season. Furthermore, YCWA may choose to complete scheduled work prior to the described implementation schedule (Table 3.1-1), particularly when substantial cost savings are possible (i.e., volume discounts, high mobilization or transportation costs, etc.). In such scenarios, YCWA will include these ahead-of-schedule work tasks in the site development plans as with all other normally scheduled work.

During this three-step process and at the Annual Recreation Coordination Meeting, YCWA and the Forest Service will review the implementation status of recreation facilities proposed for

recreation enhancements on NFS land. For facilities on NFS land, upon agreement by both YCWA and the Forest Service, the recreation enhancement schedule for these facilities may be revised, as needed.

Following construction work on all new or rehabilitated facilities, YCWA will include all final as-built drawings in Attachment C of this Plan.

### **3.2.3 Avoidance, Protection, and Minimizing Affects to Sensitive Resource Areas**

Recreation enhancement projects can potentially affect sensitive resources (e.g., wetlands, culturally sensitive sites, critical wildlife habitats, sensitive botanical sites) at or near planned enhancement sites. Site Concept Plan and Site Development Plans for recreation sites, will avoid, mitigate, and/or minimize affects to these sensitive resources. In particular, YCWA will review the Project's other resource management plans (i.e., integrated vegetation management plan, transportation plan, historic properties management plan) during the development of Site Concept Plans and Site Development Plans to identify any additional resource protection measures to be implemented during construction. Review of this and other resource protection plans, and their approval by the FERC, as part of the relicensing process shall constitute compliance with the requirements of the National Environmental Policy Act (NEPA) for purposes of the enhancements contemplated under this Plan.

### **3.2.4 Review of Project Recreation Facility Condition**

At least every 6 years, commencing after new license issuance by the FERC, YCWA will meet with the Forest Service to review the conditions of Project recreation facilities located on NFS land and agree upon necessary replacement and major maintenance (i.e., reconstruction) work that is currently, or in the future will likely be, needed and agree on the timing of this work. For Project recreation facilities located on NFS lands, YCWA will use the Forest Service's standards for the frequency of rehabilitation or heavy maintenance as a guideline, but not a prescription, for scheduling replacement and major maintenance work. Standard life of recreation facilities ranges from 20 to 30 years. The criteria for project selection will depend on the amount and type of use, current Forest Service recreation facility policy, condition of facilities, effects on surrounding areas, and other factors. Following the review, YCWA will develop a revised schedule for replacement and/or reconstruction of Project recreation facilities on NFS lands, focusing on the upcoming 6 years, for approval by the Forest Service. This schedule may be updated at other times, with Forest Service approval, after consultation during Annual Recreation Coordination Meetings.

During the license period, YCWA will replace existing recreation features (i.e., picnic tables, fire rings, restrooms, animal-resistant food lockers) within Project recreation facilities on an as-needed basis depending upon the facility's condition. In particular, every 2 years YCWA will inspect all fire rings, maintain them in "good" condition or, if needed, replace them. "Good" condition includes a level grill with a usable grate.

For all Project recreation facilities, YCWA will evaluate the current condition of each of the recreation facilities during an annual condition assessment. The annual assessment has two purposes: 1) to identify facilities scheduled for replacement in the following calendar year that are in good condition and replacement can be postponed; and 2) to identify minor maintenance items for YCWA to address either immediately or upon opening the facility in the following year. YCWA handles these minor maintenance items as part of YCWA's regular recreation facilities O&M (refer to Section 3.1). This allows YCWA to schedule high cost items and minor maintenance items into future annual budgets.

### **3.2.5 Guidelines for Major Maintenance and Replacement**

The designs of major maintenance and replaced facilities will meet current, applicable federal and state guidelines that exist during the design phase for these enhancements (see Section 3.2.1 for current guidelines). Furthermore, at the time of replacement, YCWA will evaluate if a new design or technology can be reasonably implemented that would better serve recreationists.

Prior to major maintenance or replacement of a Project recreation facility on NFS land, YCWA will meet with the Forest Service to review the design of the facility. Reasonable modifications will be made to the facility design to address the functionality of the facility in light of the current use and compliance of the facility with current design standards. All planning, design, and coordination will be accomplished with the intent to complete construction, reconstruction, or replacement during the implementation year as shown in the master implementation schedule (Section 3.5).

Additionally, on NFS land, at the time of replacement or reconstruction, YCWA will address site grading and other potential site modifications including, but not limited to:

- Reconstruction, or replacement of constructed features, including - toilets, gates, table, fire rings, septic systems, water system features, barriers, retaining walls, unit markers, bulletin boards, signs, entrance and fee stations, and animal resistant food lockers.
- Accessibility - Evaluate opportunity to provide accessibility at all campsites and (to the degree topographically feasible) implement these opportunities. Provide Outdoor Recreation Access Routes between constructed features, campsites, toilets and spurs at Development Scale 3 or higher recreation facilities.
- Re-grading and graveling non-paved roads and spurs.
- Resurfacing paved roads, including providing asphalt treatment of roads and spurs and sufficient subgrade and, where appropriate, providing turnouts at entrance stations, toilets, trash bin pads, etc. and providing asphalt treatment of spurs when the circulation road is paved.
- Address opportunities to lengthen and widen spurs as needed.
- Replacement of wood barriers with rock barriers of sufficient quantity to discourage off road travel. Install additional barriers as needed.

- Remove protrusions and provide a graded living space including tent pads and clear floor space around tables, food storage lockers and grills.
- Installation of gates.
- Upgrade of host sites to improve public service and campground management by allowing the concessionaire to attract responsible hosts.
- Providing enhancements such as extra parking when there is a demand, and topography allows.
- Installing signing that meets Forest Service standards and address recreation area opportunities (including trails), maps of facilities, resource protection information (appropriate for the area), emergency contacts, safety, and regulations (including water surface regulations).

Items typically addressed during major maintenance or replacement of Project recreation facilities are described below.

### **3.2.5.1 Guidelines for Specific Facilities and Site Features**

#### **Roads, Parking Areas, Campground Spurs and Boat Ramps**

All roads, parking areas, campground spurs and boat ramps at Project recreation facilities will be maintained according to the guidelines in the Project's Transportation System Management Plan included in the license.

#### **Fire Rings, Pedestal Grills, Picnic Tables, Animal-Resistant Food Lockers, Water Hydrants, Restrooms and Trash Receptacles**

YCWA's policy is to use accessible versions that meet applicable accessibility guidelines (FSORAG/ABAAS or 2010 ADA Standards for Accessible Design) when replacing or installing new amenities including fire rings, pedestal grills, picnic tables, restrooms, animal-resistant food lockers, water hydrants and trash receptacles. At developed drive-in and walk-in campgrounds food lockers will be at least 30 cubic feet to accommodate a cooler. YCWA will replace food lockers with animal-resistant models. When YCWA replaces these constructed features, YCWA will provide the appropriate number of accessible sites per applicable accessible guidelines (FSORAG or ABAAS on NFS land and 2010 ADA Standards for Accessible Design on YCWA land).

#### **Signs**

Directional signs, entrance signs, information boards, and other signs will be replaced as needed, with similar messages. Signs and information boards need to meet applicable Forest Service (i.e., SPGFS), FERC, Cal Trans, MUTDC, and YCWA guidelines at the time of their replacement.

## **Restrooms**

Restroom buildings will be replaced with models of similar size (number of stalls), unless during major rehabilitation it is determined that a model with fewer stalls is adequate to meet the needs and standards of the facility at that location. When replacing the restroom buildings, YCWA will also evaluate the rehabilitation needs of any associated septic systems including leach fields. YCWA assumes that all existing septic systems and leach fields will need replacement at the same time as the restrooms, but cannot be certain until the septic systems are evaluated at the time of restroom replacement.

## **Water Systems**

During the license term, YCWA anticipates that all water systems will need to be upgraded at least once. Upgrading generally includes replacing the existing distribution piping, connections, and water hydrants, while maintaining the same system design and footprint, as warranted. However, during the planning for replacement of the water distribution system, YCWA will evaluate if the footprint should be reviewed to determine if there is a design or technologies that can be reasonably implemented that would better serve recreation users.

## **Campgrounds and Picnic Areas**

When new campgrounds and picnic areas are constructed, or an existing campground or picnic area is significantly modified from the existing footprint, the number of accessible campsites, picnic sites, and restrooms for public use, will need to meet current applicable accessibility guidelines (e.g., FSORAG or ABAAS on NFS lands and 2010 ADA Standards for Accessible Design on private lands). Under the current FSORAG, accessible campsites would provide the following accessible components: picnic table, fire rings, site marker, tent pad, food locker, trash receptacles and parking spurs. YCWA will provide accessible pathways from designated accessible parking areas to accessible restrooms, accessible campsites and accessible camping hydrants.

At new or reconstructed Project campgrounds (Development Scale 2 or higher) on NFS land, YCWA will provide the following facilities or features, unless specifically excluded in this Plan or as subsequently agreed to by YCWA and Forest Service:

- Roads and spurs with barriers to prevent off road vehicular travel
- At walk-in campgrounds, graded and graveled paths from parking areas to campsites
- Access routes that meet current accessibility standards for the development level
- Tables
- Fire rings
- Animal-resistant food lockers (at least 30 cubic foot)
- Information boards
- Entrance station and sign

- Toilets
- Site markers
- Level tent pads

YCWA will provide host sites at Project campgrounds on a case-by-case basis. The installation of a host site will depend on the level of use, remoteness, proximity to other facilities with a host site, and the level of campground facility development. In addition, where campgrounds are clustered together, one host site may cover multiple campgrounds.

At new or reconstructed picnic areas on NFS land, YCWA will provide the following facilities or features unless YCWA and Forest Service agree otherwise:

- Circulation roads and parking areas with barriers, where needed, to prevent off road travel
- Tables
- Information boards
- Entrance sign

On a site-by-site basis at picnic areas on NFS land, YCWA will install toilet buildings and pedestal grills or concrete barbecue grills with self-contained ash boxes.

### **3.2.6 Vegetation Management at Recreation Facilities**

Vegetation management at Project recreation facilities, including non-native invasive plant management, will be addressed according to the Project's Integrated Vegetation Management Plan included in the new FERC license.

## **3.3 Near-Term Rehabilitation and Enhancements to Existing Recreation Facilities**

### **3.3.1 New Bullards Bar Reservoir**

#### **3.3.1.1 Schoolhouse Campground (NFS Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 5 years of license issuance. Refer to Section 3.2 – Major Rehabilitation Guidelines, for details.

### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

## Enhancements

Within 5 years of license issuance, YCWA will complete the following enhancements:

- Replace the lone existing vault restroom (2-unit) with a efficient flush model (including appropriate septic system), if the addition of the flush facility does not exceed the existing water system capacity.<sup>16</sup>
- Convert the double and triple campsites to single campsites.
- Upgrade the host site with water and electric hookups and a septic tank.
- Provide electricity at the entrance kiosk/information board, host site, RV campsites and each restroom.
- Develop up to 12 RV campsites with water and electric hookups. The final number of RV campsites may change during site design due to terrain and road turning radius limitations.
- Restrict RV size at the campground to a 30 ft length, except where RVs up to 40 ft length may be accommodated without: 1) significantly re-designing the existing campground circulation road; and 2) reducing the total number of existing campsites.
- Provide appropriate trailhead signage on the facility entrance sign.

In addition, YCWA will complete the following enhancements specific to the overflow parking area.

- Formalize and re-organize the existing overflow parking area to provide parking areas for both campground overflow parking and trailhead parking for Schoolhouse Trail. The enhancements will include:
  - Provide campground overflow parking in a paved parking area for 10 single spaces (striped) with vehicle barriers
  - Provide a trailhead parking area with 1) a paved parking area for 10 single spaces (striped) with vehicle barriers; and 2) trailhead signage, including a 1-panel information board with trail information and a map, a trailhead identification sign
- Construct native surface, pedestrian connector trail to Schoolhouse Trail from the trailhead parking area

### 3.3.1.2 Dark Day Campground (NFS Land)

For reference purposes, this facility is scheduled for major rehabilitation within 7 years of license issuance.

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<sup>16</sup> If the flush facilities exceed the existing water system capacity, then YCWA will install vault models.



## Near-Term Rehabilitation

YCWA does not propose any near-term rehabilitation.

## Enhancements

Within 7 years of license issuance concurrent with major rehabilitation of the facility, YCWA will complete the following enhancements:

- Replace the existing vault restrooms with efficient flush models and sizes that meet Forest Service capacities (including appropriate septic system), if the addition of these flush facilities do not exceed the existing water system capacity<sup>17</sup>
- Convert the double and triple campsites to single campsites
- Expand the capacity by two single campsites, as feasible<sup>18</sup>

### 3.3.1.3 Hornswoggle Group Campground (NFS Land)

For reference purposes, this facility is scheduled for major rehabilitation within 4 years of license issuance.

## Near-Term Rehabilitation

YCWA does not propose any near-term rehabilitation.

## Enhancements

Within 4 years of license issuance concurrent with major rehabilitation of the facility, YCWA will complete the following enhancements:

- Replace the existing 4-unit flush restrooms at the Manzanita and Madrone campsites with efficient 2-unit flush models
- Replace the existing, 2-unit vault restrooms at the Sugarpine and Douglas Fir campsites with efficient 1-unit flush models (including appropriate septic system), if the addition of these flush facilities do not exceed the existing water system capacity<sup>19</sup>
- Install an efficient 1-unit flush restroom at Dogwood and Ponderosa campsites (where restrooms do not currently exist), if the addition of these flush facilities do not exceed the existing water system capacity<sup>20</sup>

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<sup>17</sup> If the flush facilities exceed the existing water system capacity, then YCWA will install vault models.

<sup>18</sup> The current triple site (Site 4) is the likely location for possible expansion.

<sup>19</sup> If the flush facilities exceed the existing water system capacity, then YCWA will install vault models.

<sup>20</sup> If the flush facilities exceed the existing water system capacity, then YCWA will install vault models.

- Restrict RV size at the campground to a 30-ft length, except where RVs up to 40-ft length may be accommodated without significantly re-designing the existing campground circulation roads
- Expand the capacity by one group campsite (25-50 PAOT), including a parking area, restroom, and group camping area
- Provide electricity at the entrance kiosk/information board and each restroom

#### **3.3.1.4 Cottage Creek Campground (NFS and YCWA Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 2 years of license issuance.

##### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

##### **Enhancements**

Within 2 years of license issuance concurrent with major rehabilitation of the facility, YCWA will redevelop the facility (destroyed by fire in 2011) as a group campground to meet small group camping needs with the following facilities and specifications.

- A total of four small group campsites consisting of two 12-PAOT sites and two 18-PAOT sites.
- A group living area with a group fire ring, picnic tables and food lockers at each campsite
- A paved parking area with spaces designed for a vehicle with a boat trailer for each campsite
- An appropriate number (and size) of efficient flush restrooms that meets the standards at the time of design, including lighting (interior and exterior) at the restrooms
- A potable water delivery and distribution system

Dependent upon the recreation monitoring program (Section 4), this site should be considered for future additional group camping facilities either for small group camping (12- to 18-PAOT sites) or potentially larger group camping (25-PAOT or larger sites).

#### **3.3.1.5 Garden Point Boat-in Campground (NFS Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 7 years of license issuance.

### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

### **Enhancements**

Within 7 years of license issuance concurrent with major rehabilitation of the facility, YCWA will complete the following enhancements:

- Expand the site capacity by at least five single campsites
- Install additional restrooms meeting the needs of the final number of new campsites developed

#### **3.3.1.6 Madrone Cove Boat-in Campground (YCWA Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 2 years of license issuance.

### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

### **Enhancements**

YCWA does not propose any enhancements.

#### **3.3.1.7 Frenchy Point Boat-in Campground (NFS Land)**

Within 1 year of license issuance, YCWA will decommission this facility due to low use related to difficult access conditions (very steep shoreline access), which results in a very narrow period of use (approximately two months).

#### **3.3.1.8 Dark Day Picnic Area (NFS Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 6 years of license issuance.

### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

### **Enhancements**

Within 6 years of license issuance concurrent with major rehabilitation of the facility, YCWA will complete the following enhancements:

- Replace the existing vault restroom with an efficient flush model (including appropriate septic system), if the addition of the flush facility does not exceed the existing water system capacity<sup>21</sup>
- Expand the parking area to provide a total of 25 single spaces
- Improve shoreline access, including developing trails and signage
- Recommend a county ordinance establishing a non-motorized boating only zone in the cove west of the picnic area peninsula
- Remove the Klamath stoves

### **3.3.1.9 Sunset Vista Point (NFS Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 3 years of license issuance.

#### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

#### **Enhancements**

Within 3 years of license issuance concurrent with major rehabilitation of the facility, YCWA will complete the following enhancements:

- Replace the existing vault restroom with an efficient flush model (including appropriate septic system), if the addition of the flush facility does not exceed the existing water system capacity<sup>19</sup>
- Install two additional picnic sites, each with a picnic table and a concrete grill with self-contained ash box
- Upgrade the existing picnic site by replacing the picnic table and installing a concrete grill with self-contained ash box
- Enhance the vistas of the reservoir from each picnic site by selectively clearing vegetation per the guidelines in YCWA's Visual Management Plan
- Delineate each parking space, but maintain the existing gravel parking surface; except at the accessible parking spaces (number to be determined during site design), which will be a paved or concrete surface
- Delineate the parking spaces/areas for the vista/picnic visitors and trailhead users
- Improve signage on the entrance sign and all information boards to include all recreational uses at the facility

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<sup>21</sup> If the flush facilities exceed the existing water system capacity, then YCWA will install vault models.

- Provide a 3-panel interpretive display that includes, at a minimum, information on the Project history and purpose as well as other relevant local/area history

### **3.3.1.10 Dam Overlook (YCWA Land)**

Importantly, YCWA will utilize this facility as a construction staging area for the non-recreational Project enhancements to the spillway and low-level outlet. Therefore, YCWA is unable to schedule a specific year for major rehabilitation. Rather, within two years of completing the dam/spillway modification projects, YCWA will reconstruct the existing gravel parking area for 10 vehicles with vehicle barriers.

#### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

#### **Enhancements**

Concurrent with the major rehabilitation of this facility, YCWA will complete the following enhancements:

- Install an information board identifying the Project recreational facilities and opportunities, including a map

### **3.3.1.11 Moran Road Day Use Area (NFS Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 9 years of license issuance.

#### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

#### **Enhancements**

Within 2 years of license issuance, YCWA will complete the following enhancements:

- Develop a turnaround along the car top boat ramp below the high water line designed for vehicles only (not for vehicles with trailers since the facility is designed/intended for car top launching only)

### **3.3.1.12 Cottage Creek Boat Launch (YCWA Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 10 years of license issuance.

### **Near-Term Rehabilitation**

Within 5 years of license issuance, YCWA will complete the following near-term rehabilitation:

- Rehabilitate the existing concrete boat ramp

### **Enhancements**

YCWA does not propose any enhancements.

#### **3.3.1.13 Dark Day Boat Launch (NFS Land)**

For reference purposes, this facility is scheduled for major rehabilitation within 3 years of license issuance, excluding the overflow boat ramp parking area (constructed in 2003), which is scheduled for major rehabilitation within 10 years of license issuance.

### **Near-Term Rehabilitation**

At the main boat launch facility, YCWA does not propose any near-term rehabilitation.

Within 3 years of license issuance, YCWA will complete the following near-term rehabilitation at the overflow parking area facility:

- Repave and stripe the parking area

### **Enhancements**

Within 3 years of license issuance, YCWA will complete the following enhancements at the main boat launch facility:

- Replace the existing vault restroom with an efficient flush model (including appropriate septic system), if the addition of the flush facility does not exceed the existing water system capacity<sup>22</sup>
- Repair the erosion uphill of the concrete boat ramp<sup>23</sup>

YCWA does not propose any enhancements at the overflow parking area facility.

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<sup>22</sup> If the flush facilities exceed the existing water system capacity, then YCWA will install vault models.

<sup>23</sup> The Dark Day Boat Launch ramp has a functionality issue at an approximate WSE of 1,856 ft due to slope instability in the upslope side of the ramp, where at times, the slope erodes depositing sediment on the boat ramp – typically during the non-peak season (January up to Memorial Day weekend and after Labor Day through December). The accumulation of the sediment impacts the functionality of the boat ramp making the boat ramp impassable by vehicles backing down boat trailers; and the sediment impedes or damages the function of the boat dock rail and roller system requiring that the dock be removed.

### **3.3.1.14 Project Recreational Trails (Bullards Bar and Schoolhouse Trails)**

Rehabilitation of the recreational trails occurs via annual and 5-year maintenance activities (refer to Section 3.1.2.2 – Developed Recreational Trail Maintenance Activities for specific maintenance activities).

#### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

#### **Enhancements**

Within 1 year of license issuance, YCWA will complete the following enhancements:

- Install consistent signage at all Project trailheads, including a:
  - Trailhead symbol or identification sign at all facility entrance signs where trailheads are located
  - Trailhead identification sign at all trailhead parking areas
  - Trailhead information board with trail map and information
- Install consistent directional signage at all Project trail junctions

### **3.3.1.15 Recreational Water System**

For reference purposes, this facility is scheduled for major rehabilitation within 12 years of license issuance.

#### **Near-Term Rehabilitation**

Within 3 years of license issuance, YCWA will complete the following near-term rehabilitation:

- Replace the 5.2-mile main line of the underground water distribution system from the water treatment facility (at Cottage Creek Boat Launch) to the south side of New Bullards Bar Reservoir along Marysville Road terminating at the start of the Dark Day Campground Picnic Area and Boat Launch complex, including the above-ground span of piping across the dam (as needed).

Note that the underground water distribution lines (off the main line) and hydrants within each recreation facility will be replaced during major rehabilitation of each facility and not specifically as part of the main line rehabilitation.

#### **Enhancements**

YCWA does not propose any enhancements.

### **3.3.1.16 Floating Comfort Stations (Restrooms)**

For reference purposes, this facility is scheduled for major rehabilitation within 16 years of license issuance.

#### **Near-Term Rehabilitation**

YCWA does not propose any near-term rehabilitation.

#### **Enhancements**

YCWA does not propose any enhancements.

### **3.3.2 Diversion Dam Impoundments**

#### **3.3.2.1 Our House Diversion Dam**

This site does not have any existing recreation facilities and YCWA does not propose any enhancements.

#### **3.3.2.2 Log Cabin Diversion Dam**

This site does not have any existing recreation facilities and YCWA does not propose any enhancements.

### **3.3.3 Other Facilities**

#### **3.3.3.1 Decommissioned Burnt Bridge Campground (NFS Land)**

This facility is no longer part of the Project. Burnt Bridge Campground was closed initially by the Forest Service in 1979 due to low use levels. FERC, in an August 19, 1993 Order, which approved YCWA's Revised Recreation Plan, directed YCWA to remove all improvements and restore the Burnt Bridge Campground to the condition it was in prior to development of the facility. YCWA consulted with the Forest Service and all that remains of Burnt Bridge Campground today is the circulation road and vehicle spurs; all other facilities were removed.

Since the facility has already been decommissioned and no other work is needed at this site, YCWA will formally remove the facility from the Project Boundary.

## **3.4 New Recreation Facilities**

YCWA does not propose any new recreation facilities.



### **3.5 Master Implementation Schedule**

This section identifies the implementation schedule for the major rehabilitation, near-term rehabilitation and enhancements at each existing recreation facility; and the implementation schedule for new recreation facilities (i.e., enhancements). This schedule was developed using the replacement of the existing main line of the recreational facility water delivery system as the primary driver of the near-term major rehabilitation schedule. The rationale for this approach is primarily the efficiency of the work, to avoid repeated rehabilitation efforts on the same facilities and the resultant significant cost savings. Further, replacement of the underground water system is the single most impactful work project at each facility because the work would affect the most significant (and costly to replace) facilities and amenities within the recreation facilities – the circulation roads, restroom buildings and the septic and leach field systems. As such, YCWA’s schedule was developed to complete the main water line replacement and then begin the process of rehabilitating the recreation facilities either concurrently or sequentially following water system replacement while still providing a phased approach to avoid the closure of multiple facilities at the same time. This avoids repeating costly facility major rehabilitation work such as re-paving recently paved roads; moving or altering recently replaced restrooms; and/or re-aligning, extending or relocating recently replaced septic systems and leach fields that might occur if the underground water system work was completed after major rehabilitation of the recreation facilities.

YCWA recognizes that this approach may not precisely align with the priority of rehabilitation work, particularly for some of the older amenities (e.g., restrooms) based on the current condition of all the facilities and that it may require enhanced minor maintenance of these facilities until the major rehabilitation of the facilities can occur. However, overall, YCWA’s believes this approach is ultimately the most efficient and practical approach to provide enhanced recreation facilities over the term of the license with the least disruption to the public overall (minimizes the impact and occurrence of closed facilities) and at significant cost savings to YCWA primarily by avoiding repeated major rehabilitation efforts at the same facilities.

**Table 3.5-1. Schedule of major and near-term rehabilitation and enhancements of Project recreation facilities over the new license term.**

Facility	Completion Year During New License																			
	[Legend: E=enhancement / N=near-term rehabilitation / M=major rehabilitation/ D=decommission]																			
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
Recreational water supply system	N <sup>1</sup>	N <sup>1</sup>	N <sup>1</sup>									M <sup>2</sup>								
Schoolhouse Campground					E/M															
Hornswoggle Group Campground				E/M																
Dark Day Campground							E/M													
Dark Day Picnic Area						E/M														
Dark Day Boat Launch			E/M																	
Dark Day Boat Launch Overflow Parking Area			N							M										
Cottage Creek Campground		E/M																		
Cottage Creek Boat Launch										M										
Garden Point Boat-In Campground							E/M													
Madrone Cove Boat-In Campground		M																		
Frenchy Point Boat-In Campground	D																			
Moran Road Day Use Area		E							M											
Sunset Vista			E/M																	
Dam Overlook	Exact Year Unknown <sup>3</sup>																			
Bullards Bar and Schoolhouse Trails	E <sup>4</sup>																			
Floating Comfort Stations (restrooms)																M				
Our House Diversion Dam	Not applicable <sup>5</sup>																			
Log Cabin Diversion Dam	Not applicable <sup>5</sup>																			

<sup>1</sup> Near-term rehabilitation of the main line of the water distribution system serving the facilities on the south side of New Bullards Bar Reservoir along Marysville Road. The distribution lines and hydrants will be replaced as part of the major rehabilitation of each individual facility.

<sup>2</sup> Major rehabilitation of the water treatment facility and the storage tanks as well as any other facilities not included in the water distribution system for the facilities on the south side of New Bullards Bar Reservoir along Marysville Road.

<sup>3</sup> Major rehabilitation of the Dam Overlook is scheduled to be completed within 2 years after the New Bullards Bar Dam spillway and low-level outlet modifications are completed as this site will be utilized for construction purposes during the modifications.

<sup>4</sup> The trails are not scheduled for major rehabilitation. Rather, routine maintenance on annual and 5-year intervals will be done in place of major rehabilitation.

<sup>5</sup> The diversion dams do not have any existing facilities or proposed enhancements.

## SECTION 4.0

# MONITORING PROGRAM

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This section describes the Project's recreation-monitoring program. The goals of the monitoring program are throughout the license period: 1) to help ensure that Project recreation facilities meet user needs (including providing users with quality recreation experiences), 2) ensure that recreation-use resource impacts are minimized; and 3) that prescribed carrying capacities are not exceeded. This monitoring program will begin the first year after license issuance and FERC approval of this Plan; however, specific elements are scheduled for differing intervals throughout the license term.

FERC requires a Form 80 Recreation Report every 6 years that includes (among other things for the Project), the current estimated annual day and overnight visits (in recreation-days); the number of fee and free recreation facilities; and the non-holiday weekend occupancies of various types of recreation facilities. This monitoring program does not include YCWA's Form 80 monitoring methods. However, this Plan's monitoring program is designed to collect and report recreation use monitoring parameters in coordination with the FERC Form 80 scheduling to provide the most consistent, comprehensive and useful reporting of recreation use over the new license term.

In this Plan, YCWA is proposing a three-part monitoring approach, including a facility occupancy element, reservoir boating capacity element and a social monitoring element. Each of these elements utilizes monitoring indicators and standards. Indicators are quantifiable measures of important recreation-resource conditions. Standards define the level of the indicators considered to be acceptable for the resource. If monitoring shows that conditions exceed acceptable levels as defined by standards, an "impact problem" is said to exist, and appropriate management actions or development should be considered; and this Plan includes a section (Section 5.0) that details the actions and processes necessary when considering taking management action(s) or developing additional resources.

Each of the three monitoring elements and their associated indicators, standards and data collection methods are described below.

## **4.1 Facility Occupancy Element**

Facility indicators focus on occupancy rates at developed Project recreation facilities; and specifically developed campgrounds and day use facilities. Campsite occupancy is monitored for campgrounds, and picnic site and parking area occupancy (where applicable) are monitored for day use facilities. A facility's occupancy rate is calculated by dividing the number of occupied sites by the number of sites at the facility (only when a facility is open and excluding host sites); and is expressed as a percentage from 0-to-100. Overflow use is not included in the occupancy calculation of a recreation facility.

### 4.1.1 Campground Occupancy Methods

Each year, YCWA will calculate the occupancy for all Project campgrounds by using the camping reservation system records since all campgrounds are on a reservation system. YCWA will begin collecting this data in the first year after license issuance. The detailed monitoring program and trigger groupings for Project campgrounds are identified in Table 4.1-1 and 4.1-2, respectively.

**Table 4.1-1. Monitoring indicators, standards and data collection methods for Project campgrounds.**

<b>Camp-grounds</b>	Indicator Season		Memorial Day through Labor Day holiday weekends
	Indicator Occupancy		Average peak season occupancy for non-holiday weekends (Friday & Saturday) <u>combined for a trigger grouping</u>
	Indicator Conditions		<ul style="list-style-type: none"> <li>• The occupancy will only be calculated for days when the facility is open during the peak season.</li> <li>• Campground host sites are exempt from the occupancy calculation.</li> </ul>
	Data Collection	Method	Calculated daily occupancy from the daily campground reservation system records
		Frequency	Every year
	Trigger Threshold		95% or above indicator occupancy is reached in any 3 <u>consecutive</u> years out of a 6-year rolling period. Note: it is not necessary to wait for a complete 6 years if the trigger is met sooner.
	Actions if Trigger is Met		Move to Required Actions for Future Facility Development (refer to Section 5.1.1).
Action if Trigger is <u>Not</u> Met		Continue with annual monitoring and data collection.	

