March 4, 2022

OFFICIAL RESPONSE TO SIGNIFICANT ENVIRONMENTAL POINTS RAISED DURING THE TIMBER HARVESTING PLAN EVALUATION PROCESS

FROM THE DIRECTOR OF THE CALIFORNIA DEPARTMENT OF FORESTRY AND FIRE PROTECTION (CAL FIRE)

TIMBER HARVESTING PLAN (THP)No:	1-20-00218-MEN
SUBMITTER:	Mendocino Redwood Company LLC
COUNTY:	Mendocino
END OF PUBLIC COMMENT PERIOD:	December 27, 2021
DATE OF RESPONSE AND APPROVAL:	March 4, 2022

The California Department of Forestry and Fire Protection (CAL FIRE) serves as the lead agency in the review of Timber Harvesting Plans. These plans are submitted to CAL FIRE, which directs a multidisciplinary review team of specialists from other governmental agencies to ensure compliance with environmental laws and regulations. As a part of this review process, CAL FIRE accepted and responded to comments, which addressed significant environmental points raised during the evaluation of the plan referenced above. This document is the Director's official response to those significant environmental points, which specifically address this Timber Harvesting Plan. Comments, which were made on like topics, have been grouped together and addressed in a single response. Remarks concerning the validity of the review process for timber operations, questions of law, or topics and concerns so remote or speculative that they could not be reasonably assessed or related to the outcome of a timber harvesting operation, have not been addressed.

DS

Sincerely,

DocuSigned by:

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James Strong
Forester II, Forest Practice
RPF #2689

PROFESSIONAL FORESTER
JAMES STRONG
No. 2689
STATE OF CALIFORNIA

cc: RPF, Unit, File; Timber Owner, Timberland Owner and/or Submitter
CP, CDFW, DPR, & RWB

through https://caltreesplans.resources.ca.gov/caltrees/caltrees.aspx

PUBLIC NOTIFICATION

To inform the public of this proposed Timber Harvesting Plan (THP) and determine if there were any concerns with the plan the following actions were taken:

- Notification of the receipt of a timber harvesting plan was sent to the adjacent landowner(s).
- Notice of the receipt of the plan was submitted to the county clerk for posting with other environmental notices.
- Notice of the plan was posted at the Department's local office and also at the regional office in Santa Rosa.
- Notice of the receipt of the THP was sent to those organizations and individuals on the Department's list for notification of plans in the county.
- A “Notice of the Intent to Harvest Timber” was posted near the plan site.

THP REVIEW PROCESS

The laws and regulations that govern the Timber Harvesting Plan review process are found in Statute law in the form of the Forest Practice Act which is contained in the Public Resources Code (PRC) and Administrative law in the rules of the Board of Forestry and Fire Protection (the Forest Practice Rules) which are contained in the California Code of Regulations (CCR).

The Forest Practice Rules are lengthy in scope and detail and provide explicit instructions for permissible and prohibited actions that govern the conduct of timber operations in the field. The major categories covered by the rules include:

- Timber Harvesting Plan contents and the Timber Harvesting Plan review process
- Silvicultural methods
- Harvesting practices and erosion control
- Site preparation
- Watercourse and lake protection
- Hazard reduction
- Fire protection
- Forest insect and disease protection practices
- Coastal Commission Special Treatment Areas
- Use, construction and maintenance of logging roads and landings
- County-specific rules

When a THP is submitted to the Department, it undergoes a multidisciplinary review consisting of several steps. In addition to CAL FIRE, the Review Team members include representatives of the California Department of Fish and Wildlife (CDFW); the appropriate Regional Water Quality Control Board (RWQCB or RWB); California Geological Survey (CGS); the Department of Parks and Recreation (DPR); the appropriate County Planning office; and if within their jurisdiction, the Coastal Commission (CC) (14 CCR §1037.5(a)). Once submitted the Director determines if the plan is accurate, complete, and in proper order, and if so, files the plan (14CCR §1037). In addition, the Review Team determines whether a Pre Harvest Inspection (PHI) is necessary, and what areas of concern are to be examined during the inspection (14 CCR §1037.5(g)(1)).

If the plan is accepted for filing, and a PHI is determined to be needed, a field review is conducted to evaluate the adequacy of the THP. All agency personnel who comprise the multidisciplinary Review Team are invited to attend the PHI as well as other experts and agency personnel whom the Department may request. During this field review, additional mitigation and/or recommendations may be formulated to provide greater environmental protection. These recommendations are forwarded to the RPF along with the Review Team member's PHI Report. The RPF will respond to the recommendations made and forward these to the Region office and Second Review Team Chair.

A Second Review Team meeting is held where members of the multidisciplinary Review Team meet to review all the information in the plan, and develop a recommendation for the Director (14 CCR §1037.5(g)(2)). Prior to and/or during this meeting they examine all field inspection reports, consider comments raised by the public, and discuss any additional recommendations or changes needed relative to the proposed THP. These recommendations are forwarded to the RPF. If there are additional recommendations, the RPF will respond to each recommendation, and forward their responses to the regional office in Santa Rosa.

The representative of the Director of the Department reviews all documents associated with the proposed THP, including all mitigation measures and plan provisions, written correspondence from the public and other reviewing agencies, recommendations of the multidisciplinary Review Team, and the RPF's responses to questions and recommendations made during the review period. Following consideration of this material, a decision is made to approve or deny a THP.

If a THP is approved, logging may commence. The THP is valid for up to five years, and may be extended under special circumstances for a maximum of two more years, for a total of seven years.

Prior to commencing logging operations, the Registered Professional Forester must meet with the licensed timber operator (LTO) to discuss the THP (CCR §1035.2); a CAL FIRE representative may attend this meeting. The Department makes periodic field inspections to check for THP and rule compliance. The number of inspections depends upon the plan size, duration, complexity, and the potential for adverse impacts. Inspections include but are not limited to inspections during operations pursuant to Public Resources Code (PRC) section 4604, inspections of completed work pursuant to PRC section 4586, erosion control monitoring as per PRC section 4585(a), and stocking inspection as per PRC section 4588.

The contents of the THP, the Forest Practice Act, and rules, provide the criteria which CAL FIRE inspectors use to determine compliance. While the Department cannot guarantee that there will be no violations, it is the Department's policy to vigorously pursue the prompt and positive enforcement of the Forest Practice Act, the Forest Practice Rules, related laws and regulations, and environmental protection measures that apply to timber operations on non-federal land in California. This enforcement is directed primarily at preventing forest practice violations, and secondarily at prompt and adequate correction of violations when they occur.

The general means of enforcement of the Forest Practice Act, the rules, and other related regulations range from the use of violation notices, which require corrective action, to criminal proceedings through the court system. Timber operator and Registered Professional Forester licensing action may also be pursued. Most forest practice violations are correctable and the

Department's enforcement program assures correction. Where non-correctable violations occur, criminal action is usually taken. Depending on the outcome of the case and the court in which the case is heard, some sort of environmental corrective work is usually done. This is intended to offset non-correctable adverse impacts.

Once harvesting operations are finished, a completion report must be submitted certifying that the area meets the requirements of the rules. CAL FIRE inspects the area to verify that all aspects of the applicable rules and regulations have been followed, including erosion control work. Depending on the silvicultural system used, the stocking standards of the rules must be met immediately or in certain cases within five years. A stocking report must be filed to certify that the requirements have been met.

FOREST PRACTICE TERMS

CAL FIRE	Calif. Dept. of Forestry & Fire Protection	NCRWQCB	North Coast Regional Water Quality Control Board
CCR	California Code of Regulations	PHI	Pre-Harvest Inspection
CDFW	California Department of Fish and Wildlife	PRC	Public Resources Code
CEQA	California Environmental Quality Act	RPF	Registered Professional Forester
CGS	California Geological Survey	THP	Timber Harvesting Plan
DBH/dbh	Diameter at Breast Height	WLPZ	Watercourse & Lake Protection Zone
MRC	Mendocino Redwood Company	TMDL	Total Maximum Daily Loads
LTO	Licensed Timber Operator	MSP	Maximum Sustained Production of High Quality Timber Products
FPR	Forest Practice Rules	CALTREES	CAL FIRE's publicly available online database for harvesting permits
DPR	Department of Pesticide Regulation (same as CDPR)	SOD	Sudden Oak Death
CDPR	California Department of Pesticide Regulation	WLPZ	Watercourse and Lake Protection Zone
NSO	Northern Spotted Owl	BA	Basal Area

[sic] Word used verbatim as originally printed in another document. May indicate a misspelling or incorrect word usage

BACKGROUND

Timber Harvesting Plan (THP) # 1-20-00218-MEN "Russel Brook" proposes to harvest timber on 993 acres of Mendocino Redwood Company LLC (MRC) timberland using the Group Selection, Selection, Rehabilitation, and Variable Retention silvicultural methods. The THP was received by CAL FIRE on December 22, 2020, accepted for filing on January 29, 2021, and a Preharvest Inspection (PHI) was conducted on February 24, 2021. Attendees on this PHI included:

- Ben Hawk, Sal Chinnici, Dave Manning, Dave Ulrich, Scott Kirkman (MRC)
- Kevin Doherty (CGS)
- Adam Hutchins (CDFW)
- Ben Harris (CAL FIRE Archeologist)
- Mitch Bosma, Mike Orme (CAL FIRE Inspector)
- Jacob Harrower (RPF)

On February 23rd, 2021 a PHI site visit was conducted by Stacy Stanish, (CAL FIRE Senior Environmental Scientist).

On June 15th, 2021, a focused PHI was conducted with Adam Hutchins (CDFW), Mike Orme (CAL FIRE Inspector), Jacob Harrower (RPF), and Clint Doucette (MRC).

