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**Draft Interim Revisions to Sections 8.4, 8.9, and 8.13  
of the Lewis River Historic Properties Management Plan  
for the Swift No.1 Hydroelectric Project (FERC No. 2111),  
Yale Hydroelectric Project (FERC No. 2071), and Merwin  
Hydroelectric Project (FERC No. 935)**

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Prepared for



*Draft*  
January 2009



Prepared by  
**Historical Research Associates, Inc.**  
Portland, Oregon

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## Introduction and Purpose

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This document contains draft interim revisions to sections 8.4, 8.9, and 8.13 of the March 2004 Lewis River Historic Properties Management Plan (HPMP). The purpose of drafting interim revisions is to provide specific procedures for implementing the HPMP based on updated project conditions in the Settlement Agreement and operating licenses granted by the Federal Energy Regulatory Commission (FERC) in June 2008.

The revisions as drafted in this document are not intended to replace the current HPMP text, which was drafted in 2004 for the Lewis River hydroelectric projects FERC relicensing. Instead, the revisions will be incorporated into the HPMP text, along with other anticipated revisions, in 2011 during the next revision period. PacifiCorp will implement the revised procedures immediately.

PacifiCorp is submitting this draft document to the FERC, the Washington State Historic Preservation Office (SHPO), and representatives of the Yakama Indian Nation and Cowlitz Indian Tribe for review and comment pursuant to section 9.3.

Comments should be directed to David Moore, PacifiCorp Cultural Resources Coordinator, at 825 NE Multnomah, Suite 1500, Portland, OR 97232, or via email to [david.moore@pacificorp.com](mailto:david.moore@pacificorp.com).

**Revised HPMP sections included in this report:**

**8.4 Archaeological Resources Monitoring Plan**

**8.9 Archaeological Resources, Ground Disturbing Activities**

**8.13 Procedures for Evaluating and Minimizing Adverse Effects on  
Historic Properties**

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## **8.4 Archaeological Resources Monitoring Plan**

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## 8.4 Archaeological Resources Monitoring Plan

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The following procedures define how the Merwin and Yale reservoirs will be monitored for signs of suspicious activity or looting, and how annual inspections of known cultural sites in the reservoir draw down zones and other PacifiCorp lands will be accomplished. The Cultural Resources Coordinator (CRC) is responsible for processing the checklist and overseeing any survey work, as well as reporting and routing the results. The CRC will ensure appropriate consultation with the Washington State Historic Preservation Officer (SHPO) and any affected tribes.

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### Monitoring Patrols

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#### Purpose

The purpose of monitoring patrols is to

- increase PacifiCorp's presence on the reservoirs and other project lands to discourage undesirable behavior;
- monitor the Merwin and Yale reservoir drawdown zones for suspicious activity and signs of looting;
- report suspicious activity or evidence of looting to law enforcement officials; and
- identify significantly eroded areas in the Merwin and Yale reservoirs so they can be inspected by a professional archaeologist for unknown cultural sites.

#### Monitoring Personnel Responsibilities

Monitoring will be conducted by trained **PacifiCorp staff, park hosts, and outside law enforcement officials**. The PacifiCorp CRC will assign monitoring duties to PacifiCorp staff working on the reservoirs, in recreation areas, on transmission lines, and in archaeologically sensitive habitat management areas. The CRC will provide annual cultural resources awareness training for monitors, and will coordinate training and monitor schedules.

Monitors shall

- perform assigned monitoring duties as scheduled;
- maintain the confidentiality of monitoring maps;
- maintain vigilance regarding undesirable behavior or suspicious activity;
- record vehicle information and descriptions of persons displaying suspicious behavior; and

- report the location of any suspicious activity or vandalism at known cultural sites to the PacifiCorp Hydro Control Center (HCC)..

Monitoring of the reservoirs by law enforcement officials will be conducted as provided for in the July 2008 Lewis River Settlement Agreement. Law enforcement officials will generally conduct boat-based patrols of the reservoirs throughout the recreation season.

All persons assigned monitoring patrol responsibilities will be trained annually in cultural resource awareness pursuant to Section 8.6 of the HPMP. The CRC will review training materials annually and update them as necessary. Training materials will include procedures on how to respond when suspicious activity is observed and the contact numbers for PacifiCorp HCC and the CRC.