**Table 4.1-2. Trigger groupings for Project campgrounds.**

Grouping	Facility Name	Campsite Capacity
Family Campgrounds	Schoolhouse Campground	56 sites
	Dark Day Campground	12 sites
Group Campgrounds	Hornswoggle Group Campground	7 sites
	Cottage Creek Group Campground	4 sites
Boat-in Campgrounds	Garden Point Boat-in Campground	21 sites
	Madrone Cove Boat-in Campground	10 sites

### 4.1.2 Day Use Facility Occupancy Methods

Every 6 years concurrent with the FERC Form 80 monitoring year, YCWA will collect recreation occupancy at the day use facilities using an observation survey. The day use facilities include day use areas, vistas, overlooks, picnic areas, and boat launches. During each observation survey, YCWA will record the number of observed “at-one-time” occupied parking spaces and occupied picnic sites, where applicable. YCWA will conduct the first observation survey of the new license in the year indicated as the first FERC Form 80 Recreational Use Report monitoring year scheduled after new license issuance.

The detailed monitoring program and trigger groupings for Project day use facilities are identified in Table 4.1-3 and 4.1-4, respectively.

**Table 4.1-3. Monitoring indicators, standards and data collection methods for Project day use facilities.**

<b>Day Use Facilities</b>	Indicator Season		Memorial Day through Labor Day holiday weekends	
	Indicator Occupancy		Average peak season occupancy for non-holiday Saturdays <u>combined for a trigger grouping</u>	
	Indicator Conditions		The indicator occupancy will only be calculated for days when the facility is open during the peak season.	
	<b>PHASE 1 MONITORING</b>			
	Data Collection	Method	On-site observations	
		Frequency	Every 6 <sup>th</sup> year (concurrent with the Form 80 cycle) on each non-holiday Saturday	
		Period of Day	Between 1:00 p.m. and 5:00 p.m.	
	Trigger Threshold		95% or above the indicator occupancy	
	Action if Trigger is Met		Conduct Phase 2 Monitoring (monitoring in the next three consecutive years)	
	Action if Trigger is <b>Not</b> Met		Continue with Phase 1 monitoring every 6 <sup>th</sup> year (concurrent with the Form 80 cycle)	
	<b>PHASE 2 MONITORING</b>			
	Data Collection	Method	On-site observations	
		Frequency	<ul style="list-style-type: none"> <li>• Two consecutive years following the Phase 1 monitoring year on each non-holiday Saturday.</li> <li>• <b>2<sup>nd</sup> Year Exception:</b> if the trigger is met in the 1<sup>st</sup> of the 2 additional monitoring years, then monitoring is not needed in the 2<sup>nd</sup> year (see <i>Trigger Threshold</i> below)</li> </ul>	
		Period of Day	Between 1:00 p.m. and 5:00 p.m.	
	Trigger Threshold		95% or above the indicator occupancy in at least 1 of the 2 years	
Actions if Trigger is Met		Move to <i>Required Actions for Future Facility Development</i> (refer to Section 5.1.1).		
Action if Trigger is <b>Not</b> Met		Return to Phase 1 monitoring		

**Table 4.1-4. Trigger groupings for Project day use facilities and overflow parking area (picnic sites and parking spaces).**

Grouping	Facility Name		Current or Proposed Indicator Capacity		
			Picnic Sites	Parking Spaces	
				Single	Double
Day Use Areas	Dark Day Picnic Area		10	25	not applicable
	Sunset Vista Point		3	20	not applicable
	Dam Overlook		not applicable	10	not applicable
	Moran Road Day Use Area		not applicable	8	not applicable
Boat Launches	Cottage Creek Boat Launch		not applicable	130	79
	Dark Day Boat Launch	Main	not applicable	39	64
		Overflow	not applicable	18	55
Undeveloped Sites <sup>1</sup>	Our House Diversion Dam		not applicable	25	not applicable

<sup>1</sup> Log Cabin Diversion Dam is excluded from the “Undeveloped Sites” grouping since the diversion dam access road is gated and does not permit vehicle access to the site.

## 4.2 Reservoir Boating Capacity Monitoring Element

### 4.2.1 Background

#### 4.2.1.1 Existing Reservoir Boating Capacity Threshold

In the 1993 Revised Exhibit R, YCWA and the Forest Service established a maximum water surface carrying capacity of 420 boats-at-one-time (BAOT) (YCWA 1993). A boat is any motorized watercraft, which at New Bullards Bar Reservoir generally consists of houseboats, power boats (ski boats, wakeboard boats, fishing boats, etc.) and personal watercraft (or jet skis). The design carrying capacity of 420 BAOT was developed using a blend of three water recreation opportunity spectrum (WROS)<sup>24</sup> settings, including: 1) Urban Natural WROS (144 BAOT capacity); 2) Rural Natural WROS (180 BAOT capacity); and 3) Semi Primitive WROS (96 BAOT capacity) (Reclamation 2004).

#### 4.2.1.2 Recent Trends

Historically, the Forest Service has been monitoring the peak number of BAOT on the reservoir by surveying the number of BAOT during holiday and non-holiday weekends. A summary of these observations from 2002 through 2012 are provided in Table 4.2-1 below.

From 2002 through 2012, the design capacity was exceeded in seven of the eleven years. However, of note, the exceedance days were all holidays, except for 2010 which was a non-holiday weekend day. Given the typical high volume of recreation use at most recreation areas in California on summer holidays and the common exceedance of other facility capacities on holiday weekends (namely campgrounds and boat launch parking areas), it is reasonable to expect the design capacity exceedance trend to continue on holidays.

**Table 4.2-1. Peak number of boats-at-one-time, vehicles-at-one-time and camping units occupied in a day (2002-2012).**

Year	Boats-At-One-Time (BAOT)			Number of Days that Exceeded the Capacity (420 BOAT)		
	Total	Houseboats <sup>1</sup>	Other <sup>1</sup>	Total	Holiday	Non-Holiday
2002	453	no data	no data	2	2	0
2003	425	no data	no data	2	2	0
2004	474	no data	no data	1	1	0
2005	410	no data	no data	0	0	0
2006	424	no data	no data	1	1	0
2007	452	no data	no data	1	1	0
2008	403	no data	no data	0	0	0
2009	404	no data	no data	0	0	0

<sup>24</sup> The Water Recreation Opportunity Spectrum (WROS) is a tool to understand the type and location of six types of water related recreation opportunities, otherwise known as WROS classes. The six WROS classes range across a spectrum of urban, suburban, rural developed, rural natural, semi primitive and primitive classes. Each WROS class is defined by a particular “package” of activities, setting attributes, experiences and benefits. Refer to the Water Recreation Opportunity Spectrum Users’ Guidebook for additional information at: [http://www.usbr.gov/pmts/planning/wros/wros\\_report.pdf](http://www.usbr.gov/pmts/planning/wros/wros_report.pdf).

**Table 4.2-1. (continued)**

Year	Boats-At-One-Time (BAOT)			Number of Days that Exceeded the Capacity (420 BOAT)		
	Total	Houseboats <sup>1</sup>	Other <sup>1</sup>	Total	Holiday	Non-Holiday
2010	421	no data	no data	1	0	1
2011	397	58	350	0	0	0
2012	453	45	408	1	1	0
<i>Average</i>	<i>429</i>	<i>52</i>	<i>379</i>	<i>0.8</i>	<i>0.7</i>	<i>0.1</i>

<sup>1</sup> Only the total BAOT counts were available from the Forest Service for 2002 through 2010. A breakdown of the types of boats and the counts by day were only available from the Forest Service for 2011 and 2012.

Table 4.2-2 shows a more detailed summary of the BAOT counts for 2011 and 2012 by day type. For the two-year period, only one exceedance day occurred in 2012 (453 BOAT or 108% of capacity). As discussed above, the maximum holiday BAOT were near exceeding (95% in 2011) or exceeded (108% in 2012) the design capacity. However, the non-holiday peak BAOT was 79 percent (333 BAOT) and 81 percent (341 BAOT) of the design capacity, which demonstrates that some additional reservoir boating capacity, at least in the near-term, is available on non-holiday weekend days.

**Table 4.2-2. Average, minimum and maximum BAOT and percent of boating capacity by day type for 2011 and 2012.**

Day Type	Statistic	2011 BAOT Data (16 survey days)		2012 BAOT Data (17 survey days)	
		Number	Percent of Design Capacity	Number	Percent of Design Capacity
All Days	Average	259	62%	291	69%
	Minimum	63	15%	164	39%
	Maximum	397	95%	453	108%
	Exceedance Days	0	--	1	--
Holiday Days	Average	296	71%	321	76%
	Minimum	152	36%	164	39%
	Maximum	397	95%	453	108%
	Exceedance Days	0	--	1	--
Non-Holiday Weekend Days	Average	242	58%	279	66%
	Minimum	63	15%	222	53%
	Maximum	333	79%	341	81%
	Exceedance Days	0	--	0	--

## 4.2.2 Reservoir Boating Capacity Monitoring Methods

Reservoir boating capacity monitoring will focus on the total BAOT use on non-holiday weekends. These methods are generally consistent with the methods from the existing license, except YCWA proposes to collect the data only on non-holiday weekends (Saturdays) and every 6 years (concurrent with the FERC Form 80 schedule) rather than annually. YCWA chose the six-year interval since the recent peak BAOT counts on non-holiday weekends in 2011 and 2012 indicate that nearly 20 percent of design capacity or 84 BAOT is available for boating use and doesn't warrant annual data collection. YCWA will conduct the first reservoir boating capacity in the same year and concurrent with the day use facility occupancy observation survey (i.e., in the year indicated as the first FERC Form 80 Recreational Use Report monitoring year scheduled after new license issuance).

The reservoir boating capacity monitoring methods, including indicators, standards and data collection methods are identified in Table 4.2-3.

**Table 4.2-3. Monitoring indicators, standards and data collection methods for New Bullards Bar Reservoir boating capacity.**

<b>Indicator Season</b>		Memorial Day through Labor Day holiday weekends
<b>Indicator</b>		Total BAOT on non-holiday weekends (Saturdays)
<b>PHASE 1 MONITORING</b>		
Data Collection	Method	On-site observations of BAOT, as follows: <ul style="list-style-type: none"> <li>• <b>Boat Trailers</b> <ol style="list-style-type: none"> <li>1. Number of observed boat trailers parked at Cottage Creek and Dark Day boat launch parking areas, including overflow areas</li> <li>2. Number of observed boat trailers parked at Project campgrounds (excluding boat-in campgrounds), including overflow areas</li> </ol> </li> <li>• <b>Houseboats</b> <ol style="list-style-type: none"> <li>3. Number of unoccupied, but rented houseboat moorings</li> <li>4. Number of rental houseboat reservations</li> </ol> </li> <li>• <b>Day Use Boats and Slips</b> <ol style="list-style-type: none"> <li>5. Number of rental day use boat reservations</li> <li>6. Number of unoccupied, but rented boat slips at the marina</li> </ol> </li> <li>• <b>Total BAOT per Day:</b> calculated by summing all six numbers above</li> </ul>
	Frequency	Every 6 <sup>th</sup> year (concurrent with the Form 80 cycle) on each non-holiday Saturday
	Period	Between 1:00 p.m. and 5:00 p.m.
Trigger Threshold		Meets or exceeds the design capacity of 420 BAOT on New Bullards Bar Reservoir
Action if Trigger is Met		Conduct Phase 2 Monitoring (monitoring in the next consecutive year).
Action if Trigger is <u>Not</u> Met		Continue with Phase 1 monitoring every 6 <sup>th</sup> year (concurrent with the Form 80 monitoring year).
<b>PHASE 2 MONITORING</b>		
Data Collection	Method	On-site observations of BAOT (same data collection methods as Phase 1)
	Frequency	<ul style="list-style-type: none"> <li>• Two consecutive years following the Phase 1 monitoring year on each non-holiday Saturday</li> <li>• <b>2<sup>nd</sup> Year Exception:</b> if the trigger is met in the 1<sup>st</sup> of the 2 additional monitoring years, then monitoring is not needed in the 2<sup>nd</sup> year (see <i>Trigger Threshold</i> below)</li> </ul>
	Period	Between 1:00 p.m. and 5:00 p.m.
Trigger Threshold		Meets or exceeds the design capacity of 420 BAOT in at least 1 of 2 years
Actions if Trigger is Met		Move to Required Actions in Section 5.1.2.
Action if Trigger is <u>Not</u> Met		Go back to Phase 1 monitoring every 6 <sup>th</sup> year (concurrent with the Form 80 monitoring year).

### 4.3 Social Monitoring Element

Social indicators and standards measure interaction between recreation users and user acceptability levels with Project recreation facilities and management over the term of the license. These indicators will be measured using a short, focused recreation user survey performed every 12 years throughout the license period (concurrent with alternate Form 80 monitoring years). Social indicators to be monitored include perceived crowding of land and reservoir water surface areas and conflict between user groups.



### 4.3.1 Social Monitoring Indicators and Standards

#### 4.3.1.1 Perceived Crowding

Researchers have developed a relatively simple measure of perceived crowding (Heberlein & Vaske 1977). The question asks people to indicate how crowded the area was at the time of their visit. Responses are given on the scale below:

<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>	<i>6</i>	<i>7</i>	<i>8</i>	<i>9</i>
<i>Not at all</i>		<i>Slightly</i>			<i>Moderately</i>		<i>Extremely</i>	
<i>Crowded</i>		<i>Crowded</i>			<i>Crowded</i>		<i>Crowded</i>	

This measure is simple and easy to apply. Two of the nine scale points on the crowding scale label the situation as uncrowded, while the remaining seven points label it as crowded (to some degree). The scale can be analyzed from various perspectives, but has traditionally been collapsed into two variables (not crowded versus any degree of crowding), which is the method used for this monitoring program. Five distinct categories of crowding have been identified when the scale was collapsed into the two variables (i.e., uncrowded versus crowded) (Shelby et al., 1989).

- Under 35% - No crowding: Relatively unique low-density experiences
- 36 to 50% - Low normal: Unlikely to be a problem
- 51 to 65% - High normal: experiences approaching capacity
- 66 to 80% - Over capacity: management probably needed
- Over 80% - Greatly over capacity: manage for high density or a sacrifice area

Future monitoring will measure weekday and weekend crowding at Project recreation facilities, reservoir shoreline, and reservoir water surface areas. This will provide managers with information as to whether the crowding issue is facility-based (i.e., indicating there may be a need for additional boat launch facilities), is associated with the social capacity of the reservoir’s water surface area (i.e., indicating building additional boat launch facilities would not be advisable), or shoreline (i.e. indicating that, perhaps, providing new shoreline facilities would not be advisable or, perhaps, new facilities should be provided to help spread use out along the usable shoreline area.

#### 4.3.1.2 Conflicts or Problems with Other Recreation Users

Conflicts or problems with other recreation users refer to the proportion of users that report these incidents during their trips on a user survey. Typical survey questions to assess conflict includes:

- Did you or your group experience any problems with other recreation users during your current visit to this facility or area?
- If you had problems, please identify the other group and describe the problem.

## 4.3.2 Social Monitoring Methods

### 4.3.2.1 Detailed Methods

Every 12 years corresponding with the FERC Form 80 monitoring year, YCWA will conduct a recreation user survey at all Project developed recreation facilities and undeveloped recreation sites. YCWA will conduct the first user survey of the new license in the first full year indicated as the scheduled FERC Form 80 Recreational Use Report monitoring year after new license issuance. The detailed methods for the social monitoring, including indicators, standards and data collection methods are identified in Table 4.3-1.