The Final Interagency Review (aka Second Review) occurred on August 13, 2021 which generated thirteen recommendations. The RPF responded to these recommendations on August 27. 2021. Another Second Review meeting occurred on September 22, 2021. The Second Review Chair requested five revisions to the THP during the meeting. The RPF responded to those recommendations on October 6, 2021 and the Second Review Chair accepted the revisions. Some additional revisions were sent in by the RPF on December 15, 2021. The public comment period then ended on December 27, 2021.

The initial deadline for the Director's Determination Deadline (DDD) was set for January 13, 2022 per 14 CCR § 1037.4. Multiple extensions were granted extending the DDD to March 4, 2022 in order to address public comments, generate the Official Response (OR) to concerns brought up by the public, and evaluate the Plan for final approval.

PUBLIC COMMENT SUMMARY

During the public comment period for this THP as described above, there were 544 public comment letters received at the CAL FIRE Region Headquarters in Santa Rosa. Of the 544 public comments, 534 of them were an identical form letter. This left 10 other public comments. These public comments brought up concerns that are addressed in this Official Response (OR). General concerns are grouped by subject matter and followed by the Department's response. Original text taken directly from the public comments, rules, reports, or the THP are presented as italicized text. Words that are emphasized in responses have underlined font. Unique individual concerns from a public comment letter are addressed after the general concerns immediately following that comment along with referencing any general comment responses that may be associated with that response. The public comments are identified with the CAL FIRE "PC" code. Additionally, one public commentor submitted to CalTREES nearly 100 various studies, technical papers, policy papers, reference materials and memorandums. These reference materials did not elicit an official response as no concerns were raised. A copy of the original letters sent to the Department are viewable through the Department's online Forest Practice Database CalTREES.

CalTREES instructions: navigate to https://caltreesplans.resources.ca.gov/caltrees/caltrees.aspx Click the search icon at the top of the page, then type the Plan # in the Record Number box (county identifier not needed). Under the Document Number column, select the Plan Number for the "Timber Harvest Plan" Type. Below the "Record Details" should be a list of attachments for the Plan. (Note: if there are a substantial number attachments, or attachments with large file sizes, it may take some time to load). The Public Comments are labeled under "Record Type" and are in pdf format, usually with a "PC" label.

SUMMARY OF SIGNIFICANT ENVIRONMENTAL GENERAL CONCERNS WITH RESPONSES

1. Tan Oak Reduction.

Letters expressed general concerns about the impacts and danger of Tan Oak reduction and removing the tree forest.

RESPONSE: The THP indicates that Group B species, such as Tan Oak, need to be reduced to maintain relative site occupancy of Group A species on page 13, item 14(f). The need for herbicides will be made post-harvest and likely after completion of timber operations. Their use will depend on post-harvest hardwood sprouting, extent of mechanical and/or prescribed fire site preparation, and natural and artificial reforestation success. THP page 13 states that herbicide could potentially be used in the Variable Retention, Rehabilitation areas as well as the Group Selection areas following timber operations. Additionally, page 13 states that only Tan Oak under 24" DBH are eligible for treatment. There is no indication that herbicides would be used within RMZs. The CAL FIRE PHI report, page 3, item 13 confirms this and states:

> *Group B species management proposed will utilize a variety of treatment method options to ensure Group A species will not be reduced relative to Group B species. A substantial component of Tan Oak exists in many of the stands throughout the THP area. The treatment options proposed are suitable for managing these conditions. If applied as described these treatment methods will likely be successful in reducing Group B species relative to Group A species.*

Tan Oak reduction is common goal and need that must be addressed for effective forest management on the North Coast. As group A species are removed to provide a renewable natural resource to the public, Tan Oak, which has a limited commercial value, needs to be addressed from a land management perspective. Page 16 of the THP proposes to use site preparation techniques within the logging area post-harvest. These techniques outlined on page 16 include, mechanical crushing, ripping, raking and piling, brush cutting, pile burning, broadcast burning, hand cutting and thinning. While the public comment seemed primarily concerned with Tan Oak reduction through chemical treatment, this is only one method of treatment. The other treatments are all proposed in the THP as a comprehensive effort to ensure that fire resilient, carbon sequestering, group A species continue to thrive and grow in a productive manner without the competition for water and nutrients from Tan Oak. The RPF is legally obligated by the Forest Practice Rules and bound by his or her license as an RPF to follow 14 CCR 913 and 913(a) which states the following:

> *The objectives of this article are to describe standard silvicultural systems and to provide for alternatives that when applied shall meet the objectives of the FPA (PRC 4512 and 4513). The RPF shall select systems and alternatives which achieve maximum sustained production of high quality timber products. The THP shall designate one or a combination of regeneration methods, prescriptions or intermediate treatments described by this article. If a method, prescription or treatment not defined in the Rules (see 14 CCR 895.1) is to be used, an alternative prescription shall be included in the plan. The assessment of maximum sustained production of high quality timber products is based on:*

> ***(a)*** *Regeneration methods, intermediate treatments and prescriptions described in the Rules which establish standards. These methods, treatments, prescriptions, and standards shall not be utilized to permit harvesting of growing stock in a manner that will significantly delay reaching or maintaining maximum sustained production. (emphasis added)*

CAL FIRE has conducted a field review of the timber stands where Tan Oak reduction may occur and finds hardwood reduction to be potentially necessary and appropriate. CAL FIRE has evaluated the potential herbicide use as it pertains to cumulative watershed and biological effects. We have concluded that adherence to State and Federal laws pertaining to certifications and operations will prevent significant effects.

2. GENERAL CONCERN: Tan Oak Treatment.

Letters expressed general concerns about the method of Tan Oak reduction through the use of herbicide treatment.

RESPONSE:

As stated in the previous response to General Concern 1, Tan Oak reduction is common goal and need that must be addressed for effective forest management on the North Coast. As group A species are removed to provide a renewable natural resource to the public, Tan Oak, which has a limited commercial value, needs to be addressed from a land management perspective. Page 16 of the THP proposes to use site preparation techniques within the logging area post-harvest. These techniques outlined on page 16 include, mechanical crushing, ripping, raking and piling, brush cutting, pile burning, broadcast burning, hand cutting and thinning. While the public comment seemed primarily concerned with Tan Oak reduction through chemical treatment, this is only one method of treatment. The other treatments are all proposed in the THP as a comprehensive effort to ensure that fire resilient, carbon sequestering, group A species continue to thrive and grow in a productive manner without the competition for water and nutrients from Tan Oak. The RPF is legally obligated by the Forest Practice Rules and bound by his or her license as an RPF to follow 14 CCR 913 and 913(a). (See response to General Concern 1)

CAL FIRE has a responsibility under CEQA to look for significant effects on the environment that could result from the approval of a THP. Since herbicide use is one of the activities that, under some circumstances, can cause a significant effect in connection with a THP, CAL FIRE is compelled to consider potential effects. The key CEQA element lies in the determination of whether there is a reasonable expectation of significance.

Herbicide use in the general location of a THP may be either a part of the THP or a separate but related activity that is not controlled by the THP. Where the herbicide use is described in the THP as an integral part of the timber operations, CAL FIRE will need to review the herbicide use and its possible environmental effects. CAL FIRE will determine whether the proposed use would be consistent with the label and the registration limitations and whether DPR's lead agency determination of significance will still apply. CAL FIRE will also need to check for significant new

information showing changes in circumstances or available information that would require new environmental analysis. Significant new information should be referred to DPR for that department's analysis as part of its ongoing evaluation program. CAL FIRE reviewers should look for simple and practical ways to avoid or mitigate potential new significant effects on the environment. Effects of herbicides proposed as part of the THP would be considered direct effects of the THP.

CAL FIRE believes that where herbicide use is related to the THP but not a part of the THP itself, the environmental effects would be regarded as indirect effects of the THP. The landowners may have ongoing management activities that may occur before a THP is approved, during operation of the THP, and after expiration of the THP when CAL FIRE's inspection authority has lapsed. The use is subject to independent, intervening decisions of the timberland owner, a pest control advisor, and in the case of restricted herbicides, the county agricultural commissioner, and these independent decisions may lead to no herbicide use at all or a use differing from predictions in a THP. CAL FIRE would not know whether in fact the timberland owner would use herbicides at all, which ones the owner may use if any, what restrictions the pest control advisor may recommend, and, in the case of restricted herbicides, what conditions the county agricultural commissioner may impose. Outside of the THP, CAL FIRE has only general information about possibilities. Even if the timberland owner provides herbicide use plans to CAL FIRE with a THP, the use plans may well be changed by the county agricultural commissioner if the timberland owner intends to use a restricted herbicide.

Cumulative impacts due to herbicide use related to different THPs are generally not significant when THP's are separated in time and distance so that their individual effects do not reinforce or interact with each other. Herbicide use may occur a year or two before a THP begins, then possibly two to five years after operations are complete to reduce competition with small seedlings, or later to release the young trees from competition with brush.

The project proponent has proposed potential use of herbicides in accordance with Federal and State labeling and under the CEQA certified regulatory program administered in California by CDPR. The County's agricultural commissioner oversees portions of the DPR's functional equivalent program and is designated as a state agency for the purposes of certification (3 CCR 6100(a)(7)). Detailed records are kept on any pesticide application. This information is tracked by DPR and is available to the public.

Prior to commercial application of any herbicides proposed in the plan, MRC must comply with CDPR's process that requires additional site-specific analysis. The analysis takes the form of a written recommendation for herbicide use prepared by a licensed Pest Control Advisor (PCA). MRC must use contractors that are supervised by Licensed Qualified Applicators. Pages 109 through 111 of the THP discuss MRC's approach under the heading "e) Chemical Contamination Effects". The entire discussion is informative but the bottom of page 109 states the following:

> *Chemical treatments are only one component of the integrated pest management (IPM) program used to control competing vegetation in MRC's forests. IPM is a systematic approach that uses a variety of techniques to reduce unwanted vegetation to economically, socially, and professionally tolerably level. IPM programs also include the use of mechanical and biological techniques.*

MRC works with all contractors to ensure applications are conducted in a professional manner that strictly follows all regulatory and licensing requirements.