**Monitors must immediately report any suspicious activity to PacifiCorp HCC:  
1-877-562-9928 or 360-225-4410**

**Monitoring Procedures**

- The CRC will provide all monitoring personnel with maps that will identify areas that will be monitored within the Merwin and Yale reservoirs where cultural sites are located. The maps will not make reference to cultural resources and will not depict the specific location or site number of any sites. Instead, maps will show a large shaded band parallel to the reservoir shoreline in the vicinity of sites that will be labeled "Erosion Monitoring Area" in the map legend (Attachment A). The CRC will review the maps annually and update them as necessary. Monitoring staff will be responsible for keeping the maps confidential. Cultural sites located on other project lands will be monitored by the CRC, and will not require monitoring maps.
- Monitors will use the monitoring maps to focus their efforts to detect suspicious activities, obvious vandalism, large erosion events, and recreational impacts.
- Monitoring of the Merwin and Yale reservoir drawdown zones will take place when the specific target elevations listed in Table 8.4-1 are reached and sustained for three or more days. (Note: no monitoring is required for the Swift No. 1 reservoir.)

**Table 8.4-1.** Target monitoring elevations for Merwin and Yale reservoirs.\*

Reservoir	Target monitoring elevation
Merwin	235 ft
Yale	470 ft

\* Monitoring of Swift No. 1 reservoir is not required.

- Two cultural sites outside of the reservoir drawdown zones have been identified for monitoring: 45CW101 and 45CW102. Sites 45CW101 and 45CW102 are located on the Yale 115kV transmission line near Saddle Dam and have been vandalized in the past. As the result of mitigation actions associated with a 2006 pole replacement project, the portion of site 45CW101 that is within the transmission line access road and right-of-way is now protected with geotextile fabric and gravel and an additional access road gate has been installed. (No protection measures are in place at 45CW102.) These sites will be monitored by the CRC.
- Monitoring patrol staff will immediately report any suspicious activity to HCC, who will respond as appropriate to the CRC and law enforcement officials if necessary.
- The CRC will notify the Washington State Historic Preservation Office (SHPO) and the tribes of any incidents involving vandalism of a cultural site to discuss appropriate actions.

## Schedule

- During the summer recreation season, generally May through September, PacifiCorp will contract with outside law enforcement officials for marine patrols of Merwin and Yale reservoirs by boat. Marine patrols will be conducted consistently throughout the recreation season.
- During the recreation season, the CRC will monitor the projected reservoir elevations for Merwin and Yale. When the target monitoring elevations listed in Table 8-4.1 will be reached and sustained for three or more days, the CRC will notify marine patrol officers to monitor areas indicated on the monitoring maps. If conditions prevent monitoring of sensitive areas by marine patrol officers during sustained target elevations, the CRC will mobilize other monitoring staff to monitor those areas by boat or land. The CRC will select land-based vantage points and include them on monitoring maps.
- Outside of the recreation season, generally October 1 through April 30, the CRC will designate one day per week for monitoring Merwin and Yale reservoirs. During this time, the CRC will obtain the schedule of projected reservoir elevations distributed every two weeks. Based on the projections, the CRC will determine if the target monitoring elevations listed in Table 8-4.1 will be reached and sustained for more than one week. If so, the CRC will mobilize staff on the designated monitoring day. *Note: Projected reservoir elevations are subject to change without notice; actual reservoir elevations may not reach target monitoring elevations on the designated monitoring day. In this case, the CRC would cancel monitoring activities for that week.*
- Outside of the recreation season, monitoring of the reservoirs will be accomplished by boat if weather conditions are suitable. If adverse weather conditions prevent safe operation of a boat, monitoring staff will utilize land-based vantage points to observe areas indicated on the monitoring maps.

- The CRC will perform or participate in reservoir monitoring patrols at least four times each year. The CRC will invite representatives of the Cowlitz Indian Tribe and the Yakama Indian Nation to participate in a monitoring session once during the off-season and once during the recreation season. The CRC will strive to give the tribes two weeks prior notice based on projected elevations, weather and conditions, and mobilization logistics. The CRC reserves the right to cancel a monitoring session up to and including the scheduled day if conditions are not satisfactory.
- The CRC or PacifiCorp monitoring staff with access to restricted project lands will monitor sites 45CW101 and 45CW102 on the Yale 115kV transmission line three times each year at the start of the recreation season, during the recreation season, and at the end of the recreation season. Monitoring of the sites will consist of a general walk over of the site area within and adjacent to the transmission line right-of-way and access roads.

## Reporting

The CRC will follow up on any report of an incident, complete a **Monitoring Incident Form** (Attachment B), and arrange for a professional archaeologist to inspect any areas where looting may have occurred.

PacifiCorp monitoring staff will record their observations during patrols and will report any incidents to the CRC. The CRC will summarize the yearly monitoring activities and the outcome of any incidents for the annual HPMP report. The report will include any completed Monitoring Incident Forms. The CRC will ensure that PacifiCorp's cultural resources GIS is updated to include any new cultural site information resulting from monitoring activities.