**Table 4.3-1. Social monitoring indicators, standards and data collection methods for Project campgrounds.**

Indicator Season		Memorial Day through Labor Day holiday weekends
Indicators		<ul style="list-style-type: none"> <li>• Perceived crowding</li> <li>• Conflicts between users</li> </ul>
Indicator Conditions		None
Data Collection	Method	User survey visitor responses to crowding and conflict questions (as described in Section 4.3.1)
	Frequency	Every 12 years (concurrent with Form 80 monitoring year) for 9 total survey days as follows: 1. Two non-holiday weekend days per month (June, July and August); <u>AND</u> 2. One weekday per month in June, July and August
	Timing	Between 7:00 a.m. and 7:00 p.m. on a rotating schedule <sup>1</sup>
Trigger Threshold		<ul style="list-style-type: none"> <li>• <b>Perceived crowding:</b> &gt; 51% of land-based visitors or reservoir boaters surveyed reporting crowding of 3 or higher on 9-pt. scale on user surveys over the survey season.</li> <li>• <b>Conflict between Users:</b> &gt; 20% of visitors surveyed reporting a conflict with other users over the survey season</li> </ul>
Actions if Trigger is Met		Move to Required Actions in Section 5.1.3.
Action if Trigger is <b>Not</b> Met		Continue with every 12-year monitoring and data collection

<sup>1</sup> Survey administrators will rotate the times that visit each facility to ensure that visitor responses are varied by time of day.

### 4.3.2.2 User Survey Development and Content

The purpose of the user survey is not only to collect the social indicator information described in Section 4.3.1 above, but also to collect other pertinent recreation visitor information. The other recreation information includes: 1) general baseline recreation visitor information such as group size, vehicle and boat data, primary and overall recreation activity participation, and visitor's primary residence zip code; and 2) angler information such as the quality of the angling experience and species caught to help inform YCWA's New Bullards Bar Reservoir Fish Stocking Plan.

YCWA in collaboration with the Forest Service will develop a short, focused recreation survey instrument that specifically addresses the three elements above. YCWA will provide the Forest Service a draft monitoring survey instrument and methodology for review and comment at least 90 days prior to implementation. The target number of survey interviews for each Project reservoir will be based on relicensing study results, the most recent FERC Form 80 use report, and other relevant, available recreation use information.

## 4.4 Summary of Monitoring Methods by Facility

Table 4.4-1 indicates the type(s) of monitoring that YCWA will conduct at each facility.

**Table 4.4-1. Type of monitoring by Project reservoir and site<sup>1</sup> including the existing maximum site capacities (where applicable).**

Type of Facility	Recreation Facility or Site	Monitoring Method			
		Campground Occupancy (Annual)	Day Use Facility Occupancy Observation Survey (Every 6 years)	Reservoir Boating Capacity Observation Survey (Every 6 years)	Recreation User Survey (Every 12 years)
<b>NEW BULLARDS BAR RESERVOIR</b>					
Campgrounds	Schoolhouse Campground	X		X	X
	Dark Day Campground	X		X	X
	Hornswoggle Group Campground	X		X	X
	Cottage Creek Group Campground	X		X	X
	Garden Point Boat-in Campground	X			X
	Madrone Cove Boat-in Campground	X			X
Day Use Areas	Dark Day Picnic Area		X		X
	Sunset Vista Point		X		X
	Dam Overlook		X		X
	Moran Road Day Use Area		X		X
Boat Launches	Cottage Creek Boat Launch		X	X	X
	Dark Day Boat Launch	Main		X	X
		Overflow		X	X
Recreational Trails	Bullards Bar Trail		Not applicable <sup>2</sup>		X <sup>3</sup>
	Schoolhouse Trail		X <sup>4</sup>		X <sup>3</sup>
<b>DIVERSION DAMS</b>					
Undeveloped Recreation Sites	Our House Diversion Dam		X		X
	Log Cabin Diversion Dam		X <sup>5</sup>		X <sup>5</sup>

<sup>1</sup> The observation survey at Schoolhouse Campground will be conducted only at the overflow parking area.  
<sup>2</sup> Bullards Bar Trail does not have any exclusive trailhead parking areas. Rather, parking for trail users is co-located at day use and boat launch facilities, which will be addressed via observation and user surveys at the co-located facilities, including Sunset Vista Point, Dark Day Picnic Area and Dark Day Boat Launch.  
<sup>3</sup> Trail users will not be surveyed directly, but rather through surveys administered at the facilities co-located at or near the trails.  
<sup>4</sup> Schoolhouse Trail has one exclusive trailhead parking area (proposed new per this Plan) located at Schoolhouse Campground.  
<sup>5</sup> At Log Cabin Diversion Dam, YCWA will administer the observation survey and user survey at/near the locked gate at the top of the access road and junction with Highway 49. YCWA will not travel to the diversion dam.

## 4.5 Monitoring Reporting

YCWA will prepare recreation monitoring report every 6 years, to coincide with the year that FERC Form 80 monitoring reports are due to the FERC. The recreation-monitoring report described in the Recreation Facilities Plan will be in addition to the FERC-required Form 80 reports. The recreation monitoring report will summarize the data for the current monitoring period and, if appropriate, make management recommendations if monitoring indicators exceed established standards. Facility occupancy information will be presented on a monthly basis showing weekend occupancies and, when available, weekday occupancies. In addition, for

trigger (standard) monitoring purposes, non-holiday weekend occupancy during the peak recreation season (Memorial Day to Labor Day holiday weekends) and resource impact information will be presented.

For Project recreation facilities located on NFS lands, YCWA will provide this information electronically to the Forest Service in spreadsheet format. Every 12 years the monitoring report will also contain results from the Recreation User Survey. Monitoring reports may include suggested enhancements, as appropriate, based on the monitoring results. YCWA will provide the 6 and 12-year monitoring reports to the Forest Service for review and comment; and, for NFS lands, gain concurrence for any proposed changes to the Project facilities that are proposed based on monitoring results.

In addition to the comprehensive 6- and 12-year monitoring reports, YCWA will also compile a basic campground occupancy summary report and provide it to the Forest Service a minimum of 30 days prior to the Annual Recreation Coordination Meeting (refer to Section 6). The summary report will provide the campground occupancy information on a monthly basis by day type, and include the raw occupancy data from the concessionaire.

For facilities on NFS land, YCWA shall provide a draft of the following final reports (Table 4.5-1) to the Forest Service and other applicable agencies, as appropriate, and request a response on the draft report within 30 days. In addition, YCWA will meet with the Forest Service and any other applicable land management agencies during the review period to discuss potential reasonable resource management measures on the respective land management agency's lands based on the report results. YCWA shall file the following reports, including evidence of consultation, with FERC concurrent with the next Form 80 Report filing (the Recreation Resources Report in compliance with the regulations at 18 Code of Federal Regulations section 8.11, or as amended). YCWA shall implement those measures approved by FERC.

**Table 4.5-1. Summary of monitoring reporting frequency and information.**

Reporting Frequency	Summary of Information to be Contained in Monitoring Reports
Annually	<ul style="list-style-type: none"> <li>• Summary of previous year's campground occupancy indicator information. The data will be summarized by month and day type.</li> <li>• Raw data from the concessionaire's occupancy/reservation records.</li> </ul>
Every 6 Years (concurrent with Form 80 reporting)	<ul style="list-style-type: none"> <li>• Summary of previous six years of Project recreation occupancy indicator information. The data will be summarized by month and day type and include the associated occupancy rates at each facility.</li> <li>• Identification of existing Project facilities and the capacity of these facilities.</li> <li>• Summary of previous six years of reservoir boating capacity data.</li> <li>• Summary of recreation observation survey indicators and other data collected during the previous year, including VAOT and PAOT information.</li> <li>• Summarize monitoring results in relation to established triggers and address any changes in trends (including changes in peak season) since previous reports, including initial relicensing studies.</li> <li>• User and resource conflicts.</li> <li>• Outstanding health and safety issues.</li> <li>• Summary of law enforcement input and incidents, emergency services (including fire) input and incidents, and readily available accident information.</li> <li>• New or modified management actions (increased patrols, additional sanitation facilities, closure orders, etc.) proposed to address concerns identified in report.</li> <li>• Six-year schedule for heavy maintenance, rehabilitation, reconstruction, new construction and proposed facility changes based on any mandated updated guidelines.</li> </ul>

**Table 4.5-1. (continued)**

Reporting Frequency	Summary of Information to be Contained in Monitoring Reports
<p><b>Every 12 Years</b>  (concurrent with Form 80 reporting)</p>	<ul style="list-style-type: none"> <li>• All the items in the 6-Year Recreation Survey and Monitoring Report (see above).</li> <li>• Results of visitor surveys.</li> <li>• Changes in use type, volume, group size, duration of stay, other use pattern and trends.</li> <li>• Kinds and sizes of recreational vehicles (i.e., trailer, RV).</li> <li>• User perceptions of crowding both at facilities and along shoreline and water surface.</li> <li>• Kinds, quality, quantity, and range of recreational opportunities visitors are engaging in.</li> <li>• Preferences in recreation activities and amenities.</li> <li>• Summarize the most current regional and statewide trends in recreation based on publicly available surveys and reports.</li> </ul>

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## SECTION 5.0

# FUTURE FACILITY DEVELOPMENT AND MANAGEMENT ACTION

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## 5.1 Required Actions When Triggers Are Met

### 5.1.1 Facility Occupancy

When a facility occupancy trigger is met in Section 4.1.1 (Table 4.1-1), the following actions will be undertaken by YCWA.

- **Required Action 1:** YCWA will complete a Suitability-Feasibility Analysis (Section 5.1.1.1) in the calendar year after the year the trigger is met.
- **Required Action 2:** Depending on the results of the Suitability-Feasibility Analysis (Section 5.1.1.1), YCWA will either:
  - Start the planning process for a new or expanded facility (see Section 3.2.2 of the Plan) immediately after the Suitability-Feasibility Analysis is completed, if site development is determined to be suitable and feasible
  - Or,
  - Develop a strategy (in partnership with the Forest Service on NFS land) to manage recreation use, if site development is determined to be unsuitable and/or infeasible

#### 5.1.1.1 Suitability-Feasibility Analysis

The purpose of the suitability-feasibility analysis is to determine if site development is suitable and feasible at New Bullards Bar Reservoir or the Project diversion impoundments once an occupancy trigger has been met. A proposed development will be considered suitable and feasible, if the development:

- 1) Is practical and reasonable based on the site conditions;
- 2) Is appropriate for the ROS Class, regulations, standards and policy;
- 3) Is appropriate for the level of use desired based on direction by applicable land and resource management plans, including revisions or amendments to land management plans; and
- 4) Does not have the potential to cause the reservoir boating capacity (420 BAOT) on New Bullards Bar Reservoir to be exceeded on a regular basis<sup>25</sup>

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<sup>25</sup> The two most likely new or expanded facilities that would directly contribute to additional boats on the reservoir are additional boat launch parking spaces, campground facilities (especially boat-in campgrounds) and permitted houseboats since boating is a primary activity for many overnight visitors to the Project.

YCWA on YCWA land, and the Forest Service on NFS land, will make the final determination as to whether a proposed development is considered suitable and feasible. Once a new or expanded development is deemed suitable and feasible, the recreation enhancement planning process (as guided by Section 3.2 of the Plan) will begin.

If site development is not suitable or feasible, agreed upon actions and policies to manage recreation use levels at the reservoirs will be implemented. Examples of actions and policies to manage recreation use levels, that will be implemented when development is not suitable or feasible, include:

- Educating visitors about other regional day-use areas and campgrounds.
- Implementing more on-site management.

Implementation of these management actions or policies could also be used to alleviate management issues that often arise as occupancy levels near full capacity.

### **5.1.2 Reservoir Boating Capacity**

YCWA will utilize the following threshold framework to trigger management action to reduce the number of BAOT on New Bullards Bar Reservoir.

- **Required Action:** If the design boating capacity is exceeded in consecutive monitoring years (as defined in Section 4.1.2.2), then YCWA and the Forest Service will meet to discuss strategies for reducing the number of boats on New Bullards Bar Reservoir. This meeting will occur no later than April of the year after the second consecutive exceedance year.

The rationale for this monitoring threshold is three-fold. First, the reservoir boating capacity was developed by YCWA and the Forest Service to limit the potential for conflict and crowding on the reservoir and also provide a range of reservoir boating opportunities. It is important to monitor this use in order to minimize the potential for reservoir boating conflict and crowding, but also to understand the trends in the types of boats on the reservoir (i.e., houseboats versus other boats).

Second, there is a link between size of land-based facility development and reservoir boating use. Specifically, new or expanded boat trailer parking areas potentially have a direct link to increases in the number of boats on the reservoir (potentially as high as the same number of additional spaces provided). Further, expanded boat-in campground facilities would increase the number of boats on the reservoir potentially by at least the same number of boats as additional campsites (which assumes 1 boat is used per campsite as indicated by the relicensing study results). At vehicle-accessed campgrounds, this positive relationship is much the same. The relicensing study survey results at New Bullards Bar Reservoir indicated that 66 percent of campground visitors brought at least one boat with them; and the average number of boats per group was 1.55 boats. So, at a minimum, any increase in campsites would likely result in a corresponding



increase in boats on the reservoir, which equates to 1.0 additional boats for every 1 campsite added.<sup>26</sup>

Third, as with expansion of the boat trailer parking and boat-in camping facilities, increasing the number of permitted houseboats (owned or rented) on the reservoir would increase the number of boats on the reservoir potentially by the same number of additional houseboats if used all at the same time.

Therefore, any future land-based facility development that may arise as part of this monitoring program needs to: 1) evaluate the latest trends in the reservoir capacity monitoring element; and 2) evaluate if such development may likely lead to exceeding the reservoir boating capacity of 420 BAOT on New Bullards Bar Reservoir.

### **5.1.3 Social Monitoring**

If social monitoring triggers are met, then YCWA will meet with the Forest Service prior to the next calendar year open season (typically opens April 15) to discuss what, if any, potential management actions are necessary to maintain a quality visitor experience and alleviate either crowding or conflict at certain facilities or areas. Examples of land-based management actions that may be considered include:

- Providing additional visitor management and/or enforcement
- Providing adequate buffers between uses
- Expanding and/or developing new facilities/use areas
- Providing increased visitor education

Examples of reservoir-based management actions that may be considered include:

- Providing additional visitor management and/or enforcement to help ensure that uses do not exceed acceptable capacity standards
- Establishing boat speed limits
- Providing specific water surface zones
- Establishing specific (i.e., circular) travel patterns for boats
- Increasing boat ramp efficiency by adding ramp lanes, courtesy docks, parking spaces, staffing, etc.
- Providing increased boater education

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<sup>26</sup> This number is arrived at using the following formula: [1 new campsite] X [66% of visitors bring a boat] X [1.55 boats/campsite] = 1 x 0.66 x 1.55 = 1.0 boats/new campsite.

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## SECTION 6.0

# ANNUAL RECREATION COORDINATION MEETING

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Each year during the term of the license, YCWA will arrange to meet with interested agencies (Forest Service at a minimum) for an Annual Recreation Coordination Meeting to discuss issues regarding Project recreation facilities, use and management, public safety, and recreation related resource protection. YCWA and the agencies will mutually agree to the date of the meeting, but in general, the meeting will be held within the first 90 days of each calendar year. YCWA will provide an agenda and a proposed meeting date to the interested agencies in advance. In addition, for Project recreation facilities located on NFS lands, YCWA will also exchange with the Forest Service a draft annual recreation operation and maintenance plan prior to the meeting.