CAL FIRE has conducted a field review of the timber stands where potential herbicide treatment may occur and finds hardwood reduction to be potentially necessary and appropriate. CAL FIRE has evaluated the potential herbicide use as it pertains to cumulative watershed and biological effects. We have concluded that adherence to State and Federal laws pertaining to certifications and operations will prevent significant effects.

3. GENERAL CONCERN: Tan Oak Treatment kills a tree already threatened by SOD

The concern alleges that Tan Oak reduction is a bad idea and unnecessary because SOD is threatening Tan Oak already.

RESPONSE: SOD is a tree disease caused by a fungus-like plan pathogen Phytophthora ramorum. A map of SOD occurrences is readily available on the internet, but the disease is largely along the west coast of northern California. Measures to limit the spread of SOD are in the THP, as they are in all THPs currently active. Section II, Item 15 of the THP (pages 18.1 and 18.2) addresses SOD and states “there are no visible signs within this THP area”. Numerous mitigation and preventive measures are outlined on this page.

While SOD is a concern, Tan Oak is generally a tree species that establishes itself due to poor regeneration methods after harvest. Tan Oak is abundant in Humboldt and Mendocino County and treatment of it, so that the original native trees species occupying the area can reestablish itself, is required to maintain relative site occupancy. Tan Oak, due to its ability to coppice and its relatively low economic value compared to conifer, has been a challenge to timberland owners and timberland managers for decades. If appropriate measures are not taken after harvest, the tree will quickly establish itself as the primary tree species in the area due to its ability to exploit and occupy the growing space left from the harvested conifer species.

Additionally, Tan Oak is considered a fire hazard when compared to the alternative of a conifer dominated stand. The commenter suggests that treatment of Tan Oak creates a fire hazard of dead trees. This is of course true on the short term, as any treatment of brush or brush like species will temporarily create dead material while it is being treated. When stands dominated by Tan Oak catch fire, the results are usually difficult to control. A conifer dominated stand that is well stocked and managed will naturally create a far more fire-resistant stand.

Specific to this THP, pre and post-harvest basal areas are provided on pages 89-90.6. 14 CCR 1034 (m)(1) requires the THP to provide pre and post-harvest volume, growth projection, stocking and species composition. Basal area is metric foresters often use due to ease with which it can be obtained and its strong correlation to volume. This THP shows on pages 89-90.6 how Tan Oak is expected to reduce from the various silvicultural methods. This data reflects how, although overall Tan Oak volume will be reduced by the project, it will not be reduced as much as the conifer species are proposed to be reduced. This is perhaps a clear indicator of the need for the continual and ongoing Tan Oak treatments that land managers face in order to maintain MSP of group A species.

In conclusion, Tan Oak is abundant in the Mendocino County, poses a real fire hazard, and well-planned treatments do not currently pose a threat to the existence of Tan Oak, despite the existence of SOD.

CAL FIRE has evaluated the potential herbicide use as it pertains to threats to the existence of Tan Oak. We have concluded that adherence to State and Federal laws pertaining to certifications and operations will prevent significant effects.

4. GENERAL CONCERN: Measure V

There is a concern that MRCs hardwood treatments are in violation of measure V, a local Mendocino County Ordinance.

RESPONSE: Page 13 of the THP states that group B species will need to be reduced to maintain relative site occupancy of group A species. Group A and B species are defined in the FPR's. Tan Oak is a group B species that aggressively will occupy a site without proper treatment or management due to its ability to coppice and occupy growing space. Treatment of these species generally has a long-term beneficial impact to the landscape as it allows conifer species to grow, lending to long term fire resistance, carbon sequestration, MSP, and NSO habitat to name a few.

The hardwood treatments proposed under this THP are appropriately authorized.

5. GENERAL CONCERN: Sediment and Temperature TMDL Impacts to Big River Watershed

Letters expressed concern that timber operations would lead to significant temperature and sediment impacts. The comments were general in nature and did not specifically indicate what portions of the Plan were inadequate or would lead to significant adverse effects.

RESPONSE: The THP drains to the Big River, which is a 303(d) listed for sediment and temperature. The Plan proposes 425 acres of Group Selection, 72 acres of Selection, 163 acres of Rehabilitation, and 333 acres of Variable Retention utilizing tractor and cable yarding. Tractor yarding is limited to gentler slopes. The plan outlines 9 points on pages 107-108 to reduce, mitigate or avoid sediment production. Sediment impacts could occur due to sediment transport from roads into watercourses, activation of slides, and disturbance of soils near watercourses. The Plan seeks to minimize the potential for these issues by:

- Comply with the Anadromous Salmonid Protection (ASP) rules which provide WLPZ buffers on all Class I and Class II watercourses and equipment limitation zones on Class III watercourses.
- Soil disturbance on steep slopes is minimized by using modem cable yarding harvest systems.
- Existing and potential sediment production sites have been identified and corrective action proposed, as detailed in the Erosion Control Plan (ECP).
- A professional geologic evaluation has provided mitigation measures for operations near unstable areas.

The THP includes an Erosion Control Plan (ECP) in THP Section V, pages 187-192. The ECP documents an inventory, prioritization, and proposed treatment of potential Controllable Sediment Discharge Sources (CSDS) in the plan area. This plan has 14 CSDS's, which were reviewed by the review team agencies, including CAL FIRE, NCRWQCB, CGS, and CDFW during the PHI. The identification and inventory of these sources shows how the current road system will be upgraded for long-term decrease in erosion to the watershed.

The THP addresses roads under item 24 of the THP. The Plan proposes to build 4,700' of new seasonal road. The FPRs require that all roads be maintained during the life of the THP as well as 3 years after completion of operations.

The CGS report, starting on page 4, discusses the inner gorge slopes that exist within the Class I watercourses and states the following regarding marked trees within the inner gorges:

> *The mark appeared very light which appears designed to retain a significant component of the existing canopy and root function, appears adequate to minimize adverse impacts to slope stability and resultant sediment deliver and appears to for follow the forest Practice Rules regarding harvesting above inner gorge slopes.*

The CGS had other recommendations surrounding road points, and unstable features that were all addressed. A Geology Report was written, page 186.1 of the THP, on April 29th, 2021 as a result of a CGS PHI recommendation. This geology report was completed by a professional geologist (PG) and, while partially to verify that all the unstable features had been identified, it was also to "minimize the potential for landslide derived sediment delivery to nearby watercourses…"

The Geology Report made numerous recommendations, all of which were incorporated into the THP, and many of which "recommended higher timber retention where risk of sediment delivery to resources related to landslide hazards were identified within and adjacent to the plan area. "

Sediment may also enter the watershed via the watercourse system. The RPF has mapped all watercourses within the THP area. During the PHI, the review team inspected a sample of the watercourses. The PHI team found the watercourses were appropriately identified and protection measures were consistent with the FPRs. The RPF utilized the WLPZ standards consistent with the Anadromous Salmonid Protection (ASP) rules. The 2009 ASP rules were developed to ensure rule adequacy in protecting listed anadromous salmonid species and their habitat, to further opportunities for restoring the species' habitat, and to ensure the rules are based on credible science. The THP implements these minimum standards. According to the CAL FIRE PHI report, page 13, item 75, the CAL FIRE inspector reported the following:

> *The RPF has described Russell Brook Creek as water quality limited or "impaired" from temperature effects under the Section 303(d) listing. A reasonable assessment of the impacts of the proposed timber operation in combination with the existing impairment of beneficial uses is provided in the Watershed Resources Cumulative Effects Assessment contained in THP Section V.*

The proposed silviculture system also provides an additional buffer to the watercourse system because of the additional tree canopy retention and surface cover remaining post-harvest. The

residual stand intercepts rainfall and provides a more intact surface cover, especially in the cable yarding areas where exposed soil is minimized.

The THP also includes soil stabilization measures under item 18 of the THP. These measures ensure that exposed soil is treated to prevent erosion, roads and landings are maintained for proper drainage, and skids trails are treated. The completion of these activities minimizes soil erosion. Soil stabilization in combination with the WLPZ standards provides a sediment buffer to streams.

Stream temperatures are a result of a complicated ecosystem process including forestry, geology and hydrology. Shade from WLPZs moderates stream temperatures through retention of stream canopy. Excessive removal of riparian canopy could lead to excessive summer temperatures that may be lethal to aquatic invertebrates and fish. The effect on winter water temperatures is usually less pronounced due to reduced solar radiation during the winter and cooler temperatures. The retention of WLPZs even along clearcut units has been found to be effective in shading the streams. The amount of shade canopy and distance of WLPZs increases as the watercourse classifications change. For example, small class III watercourses that are capable of transporting sediment during the winter require less shade canopy due to their small stream size and intermittent nature. Class II watercourses, which support non-fish aquatic life, require more shade canopy and wider buffers. Class I watercourses, which support fish habitat, require the widest buffers with the highest shade canopy. The ASP rules were established based on scientific review and have established WLPZs that maintain current stream temperatures through shade canopy requirements.

The THP discloses numerous class I, II and III watercourses. These watercourses have protection measures outlined on pages 51-52 of the THP. In addition to the effects of canopy retention on stream temperature, groundwater and bank storage contributes to stream flow and is not subject to changes in temperature from canopy cover.

Given the protection measures on the THP and the field observations made on the PHI, CAL FIRE determined that sediment and temperature impacts have been mitigated and the proposed timber operations are appropriate based on the entirety of the Plan.

6. GENERAL CONCERN: Northern Spotted Owl Impacts

Letters expressed concern that NSOs were not being protected and that attachment A guidelines were not being followed properly.