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## Site Inspections

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### Purpose

The purpose of site inspections is to conduct annual systematic and occasional opportunistic inspections of known cultural sites in the reservoir drawdown zones and on other PacifiCorp project lands. Sites in the Merwin, Yale, and Swift No. 1 drawdown zones will be inspected once each year if they become exposed during normal operation of the reservoirs. Due to variability in the range of normal operational pool elevations, not all sites in a given reservoir may become exposed during the year. Some sites may become exposed more than once during a given year, however, regardless of the number of exposures a site will be inspected only once per year.

## Procedures for Site Inspections

- Sites in the reservoir drawdown zones at Merwin, Yale, and Swift No. 1 will be inspected once each year outside of the recreation season if they become exposed during normal operation of the reservoirs.
- Outside of the recreation season, (generally October 1 through April 30) the CRC will keep a checklist of the sites listed in Tables 8.4-2 through 8.4-4 and monitor the reservoir elevations in the off season to watch for opportunities to conduct site inspections.
- Based on the projected reservoir elevations distributed every two weeks by HCC, the CRC will arrange for a professional archaeologist to conduct site inspections.
- Depending on weather conditions, scheduling, and the availability of archeological contractors, the CRC may choose to coordinate annual site inspections at the same time as monitoring patrols so that sites can be accessed by boat.

**Table 8.4-2.** Archaeological sites in the Merwin Reservoir drawdown zone.

Site ID	Site Elevation (ft)	Site Type
45CL516	228	Lithic scatter
45CL517	228	Lithic scatter
45CW113	228	Lithic scatter
45CW100	229	Lithic scatter
45CL520	230	Lithics & historic debris
45CL518	235	Lithic scatter
45CW120	235	Lithic scatter
45CL403	236	Lithic scatter
45CW111	236	Lithic scatter
45CW115	236	Lithic scatter
45CL519	238	Lithic scatter
45CW118/119	239	Lithic scatter
45CW107	240	Lithic scatter
45CW109	240	Historic debris
45CW110	240	Lithic scatter
45CW116	240	Lithic scatter

**Table 8.4-3.** Archaeological sites in the Yale Reservoir drawdown zone.

Site ID	Site Elevation (ft)	Site Type
45CL468	470	Lithic scatter
45CW105	470	Lithic scatter
45CW106	475	Lithic scatter
45CW104	480	Lithic scatter
45CL469	485	Lithic scatter
45CW103	485	Lithic scatter

**Table 8.4-4.** Archaeological sites in the Swift No. 1 Reservoir drawdown zone.

Site ID	Site Elevation (ft)	Site Type
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45SA448	970	Lithic scatter
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***Extreme Drawdowns***

- If an extreme reservoir drawdown for maintenance or other purposes exposes previously unsurveyed areas of a reservoir (for example, areas below 219 feet at Merwin reservoir), the CRC will arrange for a professional archaeologist to conduct a survey of the newly exposed area.
- If a maintenance event or other circumstance results in the drawdown of Merwin reservoir below 228 feet, the CRC will arrange for a professional archaeologist to inspect site 45CW108, a historic cemetery site. The site was recorded during relicensing studies in 2003, and there is concern among the tribes that artifacts or human remains may still be present. If the site becomes exposed by an extreme drawdown event, the CRC will contact representatives of the Yakama Nation and the Cowlitz Tribe to coordinate a site visit with a professional archaeologist during the drawdown.

***Large-Scale Erosion Events***

- After a severe winter storm, the CRC will ask monitors to be watchful for areas of large-scale erosion. The CRC will arrange for a professional archaeologist to conduct a reconnaissance survey of any newly eroded areas. This includes archaeologically sensitive lands outside of the reservoirs where monitoring patrols may have observed landslides.

**Schedule for Site Inspections**

Site inspections will take place annually outside of the recreation season if the target reservoir levels in Table 8.4-6 are reached. (Note that Swift No. 1 reservoir has two different target elevations to be used on alternate years.) The CRC will monitor projected reservoir elevations and will coordinate site inspections with a professional archaeologist and PacifiCorp staff. The archaeologist will be responsible for recording site conditions on an **Archaeological Site Inspection Form** (Attachment C). The archaeologist will collect diagnostic artifacts to prevent loss. Collected artifacts will be curated pursuant to section 8.12 of the HPMP.

**Table 8.4-6.** Target reservoir elevations for annual site inspections.

<b>Reservoir</b>	<b>Target elevation.</b>
Merwin	235 feet
Yale	470 feet
Swift No. 1	970 feet – alternate years 950 feet – alternate years

## **Reporting**

The CRC will summarize the information recorded on Archaeological Site Inspection Forms and include the forms and any Washington DAHP Archaeological Site forms for newly recorded cultural sites in the annual HPMP report. The CRC will ensure that PacifiCorp's cultural resources GIS is updated to include new information.