The following, at a minimum, will be discussed at the Annual Recreation Coordination Meeting:

- Need for additional garbage collection and/or other trash management actions based on the results of observations, visitor surveys, evidence of wildlife habituation and the status of garbage and litter left on site by users.
- Need for toilet facilities where dispersed camping is occurring will be discussed at least every 6 years (following submittal of the Project's monitoring report), and more frequently if warranted.
- Other O&M issues identified by the Forest Service or YCWA.
- Schedule and invite the Forest Service to the recreation resource impact field evaluations and facility condition assessment to be conducted on NFS lands.
- Report on relevant monitoring results, such as if monitoring triggers are being met from the previous year(s).
- Significant issues raised by the public.
- Recreation use data that is available from YCWA or the Forest Service, which includes summary data, at a minimum; and upon request, raw data in an electronic spreadsheet or database format.
- YCWA will provide Forest Service a copy of all documentation associated with FERC inspections of Project recreation facilities and use on NFS lands, including follow-up action taken by the YCWA.
- Status of recreation projects from the previous year, including ongoing planning efforts, rehabilitation of existing recreation facilities, the establishment of new recreation facilities, and any other recreation measures or programs that were implemented.
- List and review the existing recreation facilities scheduled for reconstruction as well as any new facilities proposed for construction and other measures to be implemented as part of this Plan, including:
  - Logistical and coordination planning.

- Implementation schedule, including potential adjustments
- Coordination needs.
- Permitting requirements.
- Key resources that will need to be protected from potential impacts associated with the implementation of the scheduled recreation projects.

YCWA and the agencies will identify any coordination needed with other activities and projects being implemented in the area. Permitting requirements, additional required environmental documentation and key resources that will need to be protected from potential impacts associated with the implementation of the scheduled recreation projects will be addressed. The Forest Service must approve any revisions to the Project's Recreation Facilities Plan schedule when NFS land is involved, and the revised schedule will be submitted to FERC. Within 60 days following the meeting, YCWA will file with FERC evidence of the meeting, which will summarize comments made by the agencies, and Plan revisions or other agreements that were reached by YCWA and the agencies. The Annual Recreation Coordination Meeting is a minimum requirement and it is anticipated that additional meetings may occur throughout each year as needed to implement the Plan.

## SECTION 7.0

# PLAN REVISION

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YCWA and the Forest Service will meet to discuss the need to update the Plan if significant changes in recreation use or resources occur. A need may arise from recreation monitoring results, from day-to-day O&M of the Project, or, from other unanticipated events that may arise during the license period. Examples of events that may trigger a need to update the plan include:

- Revisions and updates to Forest Service or other applicable management plans.
- Substantial changes (greater than 25 percent change) in Project recreation use on or affecting NFS land, as revealed by the project monitoring.
- Changes in road maintenance standards or similar physical factors affecting the use of the recreation facilities within the Project area.
- Reaching occupancy (or other) triggers where new, but previously unanticipated, facilities may be required.
- Catastrophic natural events, such as major forest fires or natural disasters, and significant effects of social disorder.
- New federal or state policies, regulations, and laws (including Wilderness designation of land within or near the Project) that significantly affect recreation resources in the Project area.
- Acquisition by Forest Service of non-Licensee private land around project lakes which would allow for enhancements where there is a demand, but suitable land was previously unavailable for construction of such enhancements.
- Documented substantial changes in demographic use patterns (e.g., increases in size or amount of RV use, changes in types of boats using the lake, lack of use or burdensome maintenance needs at a particular location), visitor needs, recreation preferences, types or patterns of use, season of use changes (such as school schedule changes) or other social factors affecting recreation facilities within the Project area.

Any updates to the Plan would be prepared in consultation with the Forest Service and other agencies, as appropriate. The Forest Service and other agencies will be provided sufficient time to comment and make recommendations before YCWA files the updated Plan with FERC for approval. Updates to the Plan concerning facilities that are on NFS lands will be approved by the Forest Service prior to filing with FERC. YCWA will include documentation of consultation when it files the updated Plan with FERC. If YCWA does not adopt a particular agency recommendation, the filing of the updated Plan will include the reasons for not doing so.

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## SECTION 8.0

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# **Recreation Facilities Plan**

## **Attachment A**

### **Operating Plan for the New Bullards Bar Reservoir Recreation Facilities on NFS Land**

#### **Yuba River Development Project FERC Project No. 2246**

Draft - December 2013

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None.

## **1.0            Background**

The Yuba County Water Agency (YCWA) is the existing owner and operator of the Yuba River Development Project (Project), and holds the existing license from the Federal Energy Regulatory Commission (FERC) for the Project (FERC Project No. 2246). The FERC license for the Project was effective on May 1, 1963 for a term ending April 30, 2016.

The Project includes recreation facilities and improvements under FERC’s jurisdiction at New Bullards Bar Reservoir, which is referred to as the New Bullards Bar Reservoir Recreation Area. The Project recreation facilities on National Forest System (NFS) land include 12 facilities, as follows:

- 1) Hornswoggle Group Campground
- 2) Schoolhouse Campground
- 3) Dark Day Campground
- 4) Cottage Creek Group Campground
- 5) Garden Point Boat-in Campground
- 6) Madrone Cove Boat-in Campground
- 7) Sunset Vista Point
- 8) Moran Road Day Use Area
- 9) Dark Day Picnic Area
- 10) Dark Day Boat Launch
- 11) Schoolhouse Trail
- 12) Bullards Bar Trail

These recreation facilities are referred to as the “Facilities” in this document.

All of the Facilities are within the FERC Project Boundary. All of the Facilities are located on National Forest System (NFS) land administered by the U.S. Department of Agriculture, Forest Service, (Forest Service) as part of the Tahoe and/or Plumas National Forest. All of the facilities were constructed by YCWA, except for the Dark Day Boat Launch Overflow Parking Area, which was constructed by the Forest Service. All of the facilities are currently operated and maintained by YCWA through concessionaires.

This Operating Plan for the New Bullards Bar Reservoir Recreation Area Facilities is provided by YCWA to assure the efficient and satisfactory operation of the Facilities on NFS land.

The Plan is divided into four sections: 1) management; 2) operation; 3) maintenance; and 4) other programs.

**In the event that a discrepancy occurs between the terms and conditions contained in this plan and the FERC Project license, the license terms and conditions shall prevail.**

## **2.0 Term**

Unless otherwise agreed to by the Parties in writing, this Plan shall become effective one month after the effective date of the new Project license issued by FERC (to provide a transition period), and remain in effect as long as YCWA is the FERC license holder for the Project, or until the new license expires, whichever occurs first.

## **3.0 Management of the Facilities**

YCWA shall be responsible for management of the Facilities. YCWA may manage the Facilities using its own staff or may retain a concessionaire, which shall be contracted directly to YCWA and shall report directly to YCWA. Regardless of whether YCWA manages the Facilities with its own staff or a concessionaire, YCWA shall be wholly responsible for management of the Facilities.

YCWA shall report any observed problems outside of the New Bullards Bar Reservoir Recreation Area to the Forest Service. YCWA shall attempt to gain user compliance with all normal recreation regulations within the Facilities. However, YCWA and the Forest Service recognize that YCWA does not have citation authority.

The Forest Service shall be responsible for management and enforcement of all areas outside the recreation Facilities areas on NFS land, and for enforcement of Forest Service regulations within the Facilities.

### **3.1 Liaison Officers**

Unless otherwise delegated, all formal contact between YCWA and the Forest Service, with respect to the Plan, shall be between YCWA's Primary Contact (or YCWA's Alternate Contact if YCWA's Primary Contact is unavailable) and the Forest Service's Primary Contact (or the Forest Service's Alternate Contact if the Forest Service's Primary Contact is unavailable). YCWA's primary and alternate contacts for this Plan shall be (Table 3.1-1):

**Table 3.1-1. Primary and alternate contacts for YCWA and the Forest Service.**

YCWA Contacts		Forest Service Contacts	
Primary	Alternate	Primary	Alternate
<i>To be developed</i>	<i>To be developed</i>	<i>To be developed</i>	<i>To be developed</i>

YCWA and the Forest Service each agree to promptly notify the other if the designated primary or alternate contacts change.

### **3.2 Local Staff**

YCWA shall designate Local Staff to manage the Facilities; these Local Staff may be YCWA employees or contract employees. During normal hours of operation of the Facilities, Local Staff shall wear apparel acceptable to the Parties and that identify them as YCWA’s staff.

YCWA shall comply with all State of California labor laws. In connection with this work, YCWA shall not discriminate against any employees.

### **3.3 Contacts**

Whenever significant problems such as significant acts of vandalism, significant natural events that result in damage (i.e., flood, fire, and law enforcement concerns) arise during the Facilities’ operating season; YCWA shall contact the Forest Service representatives.

## **4.0 Operation of the Facilities**

### **4.1 Fees**

#### **4.1.1 User Fees**

Concessionaire shall be responsible for collecting and handling all Facilities user fees, and for compliance with the fee schedule within this Plan.

Commencing in 2016, subject to issuance of the new FERC license, fees for single campsites, double campsites, triple campsites, group campsites and boat-in campsites will be set at amounts that are commensurate with fees charged at similar facilities in the Tahoe and Plumas national forests. YCWA also plans to charge a fee for use of the developed boat launches. However, YCWA may decide to charge a fee to meet YCWA’s capital improvement and maintenance costs, as provided in the Federal Power Act (Table 4.1-2) (18 C.F.R. § 2.7).<sup>1</sup>

**Table 4.1-2. Recreation User Fee Schedule.**

Type of Use	User Fee
<b>FAMILY CAMPING</b>	
Single family site	\$25
Double family site	\$50
Triple family site	\$75
Each additional vehicle (over 2 per single site; 4 per double site; and 6 per triple site)	\$6

<sup>1</sup> “The Commission will not object to YCWA and operators of recreational facilities within the boundaries of the project charging reasonable fees to users of such facilities in order to help defray the cost of constructing, operating, and maintaining such facilities.” (18 C.F.R. § 2.7)

**Table 4.1-2. (continued)**

Type of Use	User Fee
<b>GROUP CAMPING</b>	
25-person site	\$75
50-person site	\$125
Each additional vehicle (over 5 vehicles at 25-person site and over 10 vehicles at 50-person site)	\$6
<b>BOAT-IN CAMPING</b>	
Single site	\$25
Double site	\$50
Shoreline camping permit	\$20
<b>SHORELINE CAMPING</b>	
Shoreline camping permit	\$20
Each additional person over 6 up to 9 people (10 or more people requires a second permit)	\$6
Portable chemical toilet rental	\$5
<b>OTHER CAMPING FEES</b>	
Reservation fee	\$8
<b>DAY USE FACILITIES</b>	
Boat launching – day use fee	\$5
Dark Day Picnic Area – day use fee	\$5

#### 4.1.1.1 Golden Age and Golden Access Passport Discounts

Golden Age and Golden Access passport holders, or holders of other forms of national annual pass, designed to replace these two passes shall be given a 50 percent discount.

Camping, parking, and boat launching shall be restricted to designated-use sites within the recreation facilities.

#### 4.1.2 Capital Improvement Fees

Capital improvement (CI) fees are built into each campground reservation fee. The CI fee is for replacing outdated and deteriorating recreation facilities or amenities. The CI fee will be set aside specifically for this use. CI fees are: \$6/single site; \$12/double site; \$18/triple site; \$20/25-person group site; and \$30/50-person group site.

#### 4.1.3 Other Fees

Concessionaire may sell firewood from the Campground Host Campsite for a fee approved by YCWA prior to sale. Said wood shall be purchased, cut and split by the Concessionaire from private sources, or as a result of hazard tree removal, unless otherwise agreed to by the Forest Service.

Concessionaire may also, as a public service, sell Forest Service maps at the same price at which the Forest Service offers these maps at its Yuba River Ranger District office. YCWA may also sell maps of the Facilities and general area at a price reflecting its cost to produce and distribute. Examples of such maps include detailed campground layout maps, maps of the recreation facilities, including trails and trailheads or special interest features.



No other services, products, etc. shall be sold on-site or off-site by either YCWA or the Forest Service in conjunction with the Facilities without prior approval from both YCWA and the Forest Service.

## **4.2 Reservations and Camping Permits**

### **4.2.1 Reservation Staff**

During the peak season (Memorial Day to Labor Day holiday weekends), YCWA will have qualified personnel available to make camping reservations, sell camping permits, and provide information with regards to camping from 8:00 a.m. to 5:00 p.m., at a minimum, each day; and from 5:00 p.m. until 9:00 p.m. on Fridays and the day before a holiday, excluding Sunday evening.

### **4.2.2 General Reservation Guidelines**

General reservation guidelines are as follows:

- All campground facilities must go through the reservation system, including shoreline camping permits.
- Advanced reservation permits may be sold beginning January 1 each year.
- No more than 2 sites may be reserved by any one group, except with written approval by YCWA.
- There is a one-time reservation fee (per the User Fee Schedule above).

### **4.2.3 Shoreline Camping Permit Guidelines**

Shoreline camping permits have the following reservation guidelines:

- Shoreline permits will be issued on a per boat basis with a limit of six people per boat.
- An additional fee will be charged per person over six and up to nine people (per the User Fee Schedule above).
- Boats with 10 or more people will be required to get a second shoreline camping permit.
- Concessionaire will ensure that each boat party has the required portable chemical toilet for shoreline camping and will be required to initial the permit certifying the number of people and the presence of a chemical toilet.
- Survey stakes with bright colored paper stapled to the stake will be issued with each shoreline permit with instructions on where to drive the stakes in the ground by their site and attach the permit with the string for compliance visibility during boat patrols.

### 4.3 Length of Stay

A 14-consecutive day stay limit at all the campsites shall be enforced by YCWA. Use is limited to existing designated units. Occupancy of family campground units shall be limited to six persons, or immediate family, and a maximum of two vehicles per unit. Occupancy of double-unit campsites shall be 12 persons and a maximum of four vehicles.

### 4.4 Operating Season

The Facilities shall remain open with all services provided by YCWA or Concessionaire according to the following schedules by type of facility.

**Table 4.4-1. Operating season for each type of facility.**

Type of Facility	Operating Season		Conditions
	Open	Close	
All Campgrounds	April 15	October 15	Once outside the peak season (Memorial Day to Labor Day), partial closures of the camping facilities may occur due to reduced use.
Shoreline Camping	When reservoir elevation drops to 1,941 ft <sup>1</sup>	October 15	Season may be altered per fire conditions or other safety reasons.
Developed Boat Ramps	January 1	December 31	As conditions permit. If ramps are out of the water, ramp may be closed or remain open but with appropriate warning signs.
Day Use Areas	January 1	December 31	Some facilities may be closed during winter months due to very low use (e.g., close restrooms, trash facilities, water, etc.)
Recreational Trails	January 1	December 31	Whole or sections of trail may need to be closed temporarily due to weather or other site conditions.

<sup>1</sup> When the reservoir water surface elevation is 15 ft below the normal maximum water surface elevation of 1,956 ft.