RESPONSE: Section II Item 32 starting on page 63 of the THP contains detailed enforcement language for the protection of NSO, followed by many pages in Sections III and Section V providing the appropriate supporting surveys, analysis and documentation to avoid take of NSO. The Department of Fish and Wildlife was a part of the Plan review and had no unmitigated concerns for the protection of NSO.

Specific to this THP, there were three NSO activity centers (MEN0069, MEN0068 and MEN0067) within .7 miles of the THP boundary (page 198). Pages 63-66 of the THP provide to the LTO

operational protection measures and key definitions. On page 12 of the PHI report the CAL FIRE inspector concluded the following in regard to NSO:

a. NSO habitat definitions used in the Plan accurately reflect vegetation conditions.
b. The retained habitat quantities depicted on the Plan maps were accurate.
c. Protection measures for the NSO activity center(s) appear adequate and in conformance with the rules.
d. NSO survey call points distribution and location were adequate.

The inspector stated the following in his PHI report:

> *THP habitat typing information was reviewed and spot-checked during the PHI for accuracy. See CDFW recommendation adding nesting roosting habitat within 1000-feet to bring the core up to at least 100-acres of suitable habitat. The habitat typing appeared otherwise acceptable and consistent with descriptions provided in 14 CCR 895.1 for "Functional Nesting, Roosting & Foraging Habitat".*

CDFW did have concern regarding the proposed NSO core area for MEN0067, the concern was addressed and CDFW had no further concerns regarding the issue. CAL FIRE Senior Environmental Scientist - Forest Practice Biologist, Stacy Stanish conducted a site visit prior to PHI on 02/23/2021. CAL FIRE has determined that the THP complies with 14 CCR 919.9(e) of the California Forest Practice Rules and the USFWS Attachment A guidelines. Lastly, below is a letter from the Director of CAL FIRE to Mr. Simmons from May of 2021. It carefully addresses Mr. Simmons' assertions then and now. The subject can be confusing to both the public and the professional. The letter is included in its entirety due to its applicability, relevance and conclusory nature regarding the relationship surrounding the NSO, attachment A, USFWS, CAL FIRE and the public comment received for this THP.

> *May 11, 2021*
>
> *Matt Simmons*
> *Environmental Protection Information Center*
> *145 G Street, Suite A*
> *Arcata, CA 95521*
>
> ***Subject: Response to letter of concern regarding Northern Spotted Owl (NSO) nest site protections in timber harvesting plans.***
>
> *Dear Mr. Simmons:*
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> *California Department of Forestry and Fire Protection (CAL FIRE) received your letter of concern regarding NSO nest site protections and the approval of timber harvesting plans (THPs) dated April 2, 2021. Under the California Forest Practice Act, CAL FIRE is the lead agency for reviewing THPs, as well as non-industrial timber management plans and working forest management plans. In this lead agency role, CAL FIRE is required to ensure that "take" of listed and sensitive species, and significant impacts to those*

species, are avoided. Your letter makes assertions regarding the use of 14 CCR § 919.9(e) by plan submitters, the acceptance by CAL FIRE of plans that state the use of 14 CCR § 919.9(e), and the protection of NSO Activity Centers as outlined in the 2019 revision of Attachment A.

History of NSO Review and Guidance

In addition to the best available science, CAL FIRE utilizes a number of resources to make its determinations that NSO take has been avoided, including those required by law and those that are guidance. The majority of the available guidance is provided by the United States Fish and Wildlife Service (USFWS). Guidance involves best management practices that have not been codified in rule or regulation and therefore cannot be applied as such.

Since NSO was first listed as a threatened species under the federal Endangered Species Act in 1990, CAL FIRE has worked closely with the USFWS and California Department of Fish and Wildlife (CDFW) to ensure the avoidance of take and significant impacts to the species that could result from timber harvests on private land in California. In the over thirty years since the NSO listing, Forest Practice Rules have been developed through the California Board of Forestry and Fire Protection with guidance provided by the USFWS. As new information was provided through NSO surveys, and the best available science evolved, additional guidance and rules were developed and employed within the review process through public discourse and interagency collaboration.

As stated in the 1999 "Regulatory and Scientific Basis for US Fish and Wildlife Service Guidance for Evaluation of Take for Northern Spotted Owls on Private Timberlands in California's Northern Interior Region," CAL FIRE requested that the USFWS review timber harvesting plans for take avoidance by providing Technical Assistance. In 2008, the USFWS informed CAL FIRE that they would no longer provide Technical Assistance to project proponents, effectively leaving the responsibility of NSO review to CAL FIRE To support CAL FIRE in this responsibility, the USFWS provided a series of guidance documents, including "NSO Take Avoidance Scenarios and Attachments A and B." The USFWS also remains available to CAL FIRE for Technical Assistance upon request.

In the May 22, 2008 memo to CAL FIRE's then Director Grijalva, USFWS states:
…the guidelines describe how the USFWS determines when take is likely at a course (sic) scale. That is, without any site-specific information, the guidelines outline the general methods that the Service employs to determine if take is likely. As stated in the guidelines, 'while we believe [the guidelines are] the most effective manner in avoiding take, it is likely not the only manner in which take can be avoided."

"We encourage your staff to adopt a similar approach in assessing THPs, as there are many instances when site-specific conditions provide insights that the guidelines cannot capture by virtue of their broad nature in describing the likelihood of take. The guidelines were not intended to be a hard rule for when take is likely; they simply describe how we evaluated the likelihood of take in a general manner.

In a January 20, 2009 memo to CAL FIRE Review Team Chair Leslie Markham, the USFWS confirmed that due to budget and staffing limitations, they would no longer provide NSO Technical Assistance for new Plans. This memo noted the necessary training workshops and guidelines had been provided such that CAL FIRE would make "'No Take' determinations for most THPs" going forward.

The current version of Attachment A guidance from the USFWS (2019) reaffirms the previous direction to utilize the documents as guidance and to, "…assess each THP in light of site specific conditions and under the broader context of the guidelines provided." (emphasis added).

Use of Forest Practice Rule 14 CCR § 919.9(e)
You assert in your letter that the RPF violates the Forest Practice Rules by indicating compliance with 14 CCR § 919.9(e) without obtaining Technical Assistance from USFWS and that when proposing alternative practices to Attachment A, 14 CCR § 919.9(g) should be selected.

The intent for the use of 919.9(g)[939.9[g] was to apply specific performance standards to known owl sites within 1.3 miles of the plan area.

In 2008 the USFWS informed CAL FIRE the agency would no longer provide technical assistance for NSO. As part of that transition, Attachments A and B, take avoidance scenarios, and other Technical Assistance guidance was provided to the regulated public and to CAL FIRE. Attachment A was provided by the USFWS as Technical Assistance to forest practitioners in the redwood forest type of the Coast Forest District. It was conveyed to practitioners during training that plans submitted under 14 CCR 919.9(e) generally comply through use of USFWS No Take Scenarios 1 – 4. Notwithstanding, CAL FIRE reviews all plans regardless of which take avoidance strategy is being utilized to ensure take of NSO is avoided as the Plan is proposed.

Use of Attachment A with explanation and justification of site specific NSO protection measures, is appropriate under 14 CCR 919.9(e).

Protection of NSO Activity Centers
You cite language from the USFWS Attachment A (2019), Section II, regarding the accuracy of activity center location and mapping. You are correct that Attachment A declares multiple activity centers for an NSO home range are possible and further states, "…if one core use area does not encompass all known activity centers (current and historical) then multiple core use areas will need to be mapped and protected." CAL FIRE also refers to the definitions in Attachment A where Activity Center is defined as:

A mapped point located at the highest-ranking detection for each breeding season (e.g., nest, then daytime pair, then daytime single, etc.) at an area of concentrated activity. Activity centers occur within, but not necessarily in the exact center of, the "core use area," defined below. An NSO home range may have multiple mapped activity centers, and multiple activity centers may need protection to prevent take. Generally, single nighttime detections where an owl cannot be located during adequate daytime follow-ups should not be considered a valid

activity center. All activity centers within a home range should be identified, mapped, and considered, however, not all activity centers are of equal value and site-specific information may be useful in determining which activity centers require more or less protection on an annual basis as determined by the NSO review agencies. *(emphasis added)*

The Attachment A guidance does not provide for 100-acre core protection for every historic activity center. Project proponents have regularly afforded core area protection measures that encompass areas of concentrated activity that include historic activity centers.

CAL FIRE has historically collaborated closely with the USFWS and CDFW, and will continue this practice to ensure consistent interpretation and application of the guidance documents provided by the USFWS. CAL FIRE shares in your concern regarding the conservation and management of the Northern Spotted Owl and their forest habitats, particularly in the context of the overriding threats from the invasive barred owl, climate change, and catastrophic wildfire.
If you have any further questions, please contact CAL FIRE's Assistant Deputy Director of Forest Practice, Dennis Hall at dennis.hall@fire.ca.gov.

Sincerely,
MATTHEW REISCHMAN
Deputy Director (Acting)
Resource Management

The THP will retain NSO habitat in the THP area and there is abundant NSO habitat in the watershed. CAL FIRE concludes that this THP can reasonably be expected to not result in the take of NSO.

7. GENERAL CONCERN: Climate Change

Letters expressed concern regarding man-made Climate Change; includes Greenhouse gases, carbon sequestration and global warming.

RESPONSE: The THP includes a climate change overview located in Section IV starting at page 138, which describes how proposed operations will impact climate change. A summary of topics covered in this climate change analysis include:

- CEQA analysis related to climate change.
- An analysis on carbon sequestration, emissions and land use resulting from forest management and project effects on climate change.
- Effect of Climate Change on Timberlands

The THP evaluates the effect of ongoing climate change on the future growth and survival rates of natural forest and re-planted areas in the section titled "Effects of Climate Change on Timberlands." This discussion is on page 145.