### **Attachment A: Monitoring Maps**

### **Attachment B: Monitoring Incident Form**

### **Attachment C: Archaeological Site Inspection Form**

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## **Attachment A: Monitoring Maps**

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## **Attachment B: Monitoring Incident Form**

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## Attachment C: Archaeological Site Inspection Form

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Inspection Date \_\_\_\_\_

Date of Previous Inspection \_\_\_\_\_

Inspector(s) \_\_\_\_\_

**Lewis River HPMP**

**8.4 - Archaeological Site Inspection Form**

Site number: \_\_\_\_\_ Site elevation: \_\_\_\_\_ Reservoir Elevation \_\_\_\_\_

Site access method (boat, pedestrian, etc.): \_\_\_\_\_

Surface visibility: (describe any obscuring factors – vegetation, snow, etc.) \_\_\_\_\_

***Impacts Observed***

Note dimensions and location of impact relative to site datum, notable landmarks, or site boundary.

Impact	Comment
Cut bank slumping or loss	
Recreation	
Vandalism/Looting	
Wildlife/Vegetation disturbance	
Other	

***Describe any changes in site condition relative to previous inspection:***

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Inspection Date \_\_\_\_\_

Site Number \_\_\_\_\_

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**Describe artifacts observed (note if collected):**

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**List photos taken from monitoring points:**

Monitoring Point #: \_\_\_\_\_ Frame # \_\_\_\_\_ View \_\_\_\_\_

Monitoring Point #: \_\_\_\_\_ Frame # \_\_\_\_\_ View \_\_\_\_\_

Monitoring Point #: \_\_\_\_\_ Frame # \_\_\_\_\_ View \_\_\_\_\_

Monitoring Point #: \_\_\_\_\_ Frame # \_\_\_\_\_ View \_\_\_\_\_

Monitoring Point #: \_\_\_\_\_ Frame # \_\_\_\_\_ View \_\_\_\_\_

Monitoring Point #: \_\_\_\_\_ Frame # \_\_\_\_\_ View \_\_\_\_\_

**Sketch map updated?      Y      N**

**New site datum(s) recorded?   Y   N**

UTM: \_\_\_\_\_ mE      \_\_\_\_\_ mN

**Comments**

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## 8.9 Archaeological Resources, Ground Disturbing Activities

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## 8.9 Archaeological Resources, Ground Disturbing Activities

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The following procedures streamline and clarify the cultural review process outlined in Section 8.9 using a checklist approach to determine if a project requires an archeological survey. The Cultural Resources Coordinator (CRC) is responsible for processing the checklist, overseeing any survey work, and reporting and routing the results. The CRC will also ensure appropriate consultation with the Washington State Historic Preservation Officer (SHPO) and any affected tribes.

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### Procedures for Completing Cultural Reviews

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#### ***Determine if the project is a CATEX***

Routine operations and maintenance (O&M) activities with little or no potential to affect archaeological resources are listed as "categorical exemptions" (CATEX) with reference to Section 106 regulations at 36 CFR 800.14(c). CATEX projects do not require an archaeological survey. After completing Section 1, determine if the project is a CATEX by completing Section 2 using the Operations and Maintenance (O&M) list in Table 8.9-1.

If the project is a CATEX, check the PacifiCorp cultural GIS to determine if the project area is within 200 feet of a known cultural site. If so, the project requires review by a professional archaeologist. Complete sections 1 and 2 of the checklist and submit it for review.

If a CATEX project and is *not* within 200 ft of a known cultural site, no review is required. Complete sections 1, 2, and 4 of the checklist, and include a copy in the annual HPMP report.

<b>CATEX Projects</b>	<i>If a CATEX project is within 200 ft of a known cultural site, the project requires an archaeological review.</i>
	<i>If a CATEX project is <b>not</b> within 200 ft of a known cultural site, no archaeological review is required.</i>

#### ***Projects that require archaeological review***

Any project involving ground disturbance that is not a CATEX requires an archaeological review. Complete sections 1 and 2 of the checklist and submit it to a professional archaeologist for review along with a description of the project, a map, and any photos or supporting documentation that will help in assessing potential effects from the project.