Outside of the operating season, all necessary closing and opening preparations, and any additional maintenance and repairs that were not possible during the operating season, shall be performed by YCWA and/or the Concessionaire. When facilities are closed, Concessionaire shall post information in a conspicuous location to advise the public that the Facilities are closed. Major rehabilitation/reconstruction of facilities or unforeseen damage to facilities may require YCWA to close facilities until construction or repairs are complete and the facility is in safe working order.

### 4.5 Specific Facility Operations

#### 4.5.1 Shoreline Camping Sanitation

Concessionaire will have available portable chemical toilets for rental by shoreline camping permittees who do not have boat sanitation facilities. Concessionaire will ensure that boat access shoreline campers initial the toilet requirement on the permit. YCWA will not issue the permit without the permittees initials.

#### **4.5.2 Boat Launch Parking Supervision**

Concessionaire will provide personnel at Dark Day and Cottage Creek boat ramp parking areas on Fridays, Saturdays, Sundays and holidays to assist visitors in parking and to provide information on opportunities, rules and regulations.

#### **4.6 Overflow Camping**

Overflow camping is not permitted at New Bullards Bar Reservoir. Camping is limited to the capacities at the developed campgrounds and allotted shoreline camping permits.

#### **4.7 Other Structures**

YCWA and the Forest Service shall not build, construct, or maintain any structure not specifically included in the list of equipment covered under the new FERC license unless approved by YCWA and the Forest Service.

YCWA and/or the Concessionaire may use all NFS roads to operate the Facilities and shall permit Forest Service use of all roads in the Facilities. Should YCWA's and/or the Concessionaire's operation result in any undue wear or damage to NFS roads, YCWA shall be responsible for the reasonable cost to repair the road. Should wear or damage be caused by a Forest Service approved timber removal operation, the Forest Service shall be responsible for the cost of any necessary repairs.

### **5.0 Routine Maintenance of the Facilities**

For the purposes of the plan, routine maintenance is considered short-term maintenance activities and defined as repair, prevention, and cyclic maintenance, as compared to long-term maintenance (replacement and rehabilitation of facilities). For this Plan's purposes, routine maintenance is discussed below by "short-term" and "annual" maintenance. Note that long-term maintenance or major rehabilitation is addressed in YCWA's Proposed Condition RR1 (Recreation Facilities Plan) in Section 3.2.

All routine maintenance of the Facilities shall be performed by the Concessionaire and at the expense of YCWA.

#### **5.1 Utilities**

Maintenance of all utilities (e.g. water, septic system, garbage removal and propane) is the responsibility and at the expense of YCWA.

## **5.2 Cleaning**

Standards for cleaning recreation facilities located on NFS land will be consistent with current Forest Service national and Forest-specific standards and policies, which may change overtime. Currently, National Forest Service standards and policies for cleaning recreation sites are addressed in the Forest Service's *Cleaning Recreation Sites* (USDA Forest Service, 1995) and the *Recreation Sites National Quality Standards* (USDA Forest Service, 2002).

Concessionaire shall furnish all supplies, tools, and materials necessary to clean, operate, and routinely maintain the Facilities. Prior to opening day each year, the Parties shall jointly inspect the Facilities to verify the condition of the Facilities.

Routine maintenance includes those activities that are expected to occur on an annual or semi-annual schedule, and are the responsibility of the Concessionaire.

## **5.3 Equipment**

YCWA will supply all facilities (e.g., civil facilities including picnic tables, fire rings, grills and signs) and will replace these facilities if irreparably damaged. YCWA and the Forest Service shall inspect the conditions of all facilities prior to opening day each year. The facilities included in this provision are:

- Picnic tables
- Cooking grills
- Fire rings
- Water hydrants
- Drinking fountains
- Trash receptacles
- Boat docks
- Benches
- Fee collection stations
- Signs (entrance, directional, and informational)
- Restroom/comfort stations

## **5.4 Specific Maintenance Tasks, Schedule and Standards**

Beginning at License issuance, the concessionaire shall adhere to the schedule of annual maintenance provided below (Table 5.4-1).

**Table 5.4-1. Schedule of annual maintenance.**

Maintenance Task	Frequency	Remarks
Lowering boat launch docks as the season progresses and removal of the docks when the ramps are no longer in the water	<ul style="list-style-type: none"> <li>▪ As needed, lower when water recedes</li> <li>▪ End of season (remove)</li> </ul>	<ul style="list-style-type: none"> <li>▪ May need to remove the dock if site conditions make the ramp unusable.</li> </ul>
Litter and trash collection within site boundaries	<ul style="list-style-type: none"> <li>▪ Daily at hosted site</li> <li>▪ 2 times/ week at non-hosted sites.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Remove all litter observed on the grounds.</li> <li>▪ Particular attention shall be given to the removal of all observed glass, bottles, cans and similar objects that might cause injury to site visitors.</li> <li>▪ Do not perform litter removal in an occupied campsite.</li> <li>▪ Trash collection shall be collected at a frequency that does not encourage animal encroachment, overflowing, or omitting offensive odors.</li> <li>▪ Receptacles shall be animal resistant.</li> <li>▪ Two to four yard dumpsters need to be dumped at least once a week.</li> </ul>
Paint entrance signs, shields and frames	<ul style="list-style-type: none"> <li>▪ Annually, prior to July 1st</li> </ul>	<ul style="list-style-type: none"> <li>▪ Use Forest Service approved materials</li> <li>▪ Frames may have to be water sealed instead of painted</li> </ul>
Remove graffiti	<ul style="list-style-type: none"> <li>▪ As needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ Remove graffiti within 48 hours of discovery or notification</li> </ul>
All ground steel/concrete fire pits will be maintained	<ul style="list-style-type: none"> <li>▪ Prior to opening</li> <li>▪ As needed during the operating season</li> </ul>	<ul style="list-style-type: none"> <li>▪ Concrete fire pits will have smooth finish with minor surface exfoliation or cracking evident.</li> <li>▪ Internal grill will be securely fastened</li> </ul>
Patch rodent and bird holes in wood restrooms, repair/replace screens	<ul style="list-style-type: none"> <li>▪ As needed, prior to opening each year</li> </ul>	<ul style="list-style-type: none"> <li>▪ Forest Service approved materials and standards</li> </ul>
Maintain all posters in like-new condition on bulletin boards	<ul style="list-style-type: none"> <li>▪ Prior to opening</li> <li>▪ As needed during operating season</li> </ul>	<ul style="list-style-type: none"> <li>▪ Posters will not be curled, 'dog-eared', rippled or faded; temporary or press-on signs will be in good condition and professional in appearance; YCWA will be responsible for providing posters.</li> <li>▪ Forest Service will provide source; posters will be uniformly spaced on the bulletin boards, not grouped in one corner.</li> </ul>
Return all displaced picnic tables to appropriate locations at all locations, anchor if necessary	<ul style="list-style-type: none"> <li>▪ Prior to July 1</li> <li>▪ Within 1 week of observance</li> </ul>	<ul style="list-style-type: none"> <li>▪ After securing approval by authorized FS personnel, picnic tables will be cabled or chained in place by the leg or brace.</li> <li>▪ Cables or chains will be of sufficient size to require a bolt cutter or similar tool for cutting.</li> <li>▪ The cable or chain will be connected to a buried anchor that may be concrete, block or steel post or like material.</li> <li>▪ No wood anchors shall be used.</li> <li>▪ Anchors will be placed so they are not a tripping hazard or otherwise cause injury; tables will have all 4 legs in contact with the ground; no legs will be propped up with rocks or other objects</li> </ul>
Raise picnic tables that have sunken into ground due to snow load	<ul style="list-style-type: none"> <li>▪ Prior to opening, annually</li> </ul>	<ul style="list-style-type: none"> <li>▪ All tables seating should be at appropriate height</li> </ul>
All campsite markers will be straight with numbers clearly visible from roadway	<ul style="list-style-type: none"> <li>▪ Prior to July 1, annually</li> <li>▪ Within 1 week of observance</li> </ul>	<ul style="list-style-type: none"> <li>▪ Forest Service standards; Carsonite posts with reflectorized letters or numbers, or equivalent; posts and lettering will be in good physical condition</li> </ul>
Remove trash from road and non-road accessed primitive sites	<ul style="list-style-type: none"> <li>▪ Weekly, between Memorial Day and Labor Day</li> <li>▪ Twice monthly after Labor Day until facilities are closed for the season</li> </ul>	<ul style="list-style-type: none"> <li>▪ Remove and dispose of trash off site</li> </ul>
Replace all metal signs (particularly, 'No Parking') when they fade	<ul style="list-style-type: none"> <li>▪ Prior to opening, annually</li> <li>▪ Within 1 week of observance</li> </ul>	<ul style="list-style-type: none"> <li>▪ All metal signs shall be legible and clearly visible at all times.</li> <li>▪ The signs will be replaced when sunlight or other environmental factors has caused the numbers or letterings to appear weathered, discolored or bleached.</li> </ul>
Straighten, replace, reset, improve, and reinstall barriers.	<ul style="list-style-type: none"> <li>▪ By opening date</li> <li>▪ As needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ Straighten, replace, reset, and reinstall barriers within and adjacent to all project recreation sites: along the toads surrounding the reservoir, and along Project roads and trails where there is uncontrolled vehicle use.</li> </ul>

**Table 5.4-1. (continued)**

<b>Maintenance Task</b>	<b>Frequency</b>	<b>Remarks</b>
Remove human and pet waste	<ul style="list-style-type: none"> <li>▪ Regular basis</li> <li>▪ As needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ Waste will be removed on a regular basis to maintain acceptable site conditions.</li> <li>▪ Excess waste will be documented noting what sites this is occurring.</li> </ul>
Remove hazard trees	<ul style="list-style-type: none"> <li>▪ Prior to opening</li> <li>▪ As needed, during operating season</li> </ul>	<ul style="list-style-type: none"> <li>▪ Forest Service standards and in compliance with Integrated Vegetation Management Plan.</li> </ul>
Rake around fireplaces and pedestal barbecues	<ul style="list-style-type: none"> <li>▪ Prior to opening</li> </ul>	<ul style="list-style-type: none"> <li>▪ Rake needles away from all fire units for 5 feet in all directions</li> </ul>
Clean out inlets, outlets and inside of culvert pipes	<ul style="list-style-type: none"> <li>▪ At end of season</li> <li>▪ Prior to opening, as needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ Forest Service standards; material removed will be placed in an area outside the stream environment zone.</li> </ul>
Sweep all areas of roads, parking lots and paved camp spurs	<ul style="list-style-type: none"> <li>▪ Prior to opening</li> <li>▪ As needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ Material will not be piled</li> <li>▪ Material will be scattered;</li> <li>▪ Cones and limbs will be kept off roadways and walkways for public safety</li> </ul>
Cut back all vegetation sufficient to permit visibility to vehicles on roadway and allow vehicles use of the entire road	<ul style="list-style-type: none"> <li>▪ Prior to opening</li> <li>▪ As needed during operating season</li> </ul>	<ul style="list-style-type: none"> <li>▪ All shrubs, limbs and brush will be trimmed back to a distance no less than six inches (6") from the edge of all roadways and spurs.</li> </ul>
Maintain all restroom doors in operating condition	<ul style="list-style-type: none"> <li>▪ As needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ Interior and exterior of entry door</li> <li>▪ Must be able to close and lock doors at all times</li> <li>▪ Facilities shall not be out of service longer than 5 days</li> <li>▪ Use Forest Service approved materials</li> </ul>
Inspect developed boat ramps	<ul style="list-style-type: none"> <li>▪ Bi-monthly</li> </ul>	<ul style="list-style-type: none"> <li>▪ Inspect for obstacles, deterioration, and safety hazards. Safety hazards will be taken care of immediately.</li> </ul>
Maintain restroom roofs	<ul style="list-style-type: none"> <li>▪ Prior to opening</li> <li>▪ As needed during operating season</li> </ul>	<ul style="list-style-type: none"> <li>▪ Make sure pine needles are removed before season starts, and buildups do not occur during season</li> <li>▪ To prevent structural damage, buildings must be leak proof at all times.</li> </ul>
Site inspections & safety remediation	<ul style="list-style-type: none"> <li>▪ Inspect on a regular basis during the peak season</li> </ul>	<ul style="list-style-type: none"> <li>▪ Hosted facilities will be inspected on a daily basis.</li> <li>▪ Non-hosted facilities will be inspected bi-weekly and include one weekend day.</li> <li>▪ All safety items identified will be remediated prior to opening and, throughout the season within 48 hours of discovery, unless the severity is such that it would dictate closing the site,</li> </ul>
Pump toilet vaults when ¾ full at vehicle accessed facilities	<ul style="list-style-type: none"> <li>▪ Beginning of season</li> <li>▪ As needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ Vaults may need to be pumped at end of the season or, if the toilet vault is subject to accumulation of water from snowmelt at the beginning of season.</li> <li>▪ Remove any trash from vaults when pumped</li> </ul>
Pump toilet vaults as needed at boat-in access facilities and floating comfort stations	<ul style="list-style-type: none"> <li>▪ As needed</li> <li>▪ End of season</li> </ul>	<ul style="list-style-type: none"> <li>▪ Vaults may need to be pumped at end of the season or, if the toilet vault is subject to accumulation of water from snowmelt at the beginning of season.</li> <li>▪ Remove any trash from vaults when pumped</li> </ul>
Painting restrooms	<ul style="list-style-type: none"> <li>▪ On a rotating basis</li> <li>▪ Each building painted once every 3 years</li> </ul>	<ul style="list-style-type: none"> <li>▪ Paint interior and exterior once every three years with Forest Service approved materials</li> <li>▪ Surfaces to be painted shall be free of dust, dirt, scale or any other substance which may interfere with the adhesion of the specified coat. This may require sanding and smoothing.</li> <li>▪ Forest Service approved paint at full strength</li> </ul>
Paint trash bins, food lockers, recycling centers, and gates	<ul style="list-style-type: none"> <li>▪ As needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ Paint with Forest Service approved materials</li> <li>▪ Surfaces to be painted shall be free of dust, dirt, scale or any other substance which may interfere with the adhesion of the specified coat. This may require sanding and smoothing.</li> <li>▪ Forest Service approved paint at full strength</li> </ul>

**Table 5.4-1. (continued)**

Maintenance Task	Frequency	Remarks
Paint roadway signs and arrows	<ul style="list-style-type: none"> <li>▪ Prior to July 1</li> <li>▪ As needed</li> </ul>	<ul style="list-style-type: none"> <li>▪ All symbols shall be in conformance with the 'Standard Alphabets for Highway Signs and Pavement Markings' available from the Federal Highway Administration (ref. Manual on Uniform Traffic Control Devices).</li> <li>▪ Arrows shall be 12 ft wide at the base; the wings shall extend 10 ft from the outside edge of the base at a point 24 ft up from the bottom of the base; and the arrow portion shall extend 24 ft from the point where the wings start.</li> <li>▪ A high pressure air hose shall be used to clean the pavement immediately prior to painting.</li> <li>▪ Approved white traffic paint shall be used to paint signs and arrows.</li> </ul>
Paint wood picnic tables	<ul style="list-style-type: none"> <li>▪ On a rotating basis</li> <li>▪ Each table painted once every 3 years</li> </ul>	<ul style="list-style-type: none"> <li>▪ Forest Service Standards and approved materials; surfaces to be painted shall be free of dust, dirt, scale or any other substance which may interfere with the adhesion of the specified coat; this may require sanding and smoothing; Forest Service approved paint at full strength</li> </ul>
Dismantle user created fire rings	<ul style="list-style-type: none"> <li>▪ Throughout season</li> </ul>	<ul style="list-style-type: none"> <li>▪ Dismantle user created fire rings at project reservoirs where camping is limited to designated sites only. Rocks will be removed from unauthorized fire rings, turned burned side down outside the campsite.</li> </ul>
Remove ashes from fire rings	<ul style="list-style-type: none"> <li>▪ When 2/3 full</li> </ul>	<ul style="list-style-type: none"> <li>▪ Cooled ashes will be disposed off site at a county landfill. Previously disposed ashes onsite (including those disposed of onsite by users) shall be properly disposed of as described above.</li> </ul>

## 5.5 Recreational Trail Maintenance Frequency and Standards

For Project recreational trails on NFS land, YCWA and/or the Concessionaire will maintain the trails consistent with Forest Service standards (*Standard Specifications for Construction and Maintenance of Trails EM-7720-103*, or equivalent at the time of maintenance), including annually and at five-year maintenance activities, as outlined below.