The THP includes worksheets for each silviculture system on Project Carbon Accounting, which uses the Greenhouse Gas Emissions Calculator (GHG Calculator). The GHG Calculator spreadsheet is a tool intended for use in assessing the short-term and long-term greenhouse gas sequestration and emissions resulting from timber harvest activities. The estimated quantity of carbon sequestration is determined from the estimated growth of trees onsite and from carbon stored in wood products and landfills. The calculation of carbon dioxide emissions include harvested wood that does not end up in wood products or landfills, plus non-biological emissions associated with site preparation, timber falling, yarding, loading, trucking and milling.

Step 7 of the GHG Calculator requires the input of the "Estimated hardwood basal area harvested/treated per acre." This is where the release of greenhouse gas through the herbicidal treatment of hardwoods is accounted for in the THP. The GHG Calculator makes the assumption that when treated trees are left onsite an immediate emission occurs. Starting on page 146 the GHG calculator is provided for each type of silviculture, as well are years until the carbon stocks are recouped after harvest. This information has been reviewed appears reasonable and sound.

There have not been attempts to measure the amount of below ground carbon stored in tree roots as part of this THP. The tree roots are not to be harvested and will be left where they are. Redwoods sprout from the existing root systems and those roots will not only be left in place, they will feed the next generation of trees. Actually measuring the amount of underground biomass would likely create ground disturbances far exceeding the overall timber harvesting plan.

After reviewing the Cumulative Impacts Assessment for global warming in the THP, evaluating the estimates the RPF used in the GHG Calculator, and considering the requirements outlined in the Forest Practice Rules it has been determined that the proposed project as presented will not cause or add to significant cumulative climate change impacts within the assessment area.

8. GENERAL CONCERN: Previously Marked Trees and Prior Mitigation.

Letters expressed concern that large trees, previously protected as mitigation on a previous THP, are being proposed for harvest.

RESPONSE: CDFW addressed the issue in 5 PHI recommendations (recommendations 29-33) on the consolidated PHI report dated June 16, 2021. These recommendations addressed a number of concerns ranging from trees previously marked for retention under a 2004 THP (1-04-107-MEN), large, unmarked trees that should have been marked, and trees previously marked as screen trees. The RPF responded to these recommendations/concerns from CDFW on June 29th 2021. The RPF disagrees with the recommendations and makes the following statement in his response to question 30. He states the following:

> *Trees will be retained for wildlife based on the wildlife tree retention guidelines provided in sec III and MRC's old growth retention policy provided in section II which states that old growth will not be cut. While some of the trees with a "W" are in fact old growth trees, there are some which appear to not be old growth. Ultimately the placement of a "W" during the past THP is irrelevant. Old growth trees will be protected based on the guidelines for old growth tree retention as outlined in Section II of this THP. Screen trees will be chosen at the discretion of the RPF of record on an individual basis based on the Wildlife tree retention*

guidelines provided in section III. There is no FPR requirement to protect screen trees around old growth trees if the stand is not a Late Seral Forest type.

While the word "irrelevant" in the RPF's response is not appropriate, as an old mark can be an excellent guide to an RPF, and should be part of the evaluation of what is to be retained; the presence of old paint alone is not grounds for retention. Second Review for this THP took place on two different dates (August 13, 2021, and September 22, 2021), as the first meeting ran out of time. It was recommended for approval by 2nd Review on October 13, 2021.

In the initial meeting, the Review Team Chair asked to discuss this issue last, but time ran out. It was communicated to CDFW in this first meeting, that it was problematic to expect the landowner to retain any tree that had a blue "W" on it from over 16 years ago, but that another meeting would be scheduled to thoroughly address the issue. After the initial Second Review meeting, CDFW uploaded a document to CAL TREES in what they considered a defense of their position that all trees with an old blue "W" should be retained. This memo, from CAL FIRE Division Chief Alleah Middling, is dated January 26, 2005 and states the following:

The DFG further inquired about the actual longevity of mitigations protected by the Forest Practice Rules... The duration should be determined in response to the potential of the original THP to cause the identified environmental impacts… If the potential adverse effects would be expected to exceed the erosion controls maintenance periods, the Department would determine how long the potential for a significant effect would occur and the THP would need to reflect the duration of the mitigation measure.

The memo speaks for itself stating that CALFIRE is responsible for ensuring that significant effects are avoided when previous mitigation is being revisited on a case-by-case basis. CDFWs concerns regarding the tree species that were delegated for retention due to their potential systemic benefits on numerous levels was uniquely paralleled in their nature and timing, (assumed aleatory) by public commenters, many of whom expressed relational proclivity to CDFW. The CAL FIRE memo posted by CDFW did however prove useful in supporting the Department's position regarding prior mitigation.

Additionally, along with the aforementioned memo, and despite direction given on the August 13th Second Review meeting, that the issue surrounded trees painted with Blue "W" in 2004 would be discussed in a follow up meeting, CDFW uploaded additional questions to CAL TREES. Again, the RPF's previous response on June 29th 2021 to CDFWs original PHI questions surrounding these previously marked trees was not discussed on the first of the Second Review Team meetings due to time constraints. Despite this, CDFW's concerns persisted after the initial Second Review meeting when CDFW asked additional questions of the RPF, outside of the normal Review Team process. After a series of introductory paragraphs CDFW asked the RPF three questions:

1. *Disclose the old growth elements identified in prior THPs (such as the three old growth trees per acre in Unit 9A);*
2. *Retain large old trees identified for retention and protection under prior THPs: and,*
3. *Retain screen trees protecting the large old trees, previously marked for retention and mitigation under prior THPs.*

The RPF provided a response to CDFWs concerns on August 27, 2021 by stating the following:

Those mitigations were part of a planning agreement for the preparation of an NCCP and HCP as well as part of a SORP. Those measures were provided in part to mitigate for other operational flexibilities allowed by the planning agreement and SORP such as continuing operations, one year survey coverage, and the protection of only the three most recent activity centers. That planning agreement is no longer valid and the SORP was terminated by USFWS. Therefore, MRC does not agree with the recommendation. MRC will apply its individual tree old growth policy as found in Section II of the THP.

CALFIRE concurs with nature of this response. Please see revised page 100.2 outlining MRCs Old Growth Policy which adequately protects large old trees with important characteristics beneficial to wildlife. Furthermore, Cal Fire is being consisten with the 2010 ruling of the 4th Appellate Court of California, Katzeff vs California Department of Forestry and Fire Protection, which found that once a mitigation is required for environmental protection it is not cancelled when the THP expires unless there is another CEQA review. 1-20-00218-MEN constitutes another CEQA review.

Due to these mitigations and protection measures, and considering the requirements outlined in the Forest Practice Rules it has been determined that the proposed project as presented will not cause, or add to, significant cumulative impacts within the assessment area, and can reasonably be assumed to adequately consider and protect past mitigation measures.

9. GENERAL CONCERN: Lack of Disclosure of Harvest Activity in Watercourse Protection Zones.

Letters expressed concern that the THP does not properly disclose harvest activity within the Watercourse Protection Zones, or the ensuing impacts to the associated watercourses.

RESPONSE: Page 90.6 of the THP discloses the pre- and post-harvest volumes (per acre) within the WLPZ selection areas of the THP. The table gives these volumes by species with Redwood going from 10 MBF/acre to 7 MBF/acre. This equates to a removal of 30% of the Redwood volume. Item 26 of Section II of the THP, starting on page 50, also describes and details MRC's retention standards within their WLPZ. The plan is in compliance with the FPRs and MRC's Option A in relation to watercourse protection. According to the PHI report, all watercourses have been correctly described and classified. The protection measures within the watercourses have been inspected and determined to be adequate to protect the beneficial uses of water, native aquatic and riparian species, and the beneficial functions of the riparian zone.

The THP also presents a winter period operating plan of the which the inspector states:

The period of operations during the winter period is clearly defined, excluding all operations from saturated soil conditions. Downstream beneficial uses of water will be adequately protected, provided the operator complies with all operational provisions of the winter period operating plan.

Due to these mitigations and protection measures, and considering the requirements outlined in the Forest Practice Rules it has been determined that the proposed project as presented will not

cause or add to significant cumulative impacts within the assessment area, follows the FPRs, and can reasonably be assumed to adequately consider and protect downstream beneficial uses.

10. GENERAL CONCERN: Botany surveys

Letter expressed concern that since botany surveys are forthcoming, they are not reviewable by the public, CDFW has not been appropriately consulted, and therefore this is a violation of CEQA.

RESPONSE: The plan states on page 68 of the THP, "a botanical survey is being completed consistent with Protocols for Surveying and Evaluating Impacts to Species Status Native Plant Populations and Natural Communities (2018)". This amendment must be submitted prior to the start of operations (Section II, Item 31 B. page 68 of the THP), and will be reviewed by resource professionals and determined to be adequate or returned for clarification if proper survey protocols or protections measures were not followed. It is important to conduct these surveys during the appropriate seasonal period to be able to identify plants at critical stages of their life cycle, but also recognize that this timing may be different from the submittal of the THP, hence the submittal of an amendment for rare plant surveys. The THP includes a discussion that details the scoping steps taken in the Plan for rare plants and animals on page 122, and a scoping list for special status plant species including a 9-quad search is located in section IV, pages 134-135. Additionally, this list is supported with a more detailed protection measures in the Plan area on page 68 in Section II of the THP.

On page 9 of the PHI report the CAL FIRE inspector concluded regarding botany that all state or federal listed species present in the Plan area have been accurately disclosed and mitigated.

CDFW had an opportunity to review the botanica information during the review process, including on PHI.