**Table 8.9-1.** List of O&M CATEX projects.

<b>O&amp;M Category</b>	<b>Action</b>
<b>Facilities</b>	Monitor, maintain gauge stations, collect gauge data, or adjust instream flows.
	Install instream structures or gauges. <sup>1</sup>
	Sediment removal and disposal from forebays, canals, etc. <sup>1</sup>
	Inspect powerhouses, substations, waterways, forebays, penstocks, dams, and other facilities. <sup>1</sup>
	Repair existing buried utilities if no new ground disturbance is involved.
	Installation of buried utilities if entire trench will be in previously disturbed ground or fill.
<b>Roads and Trails</b>	Install new signs or markers within or alongside existing roadways or trails.
	Install new gates on existing roads.
	Repair and maintenance of existing roads (paved, non-native, or gravel). <sup>1</sup>
	Replace or add conductors, insulators, or cross-arms to existing poles using boom truck. <sup>1</sup>
	Trail reconstruction within existing ROW (not creation of new sections).
	Replace existing non-historic culverts within existing footprint.
	Road or trail decommissions where obliteration disturbance is limited to existing ROW and is limited to the depth of the previous subgrade, including culverts.
	Road or trail closures accomplished with gates, barricades, or berms, if limited to existing road ROW. <sup>1</sup>
<b>Vegetation</b>	Vegetation maintenance (lopping, thinning, mowing, etc.) if outside of known cultural site boundaries and no blading or grubbing is involved. Tree debris to be left on the ground. <sup>1</sup>
	Hazard tree removal using existing skid trails/roads. <sup>1</sup>
	Eradicate invasive species using herbicides or hand tool removal. <sup>1</sup>
<b>Other</b>	Maintain wildlife bridges or crossings.
	Install nesting platforms and boxes.
	Replacement of non-historic bulletin boards, information signs, barrier posts, or visitor registers in recreational or special designation areas if within existing sign footprint. <sup>1</sup>
	Construction of snow fences.

<sup>1</sup> Assumes no new ground disturbance from equipment/vehicles use or construction activities.

## Results of Archaeological Review

The reviewing archaeologist will assess the project and determine if it will have *no effects*, or *potential effects*, completing Section 3 of the checklist with reference to Table 8.9-2 below.

**Table 8.9-2.** Archaeological probability of various landform types on PacifiCorp project lands.

Archaeological Probability	Includes These Landform Types and Conditions
Low	All landforms with >20% (11°) slope, any distance to water
Medium and High	Landforms with <20% (11°) slope, any distance to water, including <ul style="list-style-type: none"><li>▪ Current or relic river/stream margins and terraces</li><li>▪ Spur and isolated ridges</li><li>▪ Saddles, hilltops</li><li>▪ Meadows, plains</li></ul>

### No Effects Determination

If the archaeologist determines that the project will have no effects, the archaeologist completes Section 3 of the checklist and returns it to the CRC. The CRC will forward a copy of the summary memo to the SHPO and the tribes prior to proceeding with the project.

### Potential Effects Determination

If the archaeologist determines that the project has potential effects, the archaeologist documents the decision process in Section 3 of the checklist, attaching a summary memo if needed, and indicates whether a survey is required. The archaeologist returns the checklist and any supporting documentation to the CRC. Determinations of potential effects do not always require a field survey; consultation with the PacifiCorp project manager may result in the project being redesigned, abandoned, or implemented in a manner that would avoid any potential effects to archaeological resources.

#### **Potential Effects Determination**

The assessment of a project as having "potential effects" is based on the archaeological probability of the project area (Table 8.9-2), and the nature and scope of the proposed ground disturbance. The degree and extent of any prior disturbance to the project area is also factored in, as well as any feasible modifications of the project that would avoid potential effects and the scope of previous survey work in the project area conducted within the past five years.

If a survey is required, the CRC arranges to have the project area surveyed, ensuring that the archaeologist meets the Secretary of the Interior's *Standards* and current guidelines published by the Washington State Department of Archaeology and Preservation (DAHP). The CRC will request a brief research design and schedule for approval. Once the survey is

completed, the archaeologist will prepare a brief technical report summarizing the survey methods and results and recommendations for mitigation if appropriate.

The CRC is responsible for completing any consultation with the SHPO and the tribes consistent with Section 8.9 of the HPMP, and for overseeing any mitigation measures implemented under section 8.11 of the HPMP. Prior to proceeding with the project, the CRC will forward a copy of the survey report, including negative findings, to the SHPO and the tribes as required in Section 8.9 of the HPMP. If the survey findings are negative, the project may proceed without comment from the SHPO or tribes, or the CRC may request comments by a specific date if the project is sensitive.

As required by Section 8.6 of the HPMP, the CRC will ensure that construction supervisors have received cultural resources awareness training prior to proceeding with the project.

Once the survey work is complete, the CRC completes Section 4 of the checklist and routes it to the appropriate persons/departments.