### 5.5.1 Annual Trail Maintenance

YCWA and/or the Concessionaire will complete annual maintenance activities including logging out trails, imminent danger tree removal, performing spring and fall drainage maintenance (including installing new drainage structures as needed), bridge maintenance (where applicable) and loose rock removal.

### 5.5.2 Five-Year Cycle Trail Maintenance

YCWA and/or the Concessionaire will complete trail maintenance including brush cutting; embedded rock and root removal; slough and berm removal; and (if appropriate) turnpike, retaining wall and switchback maintenance. Reconstruction needs (including bridge reconstruction) will be addressed on an “as needed” basis.

## 5.6 User Conduct

Concessionaire shall make a good-faith effort to obtain user compliance with established rules and regulations for the Facilities. This shall be done by informing the public of the rules and

regulations by use of conspicuous signs and a “good host” approach, and by requesting those who do not abide with these rules and regulations to leave the Recreation Area. Usual problems include, but are not limited to:

- Dogs not on leash
- Excessive noise
- Exceeding stay limits or site capacity
- Parking or camping in non-designated areas
- Vandalism
- Improper disposal of waste water, sewage, refuse, etc.
- Use of fireworks or other contraband
- Unauthorized use of vehicles such as OHV

If necessary, YCWA and/or the Concessionaire shall request assistance from the local sheriff and the Forest Service for uncontrollable situations.

## **5.7 Law Enforcement**

Yuba County Sheriff has the responsibility to enforce State and County laws. The Forest Service has the responsibility to enforce Federal law within the Recreation Area. The two agencies mutually aid one another. The use of Yuba County Sheriff boat patrols will be encouraged to maintain safety on the reservoir and enforce County ordinances at Cottage Creek Boat Ramp and within the New Bullards Bar Reservoir Recreation Area.

## **5.8 Use Data**

Concessionaire shall maintain use data in compliance with YCWA’s Proposed Condition RR1 (Recreation Facilities Plan).

## **5.9 Vandalism**

YCWA shall be responsible to repair any damage to the Facilities that occurs from vandalism. Graffiti or signs placed by the public will be removed and the Facilities restored by YCWA at its cost within one week after YCWA becomes aware of the graffiti. YCWA and/or the Concessionaire shall take reasonable measures to prevent vandalism in the Facilities.

## **5.10 Breakdown of Equipment**

Concessionaire shall be responsible to repair damages resulting from breakdowns.



## **5.11 Taxes, Fees, Etc.**

YCWA shall be responsible for all state and local taxes, fees, or charges levied as a result of YCWA's operation and maintenance of the Facilities. No Forest Service rental fees shall be required of YCWA pursuant to 36 CFR 251.57(b)(1).

## **5.12 Storage and Maintenance Facilities**

Concessionaire may place portable sheds in the Facilities to store supplies and equipment needed by Concessionaire for execution of this Plan, contingent upon approval by the Forest Service.

## **5.13 Fire**

If YCWA and/or the Concessionaire plans to burn within the Facilities, YCWA and/or the Concessionaire shall obtain burn permits from the Forest Service, California Division of Forestry and Fire Protection, and/or Air Quality Management District, as applicable.

## **5.14 Gambling and Fire Works**

No gambling or fire works will be permitted in the Facilities.

## **6.0 Other Programs**

### **6.1 Public Releases and Signs**

#### **6.1.1 General Information Services**

Information materials (maps, brochures, information signs and regulatory signs) released to the public by YCWA and the Forest Service shall contain a statement that the Facilities are operated on a nondiscriminatory basis by YCWA on NFS land. If photographs and/or other graphics are used, they will convey the message of equal opportunity. The Forest Service and/or YCWA will print the information and construct the necessary signs.

YCWA and the Forest Service shall have all advertising regarding the Facilities (including use of photographs or graphics of the Facilities) approved by the other party prior to use.

Any signs proposed by YCWA or the Forest Service, in addition to those included in the Recreation Area at the time the new FERC license is issued, shall be approved by the other party prior to erecting the sign. The logos or other identifying information of both parties shall be included on any new signs erected.

### **6.1.2 Concessionaire Provided Information Services**

The Concessionaire will provide the following information services regarding the facilities available at New Bullards Bar Reservoir.

- Maps and brochures provided by YCWA and the Forest Service.
- The Concessionaire will be informed of current conditions regarding facilities by YCWA and any restrictions in effect (such as fire restrictions) by the Forest Service.
- The Concessionaire will provide visitors with up-to-date conditions at the reservoir.
- The Concessionaire will issue campfire permits in accordance with Forest Service policy and direction as an information and education service for the reservoir visitors.
- Concessionaire will distribute an information sheet (provided by YCWA) describing the most critical Yuba County ordinances relating to public behavior while recreating.

## **6.2 Public Service Training Standards**

YCWA shall attend to the public in a positive and helpful manner, and shall, at a minimum, provide customer-relations training to its employees who will have contact with the public to: 1) enable them to answer commonly asked questions concerning the Facilities; and, 2) achieve a standard of public-contact performance commensurate with or exceeding Forest Service standards in other similar recreation areas in the Plumas National Forest.

## **7.0 General**

### **7.1 Amendments**

This Operating Plan will be reviewed annually by both Parties prior to the start of the recreation season. It may be amended periodically upon written mutual consent of the Parties.

### **7.2 Special Provisions**

Nothing herein shall be construed as obligating YCWA or the Forest Service beyond the extent of available funds appropriated, or contrary to applicable laws, rules, and regulations.

The United States of America shall not be liable for any damage incident to the performance of work under this Plan, except as provided by the Federal Tort Claims Act.

**Recreation Facilities Plan**

**Attachment B**

**Site Plans for the Existing Project Recreation Facilities**

**Yuba River Development Project**  
**FERC Project No. 2246**

December 2013

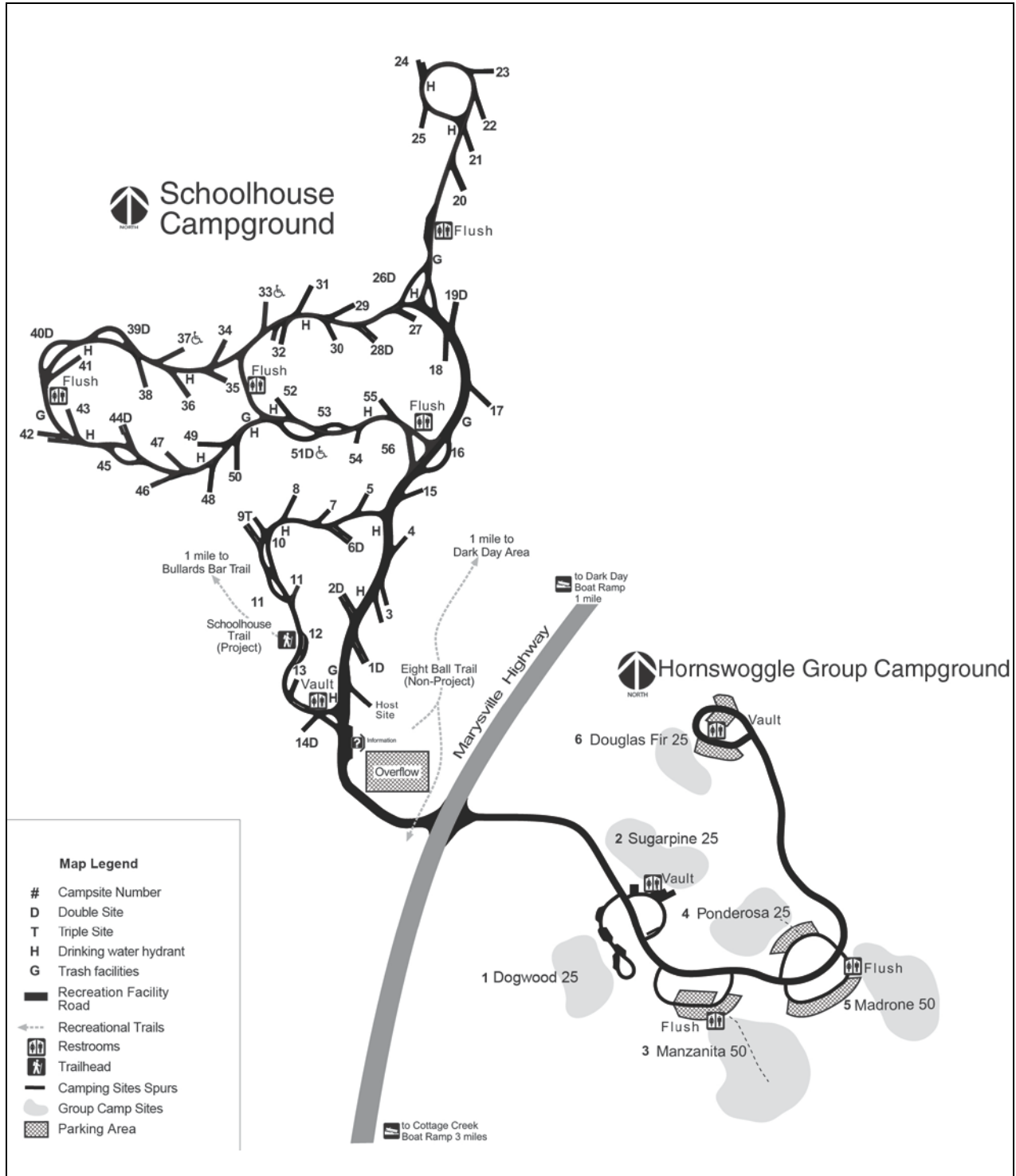
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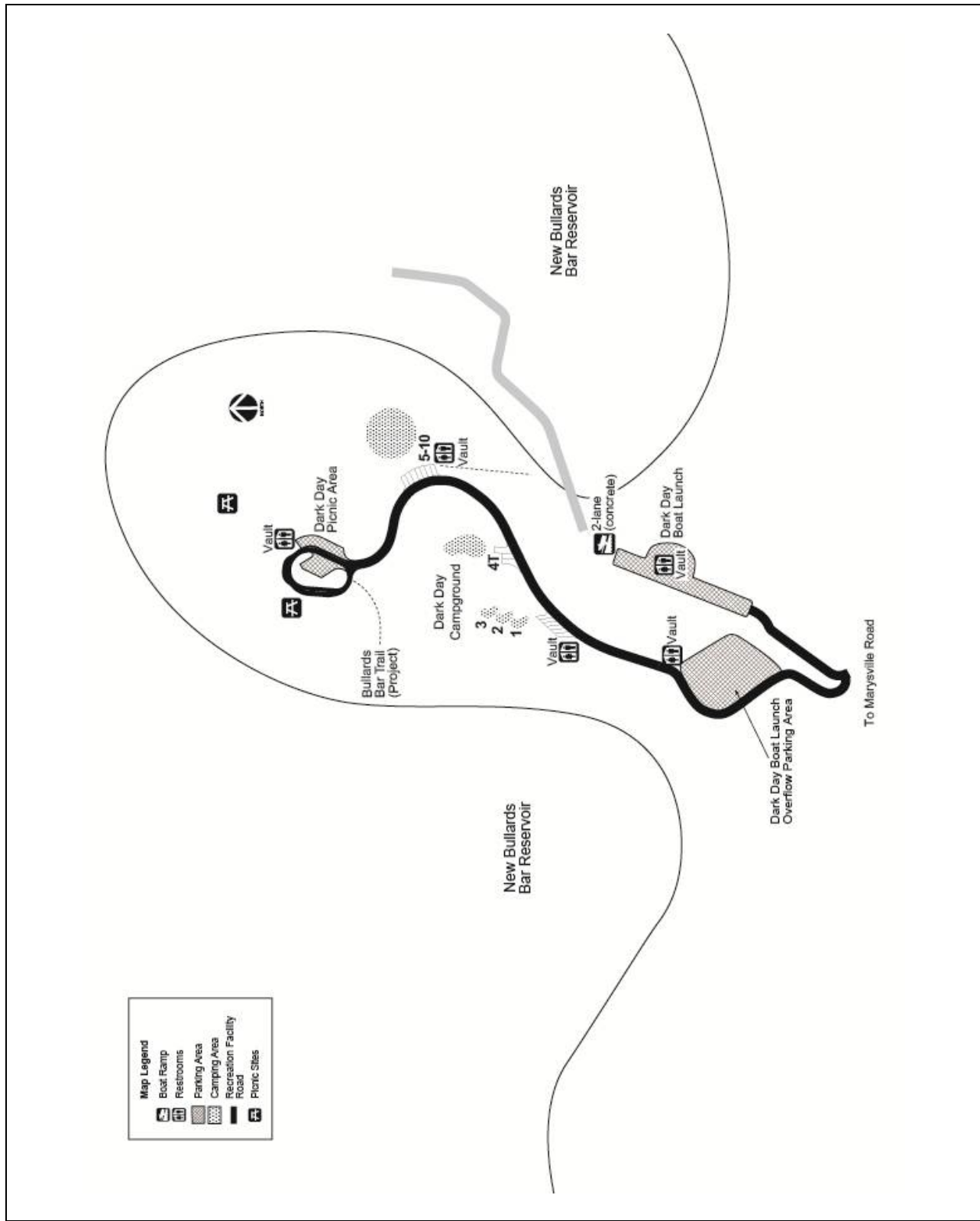
**List of Figures**  
**Description**

<b>Figure No.</b>	<b>Description</b>	<b>Page No.</b>
B-1.	Schoolhouse and Hornswoggle Group Campgrounds .....	B-1
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B-3.	Cottage Creek Boat Launch and Marina.....	B-3
B-4.	Sunset Vista Point .....	B-4
B-5.	Dam Overlook .....	B-5
B-6.	Moran Road Day Use Area.....	B-6