Due to these mitigations and protection measures, and considering the requirements outlined in the Forest Practice Rules it has been determined that the proposed project as presented will not cause or add to significant cumulative impacts within the assessment area and can reasonably be assumed to adequately consider and protect botanical resources.

11. GENERAL CONCERN: MRC has not met its option A trigger in the WLPZs.

Letters expressed concern that MRC has not appropriately met the triggers for selection silviculture within the WLPZs.
RESPONSE: "Option A" is the term used when referencing 14 CCR 913.11(a-c). Option A is one of three ways THP may demonstrate that it is achieving MSP. MRC's Option A was approved in June of 2008.

The harvesting conditions for MRC's option for selection silviculture are as follows:

> *The stand (a discrete geographic unit 30 acres or less) is the spatial basis for determining if the forest unit meets the trigger conditions for the Selection, Group Selection, or Alternative Group Selection silvicultures. The Selection and Group Selection silvicultures*

are initiated if the average conifer basal area stocking exceeds 105 square feet per acre. The Alternative Group Selection Silviculture is initiated if the average conifer basal area stocking exceeds 105 square feet per acre and harvesting of hardwoods will result in greater than 20% of the stand in group clearings.

The retention conditions for MRC's option for selection silviculture are as follows:

Large trees (>16" DBH) will be retained at approximately 40 square feet per acre, averaged across the stand. The general goal in retaining large trees is to select for trees that have full crowns, are capable of seed production, and represent the best phenotypes in the stand. Exceptions to this goal include retention of trees for wildlife and/or structural purposes. These trees may not have full crowns, may not be capable of seed production, and may not represent the best phenotypes in the stand. The post harvest stocking standard will have at least 75 square feet of conifer basal area per acre in the areas outside the groups and no more than 20% of the stand will be in group openings, unless Alternative Group Selection is applied. Hardwoods will be retained at the level of approximately 15 square feet per acre, provided they were a component of the preharvest stand. Conifers will be planted, if necessary, to ensure adequate site dominance of conifers and to add an additional age class.

These retention and harvesting conditions have been met according to page 90.6 of the THP.

12. GENERAL CONCERN: Cultural and Archeological Protection.

There is a concern that the plan does not adequately protect sites of cultural significance.

RESPONSE: The concern is general in nature and mentions nothing specific. The archeological concerns have been adequately addressed in this THP. Item 36 of Section II, page 69, discloses that archeological surveys were completed, and no archeological or historical sites were identified within the plan area. No archeological or cultural concerns were raised during PHI and without more specific concerns, this THP can reasonably be assumed to adequately protect sites of cultural significance.

Public Comment ID: 21PC-000000272
Comment Received Date: 3/18/2021
Comment for Plan Number: Enter plan number manually
County: Mendocino
Closest City: Willits
Email to Notify for Official Response: matt@wildcalifornia.org

Comment:
EPIC respectfully submits the attached document "Final Comments on Russel brook THP" as our public comments. Please also include the attached supporting documents in the record.

Attachments not routed due to volume. They are available for review in the Santa Rosa Forest Practice Office or online at: https://caltreesplans.resources.ca.gov/caltrees

RECEIVED
MAR 18 2021
COAST AREA OFFICE
RESOURCE MANAGEMENT

Santa Rosa Review Team
135 Ridgway Avenue
Santa Rosa, CA 95401
(707) 576-2959

RECEIVED
MAR 18 2021
COAST AREA OFFICE
RESOURCE MANAGEMENT

Dear Santa Rosa Review Team,

On behalf of the Environmental Protection Information Center, please accept these comments on THP 1-20-00218-MEN, "Russel Brook". EPIC believes that MRC's deviation from Attachment A without consulting with USFWS violates the Forest Practice Rule 919.9 and could result in potential take of northern spotted owls ("NSO"). In addition, EPIC believes that widespread adoption of the deviation proposed by MRC will result in widespread negative cumulative impacts to NSO habitat. For these reasons, CAL FIRE should not approve this THP.

I. Forest Practice Rule 919.9(e) allows RPFs to base their NSO take avoidance procedures on a discussion with the USFWS

This THP contains 3 NSO territories within 0.7 miles of the plan area.[1] Because of the NSO's federally threatened status, the Forest Practice Rules contain numerous safeguards designed to protect the NSO and its habitat. California Code of Regulations, Title 14, Section 919.9 states the following:

> "Every proposed timber harvesting Plan, NTMP, WFMP, conversion permit, Spotted Owl Resource Plan, or major amendment located in the Northern Spotted Owl Evaluation Area or within 1.3 miles of a known northern spotted owl Activity Center outside of the Northern Spotted Owl Evaluation Area shall follow one of the procedures required in subsections (a)-(g) below for the area within the THP boundary as shown on the THP map and also for adjacent areas as specified within this section. The submitter may choose any alternative (a)-(g) that meets the on-the-ground circumstances. The required information shall be used by the Director to evaluate whether or not the proposed activity would result in the "take" of an individual northern spotted owl."[2]

For this THP, the RPF selected option (e).[3] Option (e) allows the plan submitter to proceed with a THP "pursuant to the outcome of a discussion with the U.S. Fish and Wildlife Service".[4] This requires the submitter to "submit a letter prepared by the RPF that the described or proposed

[1] Russel Brook THP 1-20-00218-MEN, sec 2, p. 63.
[2] Cal. Code. Regs. tit. 14, § 919.9 Northern Spotted Owl.
[3] Russel Brook THP 1-20-00218-MEN, sec 2, pp. 63, 193.
[4] Cal. Code. Regs. tit. 14, § 919.9(e) Northern Spotted Owl.

management prescription is acceptable to the USFWS."[5] In this instance, the RPF did not have a unique discussion with USFWS, instead they decided to rely on a document known as the Northern Spotted Owl Take Avoidance Analysis and Guidance for Private lands in California Attachment A: Take Avoidance Analysis - Coast Redwood Region ("Attachment A").[6]

This THP guarantees the reviewer that this "THP follows the guidance put forth in Attachment A."[7] By stating that they would follow the guidance set forth in Attachment A in order to satisfy the requirements of § 919.9(e), the RPF has bound themselves to follow that document when conducting NSO surveys. The reason is that by selecting option (e) the RPF is indicating to the Director of CAL FIRE, who is charged with determining whether or not the proposed harvest would result in the "take" of an individual northern spotted owl, that the USFWS has approved of their procedures for preventing take. Selecting option (e) is meant to assure the Director of CAL FIRE and the public that the expertise of the USFWS has been consulted when designing the procedures for preventing take within a THP. It follows that the RPF is not free to make amendments or propose alternative practices to Attachment A within an individual THP that USFWS has not approved and still select option (e). This is further evidenced by the fact that option (g) is designed for a situation where the RPF wishes to propose their own protection measures.[8] As will be discussed in more detail below, in this THP the RPF has chosen not to conform the NSO surveys with Attachment A and has therefore violated the requirements of § 919.9. In doing so, the RPF has violated the Forest Practice Act and CEQA and this THP should, therefore, be rejected by CAL FIRE.

II. Attachment A States that Multiple Activity Centers for an NSO Home Range Are Possible and Often Necessary to Protect the Species

Attachment A was developed by the U.S. Fish and Wildlife Service to provide guidelines to foresters on how best to avoid incidental take of NSO when conducting timber harvests in the coast redwood region of California.[9] The guidelines provide specific measures which "the Service believes… represent effective measures to avoid take of NSO."[10] Attachment A makes clear that "[a]ccurately mapping the location of each activity center is critical to the protection of core use area habitat.[11] In doing so, Attachment A stresses that "[m]ultiple activity centers for an

[5] Cal. Code. Regs. tit. 14, § 919.9(e) Northern Spotted Owl.
[6] Russel Brook THP 1-20-00218-MEN, sec 2, p. 63.
[7] Russel Brook THP 1-20-00218-MEN, sec 2, p. 63.
[8] Cal. Code. Regs. tit. 14, § 919.9(g) Northern Spotted Owl.
[9] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California (Nov. 1, 2019)
[10] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California (Nov. 1, 2019)
[11] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California, p.2 (Nov. 1, 2019)

NSO home range are possible."[12] This means that "[i]f one core use area does not encompass all known activity centers (current and historical), then multiple core use areas will need to be mapped and protected to avoid the likelihood of incidental take" and that "[w]here it makes biological sense, multiple activity centers can be contained within a single core use area."[13] Attachment A further specifies that "[i]f NSO move to a new location (>1,000 feet from the historical activity center), the appropriate protection measures should be provided to each activity center, or consultation with NSO review agencies should occur to evaluate the status of what may be multiple activity centers."[14]

The reason for these broad protection measures is that NSO reuse nests and regularly rotate between nest sites.[15] Forsman et al. (1984) conducted a long-term demographic study of NSO nest sites in Oregon.[16] They found that "[o]f 25 nests that were checked in 2 or more years, 17 were used more than once."[17] They also documented a single NSO pair using 5 different nest sites.[18] Some NSO pairs used alternative nest sites as far away as 1.2km.[19] During another long-term demography study, Sovereign, Taylor, & Forsman (2011) observed that NSO "switched nests between nesting attempts 81.2% of the time."[20] Similarly, Forsman & Giese (1997) found that "[o]wls changed nests between successive nesting events in 80% of all cases."[21] This was

[12] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California, p. 2 (Nov. 1, 2019)
[13] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California, p. 2 (Nov. 1, 2019)
[14] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California, p. 9 (Nov. 1, 2019)
[15] *See, e.g.*, Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): pp. 3-64; Sovern, Stan G., Margaret Taylor, and Eric D. Forsman. "Nest reuse by Northern Spotted Owls on the east slope of the Cascade Range, Washington." *Northwestern Naturalist* 92.2 (2011): 101-106; Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): 3-64; Blakesley, Jennifer A., Alan B. Franklin, and R. J. Gutiérrez. "Spotted owl roost and nest site selection in northwestern California." *The Journal of wildlife management* (1992): 388-392.
[16] Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): pp. 3-64.
[17] Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): p. 32
[18] Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): p. 32
[19] Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): p. 32
[20] Sovern, Stan G., Margaret Taylor, and Eric D. Forsman. "Nest reuse by Northern Spotted Owls on the east slope of the Cascade Range, Washington." *Northwestern Naturalist* 92.2 (2011)
[21] Forsman, Eric D., and Alan R. Giese. "Nests of northern spotted owls on the Olympic Peninsula, Washington." *The Wilson Bulletin* (1997): 28-41.

true despite the fact that "their historical nests were usually still intact."[22] Just because an activity center is not believed to be occupied does not mean that protecting the area around it from timber harvests is no longer necessary to prevent take of NSO. This is because NSO could have returned to a previous activity center, unbeknownst to the timber operator. It is also true that NSO that would have returned to an activity center to breed may no longer be able to do so because of timber operations near that activity center. This is why Attachment A specifies multiple times that protecting multiple activity centers within one territory, even presumably unoccupied activity centers, is necessary to prevent incidental take of NSO.