### **Emergency Situations**

PacifiCorp may need to respond immediately when life, property, or continued project operations are at risk from an unpredictable event such as flood, fire, extreme weather conditions, or facility malfunctions. During such urgent conditions, PacifiCorp staff will likely not be able to follow some or all of the management protocols specified in this section, however, staff will endeavor to minimize disturbance and damage to known historic properties or cultural sites.

In accordance with Section 106 regulations at 36 CFR 800.12(a)(1), upon resolution of the urgent condition, managers in charge of emergency responses must report the locations of actions that were taken to the CRC. The CRC will follow up with whatever inspections needed to assess potential damage to a historic property or cultural site, including sites inadvertently discovered during the emergency event. Consultation with the FERC, the SHPO, and others may be necessary to assess damage and plan needed treatment. The CRC will file a report of the outcome of such investigations and treatment with the FERC, the SHPO, and the Cowlitz and Yakama tribes as appropriate. A copy of the report will be included in the annual HPMP report.

### **Reporting and Routing**

The CRC will include a copy of the checklist, review memo, survey report, and any consultation correspondence as appropriate in the annual HPMP report.

The CRC will ensure that the surveyed project area and location of any newly discovered archaeological sites are documented in the PacifiCorp cultural GIS.

## **Attachment A: Cultural Review Checklist**

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## Attachment A: Cultural Review Checklist

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## HPMP Section 8.9 Cultural Review Checklist

1. Project Information	
Date:	Cultural Resources Coordinator:
Project Name:	License Article #:            SA Section:
Project Location	APR#                          Work Order #:
Township            Range            Section	Project Manager:
Project description ( <i>attach drawings and maps</i> ):	
2. Cultural Review Results	
<input type="checkbox"/> Project is a CATEX and is not within 200 ft of a known cultural site. <b>No archaeological review required. Complete Section 4.</b>	
<input type="checkbox"/> Project is a CATEX, but is within 200 ft of a known cultural site. <i>or</i>	
<input type="checkbox"/> Project is not a CATEX. <b>Archaeological review is required.</b> Date submitted for archaeological review:	
3. Archaeological Review and Results	
Reviewing archaeologist and affiliation: <b>Results:</b> <input type="checkbox"/> No Effects <input type="checkbox"/> Potential Effects   Survey Required? <input type="checkbox"/> No <input type="checkbox"/> Yes <b>Comments:</b> Summary review memo attached? <input type="checkbox"/> No <input type="checkbox"/> Yes	
4. Cultural Review Completion and Report Routing	
Date archaeological survey completed:                          Date report received by PacifiCorp:	
Cultural sites affected? <input type="checkbox"/> No <input type="checkbox"/> Yes    Mitigation Required? <input type="checkbox"/> No <input type="checkbox"/> Yes	
Date report submitted to SHPO:    Date report submitted to tribes:	
Attached: <input type="checkbox"/> Review memo <input type="checkbox"/> Survey Report <input type="checkbox"/> Mitigation Report <input type="checkbox"/> SHPO/Tribes correspondence	
Routing: <input type="checkbox"/> Annual HPMP <input type="checkbox"/> GIS <input type="checkbox"/> _____ <input type="checkbox"/> _____	
Date Completed	CRC Initials _____

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## **8.13 Procedures for Evaluating and Minimizing Adverse Effects on Historic Properties**

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## **8.13 Procedures for Evaluating and Minimizing Adverse Effects on Historic Properties**

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The following interim revisions to the HPMP streamline and clarify the process of assessing potential adverse effects for Level 1, Level 2, and Level 3 reviews under Section 8.13.3.2 through 8.13.3.4, using a checklist approach. The Cultural Resources Coordinator (CRC) is responsible for processing the checklist, overseeing any treatment measures, and reporting and routing the results.

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### **Procedures for Completing Reviews of Proposed Changes to Historic Properties**

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There are currently two historic properties associated with the Lewis River project, the Ariel (Merwin) Hydroelectric Historic District, and the Swift No. 2 Hydroelectric Historic District. Contributing resources<sup>1</sup> of these districts could be potentially affected by actions associated with the ongoing operation and maintenance of the Lewis River projects over the life of the new FERC licenses. Assessing potential effects requires identification of the character-defining features of the contributing resource that may be affected by a proposed action to determine if the action will alter, modify, or remove those features. These interim revisions to the HPMP identify the character-defining features of contributing resources and provide specific procedures to follow for a Level 1, Level 2, or Level 3 review.

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### **Procedures for Assessing Potential Effects to Historic Buildings and Structures**

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The CRC will consult Table 8.13-1 of the HPMP to identify whether character-defining features of a contributing resource of a historic district will be impacted by the proposed action. The proposed action will determine the appropriate level of review required. The CRC will document the review process on the historic property review checklist in Attachment A, which will be used to track effects determinations, treatment or mitigation measures, and SHPO consultation. Review procedures are defined below for Level 1, Level 2, and Level 3.