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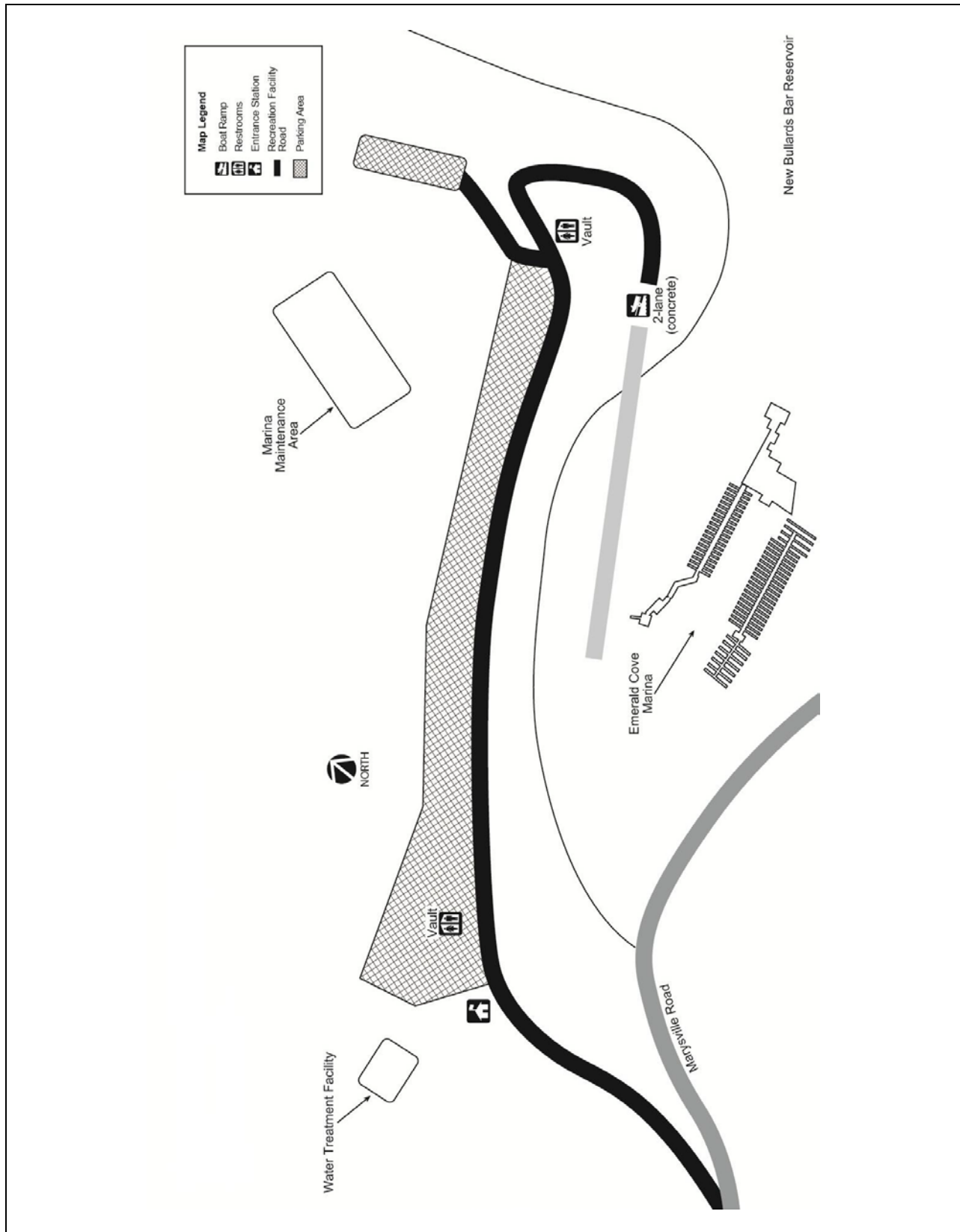


**Figure B-1. Site plan for the existing Schoolhouse Campground and Hornswoggle Group Campground facilities.**

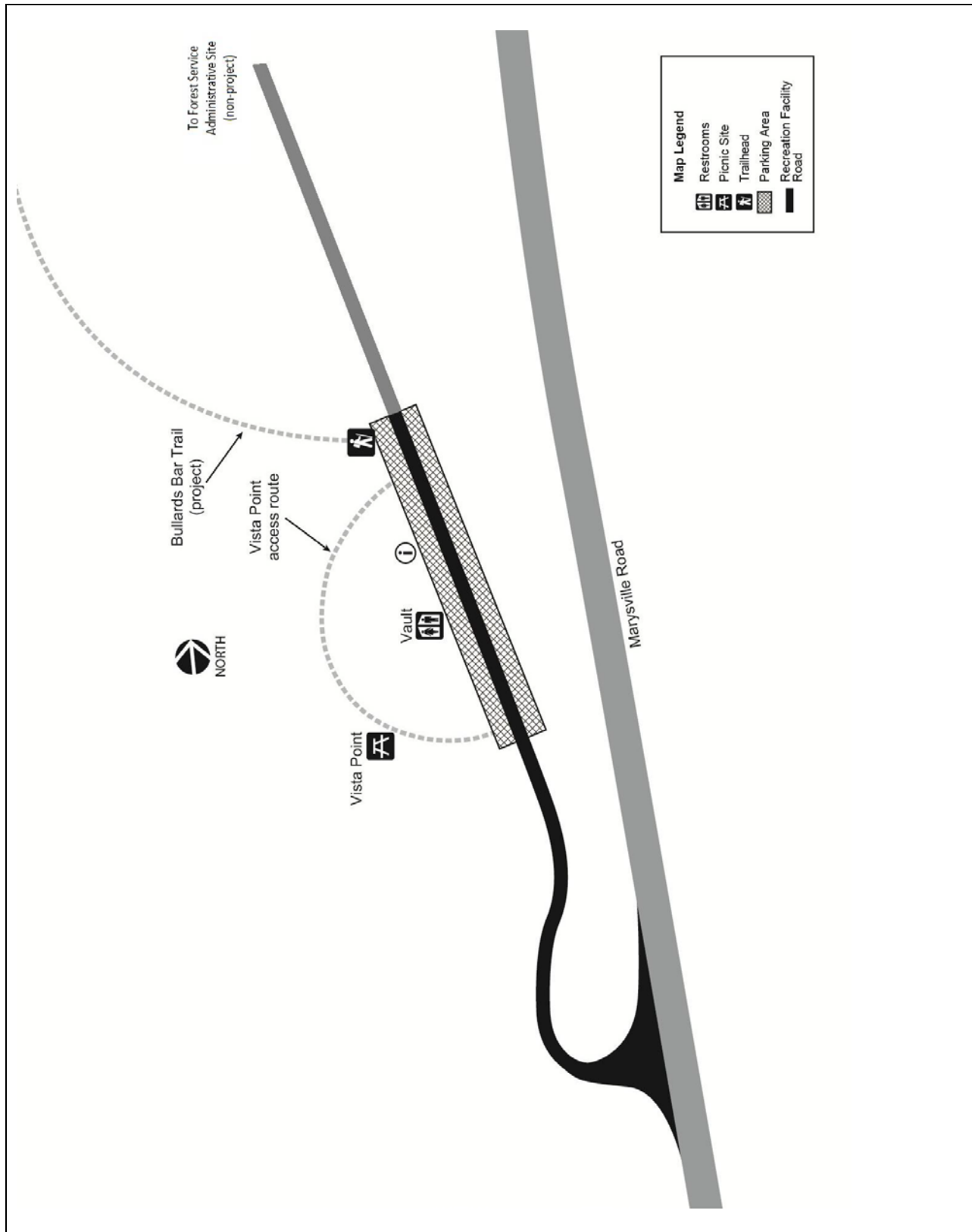


**Figure B-2. Site plan for the existing Dark Day Campground, Picnic Area and Boat Launch facilities.**





**Figure B-3. Site plan for the existing Cottage Creek Boat Launch and Marina facilities.**



**Figure B-4. Site plan for the existing Sunset Vista Point facilities.**

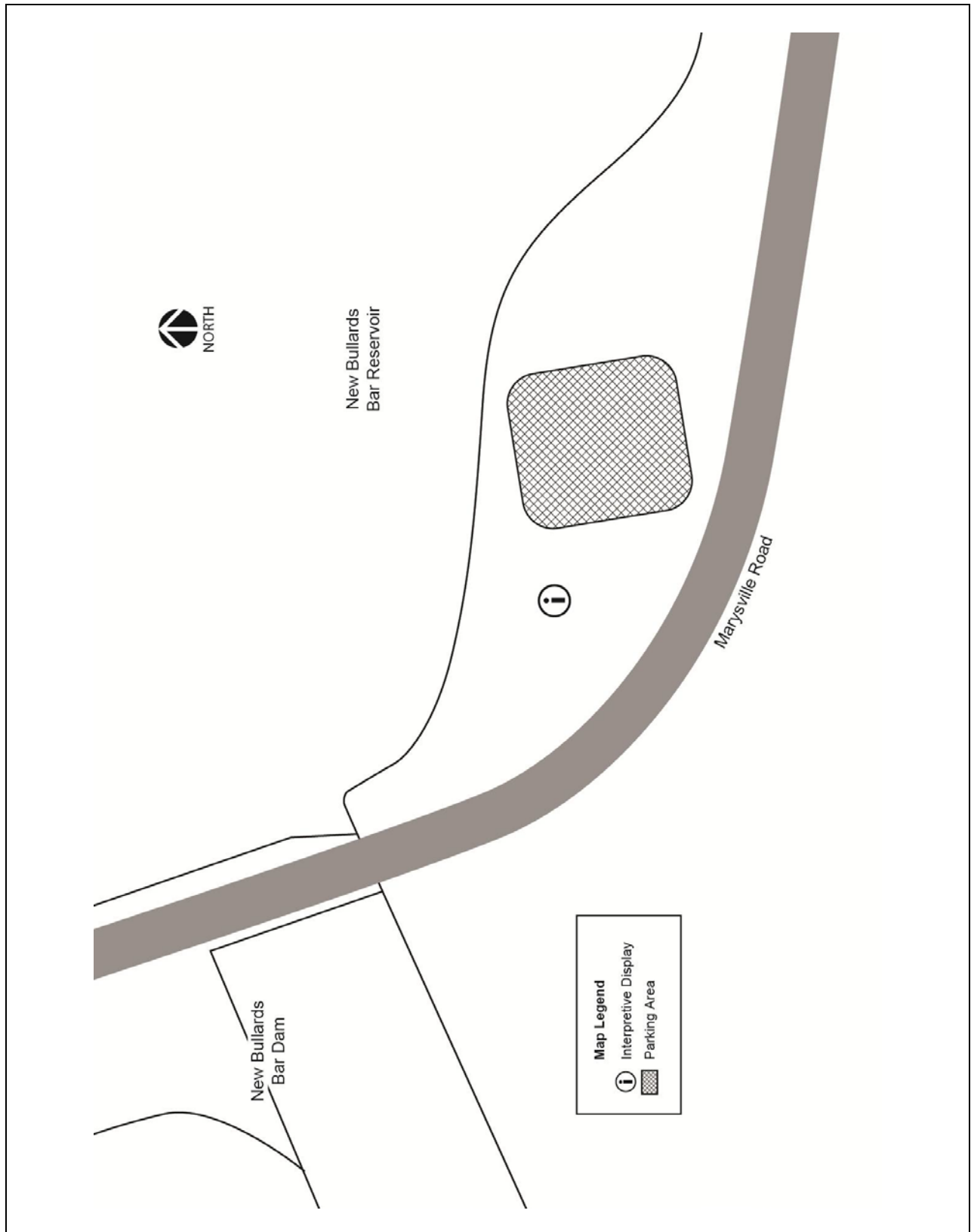
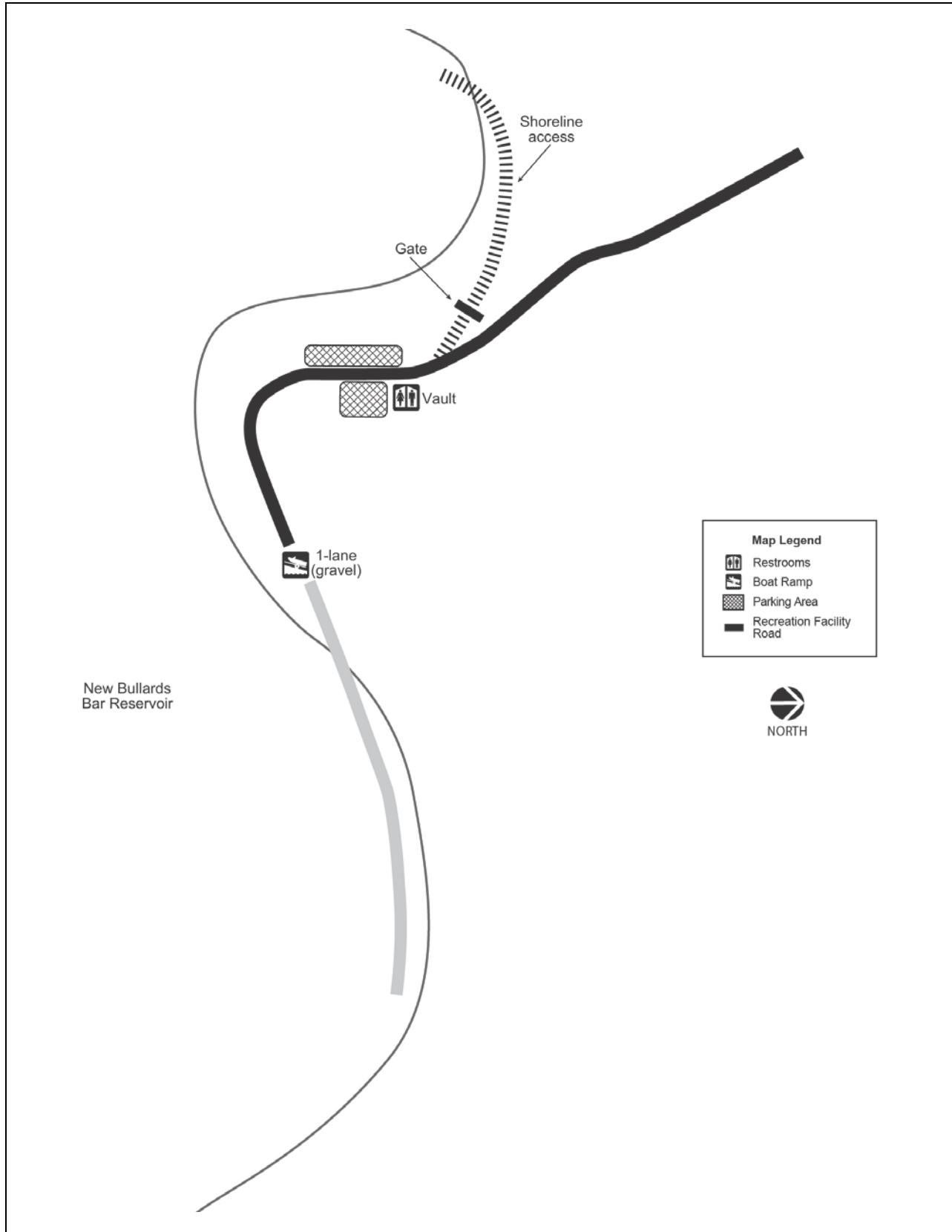


Figure B-5. Site plan for the existing Dam Overlook facilities.



**Figure B-6. Site plan for the existing Moran Road Day Use Area facilities.**

**Recreation Facilities Plan**

**Attachment C**

**As-Built Drawings for New or Rehabilitated Project  
Recreation Facilities**

**Yuba River Development Project**  
**FERC Project No. 2246**

December 2013

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**List of Figures**  
**Description**

**Figure No.**

**Page No.**

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[YCWA will update the List of Figures as new or existing facilities are constructed or rehabilitated, respectively over the new license term.]

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[Note: this attachment is a placeholder and does not contain any as-built drawings at this time. During the new license following construction work on all new or rehabilitated facilities, YCWA will attach the final as-built drawings in this attachment.]

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