III. This THP's NSO Take Avoidance Determination Package Does Not Comply with the Attachment A Guidelines

A. The RPF's deviations from Attachment May Result in Take of NSO

This THP's NSO Take-Avoidance Determination package begins by once again confirming that this THP was submitted for review under § 919.9(e).[23] The RPF explains this in the following way:

> "Specifically using USFWS recommendations to CAL FIRE under scenario 4 and 'Attachment A.' This THP proposes alternative measures to some of these recommendations. They are discussed in the following NSO take avoidance determination package."[24]

On its face, this explanation is unsatisfactory. §919.9(e) allows timber harvesters to submit a timber harvest plan "pursuant to the outcome of a discussion with the U.S. Fish and Wildlife Service" not to propose their own alternatives.[25] It is true that Attachment A is the outcome of such a discussion but it does not follow that RPFs are free to propose their own alternatives within an individual THP. The reason is that USFWS will never review these individual THPs and therefore it makes no sense to say that a THP containing alternative measures to those outlined in Attachment A was submitted "pursuant to the outcome of a discussion with the U.S. Fish and Wildlife Service." To allow RPFs to do this would be to eliminate the justification for §919.9(e) because it would allow RPFs to effectively ignore USFWS recommendations in their THPs while gaining the presumptive incidental take avoidance afforded by checking the box for §919.9(e). By simultaneously purporting to rely on Attachment A while proposing alternative measures to Attachment A, the RPF has violated §919.9 of the Forest Practice Act.

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[22] Forsman, Eric D., and Alan R. Giese. "Nests of northern spotted owls on the Olympic Peninsula, Washington." *The Wilson Bulletin* (1997): 28-41.
[23] Russel Brook THP 1-20-00218-MEN, sec 5, p. 193.
[24] Russel Brook THP 1-20-00218-MEN, sec 5, p. 193.
[25] Cal. Code. Regs. tit. 14, § 919.9(e) Northern Spotted Owl

The THP states that it will deviate from Attachment A. The RPF has indicated that "AC location deviates from CNDBB BMSL (Biologically Most Significant Location)."[26] It appears that what the RPF has chosen to do is protect only "the most significant NSO location" and not consider protecting past ACs.[27] This is evident from the fact that the THPs maps only show one AC per NSO territory.[28] The RPF has given a rationale for only protecting "the most significant location", but that rationale is immaterial to whether this THP complies with the forest practice rules.[29] As discussed above, Attachment A clearly stipulates that in order to avoid incidental take of NSO, it may be necessary to protect multiple ACs, including unoccupied ACs. By automatically not protecting past ACs, the RPF has decided to risk conducting timber operations in places that could result in the incidental take of NSO. This is because NSO move around between ACs and have a tendency to reuse old ACs.[30] So, there is a significant chance that NSO are currently occupying past ACs and not the one that MRC believes is the best. As such, the Director cannot certify that this THP will not result in the take of NSO because the RPF has not complied with the forest practice rules designed to prevent the take of NSO.

B. The RPF's deviations from Attachment A will result in significant negative cumulative impacts to NSO

There is an additional concern that MRC's proposed deviation will cause significant negative cumulative impacts to NSO. The reason is that even if an NSO is not currently occupying a past AC, that NSO or other NSOs may have need of the high quality habitat located near a past AC in the future. So, every time MRC conducts a timber harvest around a past AC they are significantly reducing the best NSO roosting habitat in the area. This negatively impacts the individual NSO or NSO pair that used that past AC (because they may have needed to return in the future) as well as future NSOs who could have made use of that AC. These effects are already visible within this THP. During the first review, CDFW commented that the 100 acre core for MEN0067 was not consistent with the Attachment A guidelines because it excluded nesting/roosting habitat in favor of foraging habitat.[31] The RPF responded that this was the case because there were more NSO detections in the foraging habitat than in the nesting habitat and that therefore "we deemed this area more important biologically."[32] But this response misunderstands the purpose of the Attachment A guidelines which is in part to preserve high

[26] Russel Brook THP 1-20-00218-MEN, sec 5, p. 195.
[27] Russel Brook THP 1-20-00218-MEN, sec 5, p. 213
[28] Russel Brook THP 1-20-00218-MEN, sec 5, p. 198-211
[29] Russel Brook THP 1-20-00218-MEN, sec 5, p. 198-211
[30] Sovern, Stan G., Margaret Taylor, and Eric D. Forsman. "Nest reuse by Northern Spotted Owls on the east slope of the Cascade Range, Washington." *Northwestern Naturalist* 92.2 (2011): 101-106.
[31] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 6.
[32] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 6.

quality nesting and roosting habitat even if it is currently unoccupied because it may be necessary for future NSO occupations.[33] CDFW also noted that this timber harvest will not provide a buffer, which would be required under the Attachment A guidelines, around a 1990 nest site for MEN0067 because the nest site is not considered by MRC to be a most significant location.[34] Similar past nest/roosting locations were identified by CDFW as lacking protection under MRC's deviation for MEN0069.[35] So, despite the RPF's protestation that this THP complies with Attachment A, it is clear that this THP proposes harvests in high quality nesting/roosting habitat that would be excluded if Attachment A was properly followed. The RPF responded to these concerns, when CDFW raised similar ones, by arguing that their deviations from Attachment A were based on rational and scientific information and judgements.[36] Whether or not that is the case, §919.9(e) requires the RPF to develop these measures *in consultation with* USFWS. The RPF has clearly not consulted for this THP, choosing instead to develop their own alternative measures without input from USFWS. So, regardless of any rationalization the RPF offers, this THP violates the forest practice rules.

Furthermore, if allowed to continue with this practice, MRC will degrade all of the high quality NSO habitat on their lands as NSO move from location. Under MRC's deviation, each time an NSO moves and MRC identifies a new "most significant location" they permit themselves to log in the old Activity Center. Because NSO move frequently between ACs, this practice will result in MRC regularly changing what land is protected and allowing themselves to log there. In essence, MRC will chase the NSO, logging where they had previously been. The result will be that MRC THPs will log much of the best habitat for the NSO still available simply because NSO are not currently using that habitat. Logging in high quality habitat reduces the quality of that habitat for NSO and makes NSO more vulnerable to two of their highest causes of mortality: predation and cold wet weather.[37] By only protecting the most recent or best sites, MRC is making both of these outcomes more likely to occur in an area that is vital for the NSO's future as a species. So, MRC's proposed deviation has the result of significantly reducing the future viability of the species on their lands.

IV. Conclusion

The RPF has indicated that they would comply with forest practice rule §919.9(e) which requires them to consult with the USFWS about measures to prevent take of NSO. Instead of relying on

[33] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California (Nov. 1, 2019)
[34] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 7.
[35] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 7.
[36] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 8.
[37] Franklin, Alan B., et al. "Climate, habitat quality, and fitness in northern spotted owl populations in northwestern California." *Ecological Monographs* 70.4 (2000): 539-590.

Attachment A, a document that was produced by USFWS for the purposes of such consultation, the RPF chose to propose their own deviations from Attachment A without consulting with USFWS. The proposed deviations have the potential to cause incidental take of NSO as well as seriously reduce the amount of high quality NSO habitat on MRC lands which will have a negative cumulative effect on NSO. By proposing their own deviations from Attachment A without consulting with USFWS, the RPF has violated the Forest Practice Rules and this THP must be rejected. If you have any questions about the content of this letter, please do not hesitate to contact EPIC at matt@wildcalifornia.org.

Public Comment ID: 21PC-000000281
Comment Received Date: 3/23/2021
Comment for Plan Number: Enter plan number manually
County: Mendocino
Closest City: Fort Bragg
Email to Notify for Official Response: matt@wildcalifornia.org

Comment:
When I tried to upload these comments previously I got an error message. Please excuse the double upload but I want to ensure you receive this document. I have recreated the original upload and accompanying comments below.

EPIC is supplementing our comments submitted on 3/18/21 with this additional document. Please include this document and the accompanying the following analysis in your consideration of EPIC's comments. The document is a letter from Randy Brown of the USFWS to Robert Douglas, Forest Science Manager at MRC. The letter contains technical assistance designed to reduce the probability of incidental take of northern spotted owl. The letter contains the following instructions: "[f]or all activity centers, MRC will include the habitat protection measures in Sections 2.4 to 2.6." The letter then immediately provides additional protections for occupied activity centers, making clear that this instruction is meant for all activity centers regardless of whether or not they are currently occupied. Section 2.4 to 2.6 of the letter contain numerous protections for the northern spotted owl that are clearly designed to protect even unoccupied activity centers. For example, the instructions state "No tree or snag previously identified as containing a northern spotted owl nest structure will be felled regardless of the occupancy status of the activity center." So, it is clear that these protections must apply to all historical ACs within a plan area, regardless of whether or not they are occupied. MRC must comply with the terms of this document in order for CAL FIRE to conclude that their timber harvests will not result in incidental take of NSO. As currently, conceived this Timber Harvest Plan does not comply with this document because it fails to adequately protect historic activity centers. As such, CAL FIRE must not approve this THP.