#### **Level 1 – Assessment of effects for maintenance and repair work**

- ✓ Cleaning
- ✓ Painting
- ✓ Caulking
- ✓ Repair or replacement with in-kind materials

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<sup>1 1</sup> The employee housing compound (Ariel Village), which dates to 1929, is within the boundary of the Ariel Hydroelectric Historic District but is not a contributing resource of the district under Criterion C because the houses have undergone extensive alterations (HRA 2002). Only removal of the entire village compound, which is eligible under Criterion A, would constitute a potential adverse effect to the district and would require consultation with the SHPO.

- ✓ Landscaping or other changes to the physical setting that do not result in an adverse effect

1. The CRC will refer to the historic preservation standards stipulated in Section 8.13.2 of the HPMP and the criteria of adverse effects in Section 8.13.3.1 to determine if the proposed work will have an adverse effect on the character-defining features of a historic property.
2. If it is clear that the work will have no adverse effect, the decision is documented on the checklist and work proceeds.
3. If effects cannot be determined, or if the CRC determines the work will have an adverse effect, the CRC will submit the proposed action to a professional architectural historian for a determination of effects and/or a recommendation for treatment or mitigation.
4. If the architectural review results in a determination of adverse effects, the architectural historian will refer to the standards in section 8.13.2 of the HPMP and the Secretary of the Interior's Standards for Treatment of Historic Properties at 36 CFR Part 68 (see Appendix D of the HPMP) in making a recommendation for treatment or mitigation.. If the recommendation is not feasible, the CRC will consult with the SHPO.
6. The CRC will ensure that the recommended treatment or mitigation is completed and will document the outcome on the checklist.

#### **Level 2 – Modification or alteration of contributing resource**

- ✓ Modification or alteration of a building or structure
  - ✓ Repair or replacement with unlike materials
  - ✓ Major changes to the physical setting of a historic property
1. The CRC will submit the proposed work to a professional architectural historian for a determination of effect. The effects determination will be explained in a brief memo that the CRC will attach to the checklist.
  2. If review results in a determination of adverse effect, the architectural historian will recommend treatment or mitigation measures based on the standards in section 8.13.2 of the HPMP, with reference to the Secretary of the Interior's Standards for Treatment of Historic Properties at 36 CFR Part 68 (see Appendix A of the HPMP).
  3. The CRC will submit the proposed work and recommended treatment/mitigation to the SHPO for review and concurrence.
  4. The CRC will ensure that the mitigation or treatment is completed before work proceeds.

#### **Level 3 – Documentation of irreversible or untreatable adverse effects**

- ✓ Modification or alteration of a building or structure that cannot be reversed or treated
  - ✓ Removal or demolition of a contributing resource of a historic district
1. In the event that irreversible or untreatable adverse effects to a historic property from modernization, operational changes, or technological efficiencies are required to continue operations, PacifiCorp will record the affected historic property to Level II documentation standards of the Historic American Building Survey (HABS) or Historic American Engineering Record (HAER).





2. The CRC will consult with the SHPO to determine the level of effort and scope of the Level II documentation. Level II documentation will follow the National Park Service Heritage Documentation Program standards and guidelines (online at [www.nps.gov/history/hdp/standards/](http://www.nps.gov/history/hdp/standards/)), which includes such measures as large-format negative photography of select existing architectural and engineering plans and drawings; large-format photographs of exterior and interior views and historic views; and written data including a history and description of the resource. The CRC will submit the outcome of documentation to the SHPO for review.
3. Once documentation has been completed to the satisfaction of the SHPO, work may proceed.

### **Reporting and Routing**

The CRC will include a copy of the checklist and any review memos or consultation correspondence in the annual HPMP report.

### **Attachment A: Historic Property Review Checklist**

**Table 8.13-1** Character-defining features of historic district contributing resources.

<b>Ariel (Merwin) Hydroelectric Historic District</b>	
<b>Merwin Dam</b>	
Dam Face/Structure	
Dam Sides at Rock Walls	
Spillway Structure	
Penstocks (4) and their Access Gangways	

Penstocks



**Gantry Crane**

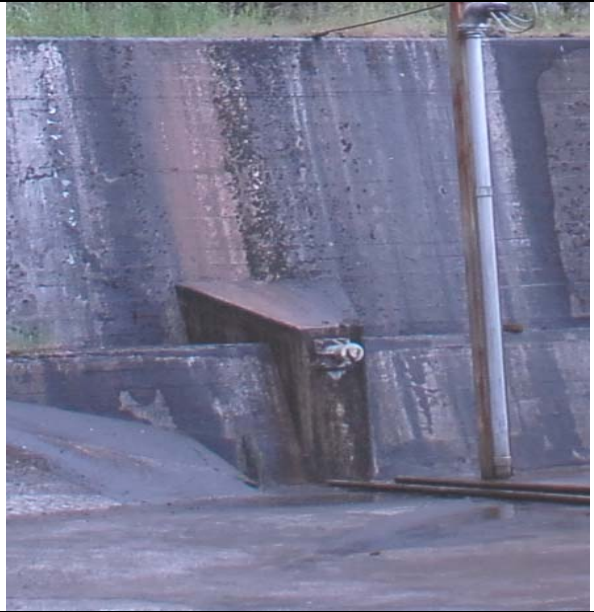
Overall Gantry Structure



Gantry Rails



Gantry Rail Stops



Gantry Gangway overhang structure



**Powerhouse**

Entry Door Portal Designs



Interior Carriage Lights



Windows



Interior setting, floor and ceiling



## Steel Truss Bridge

Steel Truss Structural Design





## Control House

Entry Door Portal Designs



Art Deco Pilasters and Metal Windows



Interior Electrical Panels





**Switching Yard Structure**

TBD

TBA

**Swift No. 1 Hydroelectric Historic District**

**Dam**

Spillway Structure & Components



Concrete Spillway Chute  
And Concrete Form



Lift Gate Hoist/Tower



Concrete Platform



Radial Gates



Spillway Outfall (Waterfall)



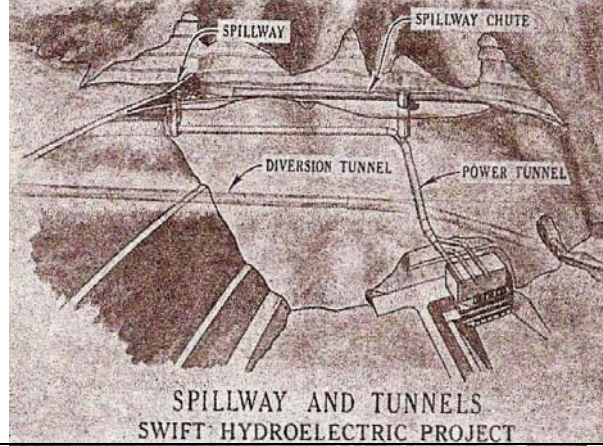
**Surge tank**

Surge Tank Structure Relationship to Spillway



**Tunnel**

Tunnel Route



Tunnel Inlet & Outlet



**Swift #2 Canal**

Earthen Engineering Design



Levee Walls Profile



Route between Power Houses



**Swift No. 1 Powerhouse & Penstocks**

Powerhouse Structure Form



Power Tunnel Penstocks outlets during construction



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## Attachment A: Historic Property Review Checklist

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**HPMP Section 8.13.1 – Historic Property Review Checklist  
 (Historic District Contributing Resources)**

Project Information	
Date: _____ Project Manager: _____	Cultural Resources Coordinator: _____
License Article #: _____ SA Section: _____ APR# _____ Work Order #: _____	Name of Historic District: _____ Name of Contributing Resource: _____
Description of proposed action:	
Level 1 – Assessment of effects for maintenance or repair work	
<input type="checkbox"/> No effects <input type="checkbox"/> Potential effects <input type="checkbox"/> Submitted for architectural review Date submitted: _____ Reviewing architect and affiliation: _____ Results: <input type="checkbox"/> No Effects <input type="checkbox"/> Adverse effects – Treatment/mitigation required Treatment completed? <input type="checkbox"/> Yes <input type="checkbox"/> No    Date completed: _____ Comment: _____	
Level 2 – Modification or Alteration of contributing resource	
Date submitted for architectural review: _____ Reviewing architect and affiliation: _____ Results: <input type="checkbox"/> No effects <input type="checkbox"/> Adverse effects – Treatment/mitigation required Date submitted to SHPO: _____ SHPO concurrence: <input type="checkbox"/> Yes <input type="checkbox"/> No Comment: _____	
Level 3 – Documentation of irreversible/untreatable adverse effects	
Documentation type: <input type="checkbox"/> HABS <input type="checkbox"/> HAER <input type="checkbox"/> Other Comment: _____	
Report and Routing	
Attached: <input type="checkbox"/> Architectural review report <input type="checkbox"/> SHPO correspondence <input type="checkbox"/> HABS/HAER documentation	
Routing: <input type="checkbox"/> Annual HPMP <input type="checkbox"/> _____ <input type="checkbox"/> _____	
Date Completed _____	CRC Initials _____