RECEIVED

MAR 23 2021

COAST AREA OFFICE
RESOURCE MANAGEMENT

United States Department of the Interior

FISH AND WILDLIFE SERVICE
Arcata Fish and Wildlife Office
1655 Heindon Road
Arcata, California, 95521
Phone: (707) 822-7201 FAX: (707) 822-8411

In Reply Refer To:
8-14-2010-TA-3742

Mr. Robert B. Douglas
Forest Science Manager
Mendocino Redwood Company, LLC
PO Box 489
Fort Bragg, CA 95437

Subject: Response to Request for Technical Assistance Regarding the Proposed Mendocino Redwood Company Spotted Owl Resource Plan

Dear Mr. Douglas:

This responds to your request for U.S. Fish and Wildlife Service (Service) technical assistance, received in our office on January 8, 2010, on the proposed Mendocino Redwood Company's (MRC) Spotted Owl Resource Plan. At issue in the request is the potential for incidental take of the federally listed northern spotted owl (*Strix occidentalis caurina*) as a result of operations conducted as proposed under MRC's Spotted Owl Resource Plan (SORP). After review of the information pertaining to this request, the Service provides the following technical assistance.

The proposed SORP covers 228,000 acres of MRC property located in Mendocino and Sonoma Counties (see enclosed map). The SORP describes methodologies employed to locate spotted owls and to assess reproductive status, provides a framework for incidental take avoidance by specifying information to be included in individual timber harvest plans, includes habitat definitions, and measurable standards for protecting activity centers and conserving habitat. MRC intends to utilize the SORP until their Habitat Conservation Plan in approved. The Service has determined that MRC's timber harvest operations conducted as proposed under the enclosed SORP would not be likely to incidentally take northern spotted owls. The Service appreciates the high level of professionalism and integrity that you and your staff consistently demonstrate in assisting our efforts to conserve the northern spotted owl.

All maps and data used to provide this technical assistance are on file at this office. If you have questions regarding this response, please contact Mr. Ken Hoffman of my staff at the Arcata Fish and Wildlife Office at (707) 822-7201.

Sincerely,

Randy A. Brown
Acting Field Supervisor

Enclosure

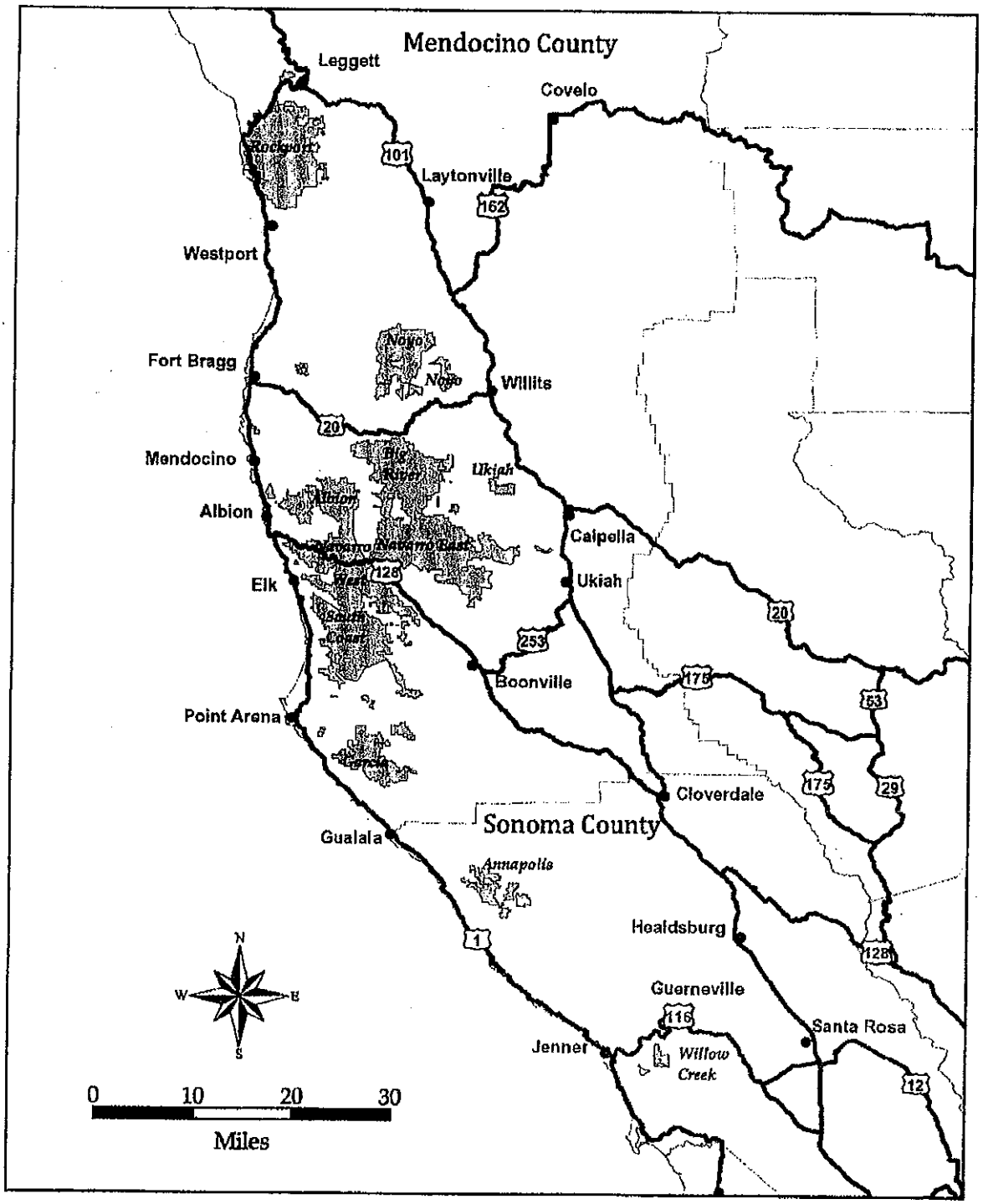

Figure 1: Mendocino Redwood Company forestlands comprising 228,000 acres in Mendocino and Sonoma counties.

Spotted Owl Resource Plan for Mendocino Redwood Company Forestlands

January 15, 2010

SUMMARY

A Spotted Owl Resource Plan (SORP) is intended to offer landowners submitting timber harvest plans a programmatic approach to take avoidance of northern spotted owls (*Strix occidentalis caurina*; NSO). The California Forest Practices Rules defines a "Spotted Owl Resource Plan" as "…an approach to preventing a taking of the northern spotted owl while conducting timber operations[,]" and "…necessarily involves more than one timber harvest plan." A Spotted Owl Resource Plan may be submitted to CAL FIRE for preliminary review, and once approved, can be attached to individual timber harvest plans (THPs) submitted by a landowner under Section 14 CCR 919.9(a).

Currently, however, no example of a SORP exists as none have ever been filed with CAL FIRE. Lacking a template to follow, we combined two documents—Mendocino Redwood Company's (MRC) Spotted Owl Survey Protocol, and a planning agreement signed by MRC and DFG—to function as a SORP covering MRC forestlands in Mendocino and Sonoma counties (Figure 1).

The SORP presented in the following pages describes methodologies employed to locate spotted owls and assess reproductive status, and delineates survey requirements for a range of activities and conditions common to industrial forestlands. In addition to a survey protocol, the SORP also provides a framework for take avoidance by specifying: 1) information to be included in individual timber harvest plans; 2) habitat definitions; and 3) measurable standards for protecting NSO activity centers and conserving NSO habitat.

All documents used in this SORP were generated from discussions with the USFWS and DFG regarding a proposed Habitat Conservation Plan (HCP)/Natural Communities Conservation Plan (NCCP) for MRC forestlands. Mendocino Redwood Company's Spotted Owl Survey Protocol is based on the USFWS-endorsed Spotted Owl Survey Protocol (1992), which was modified to reflect current regulatory and survey standards used in the coastal redwood region, as well as methods used by MRC biologists. The planning agreement is a formal agreement between MRC and DFG that provides explicit standards for addressing and protecting forest resources in timber harvest plans prior to implementation of a HCP/NCCP. Although the planning agreement was signed only by DFG, the USFWS was directly involved in reviewing the protection measures for federally listed wildlife species, including the NSO, to ensure consistency with federal take-avoidance guidelines. Section II of this SORP corresponds with the NSO section of the planning agreement.

Mendocino Redwood Company intends to follow the approved SORP until the HCP/NCCP is implemented. After this time, MRC will address spotted owls in THPs according to an approved incidental take permit (14 CCR 919.9 (d)) for HCP/NCCP-covered lands, but will continue to follow the SORP for THPs submitted in areas of its ownership not covered by the HCP/NCCP.

Overall, the following SORP demonstrates MRC's continued commitment to spotted owl conservation on its forestlands. While the primary function of the SORP is take-avoidance, many elements of this document, including MRC's management practices (e.g., old-growth and wildlife tree protections), go above-and-beyond this basic compliance standard. Mendocino Redwood Company will also continue to monitor spotted owls on its forestlands for both occupancy and

reproductive success. This effort, coupled with a banding program, ensures the collection of high quality data to better assess cumulative effects of timber harvest, barred owl presence, and long-term population trends. With such an investment, MRC hopes that with improved biological knowledge and targeted conservation efforts it can contribute to the eventual recovery of the northern spotted owl.

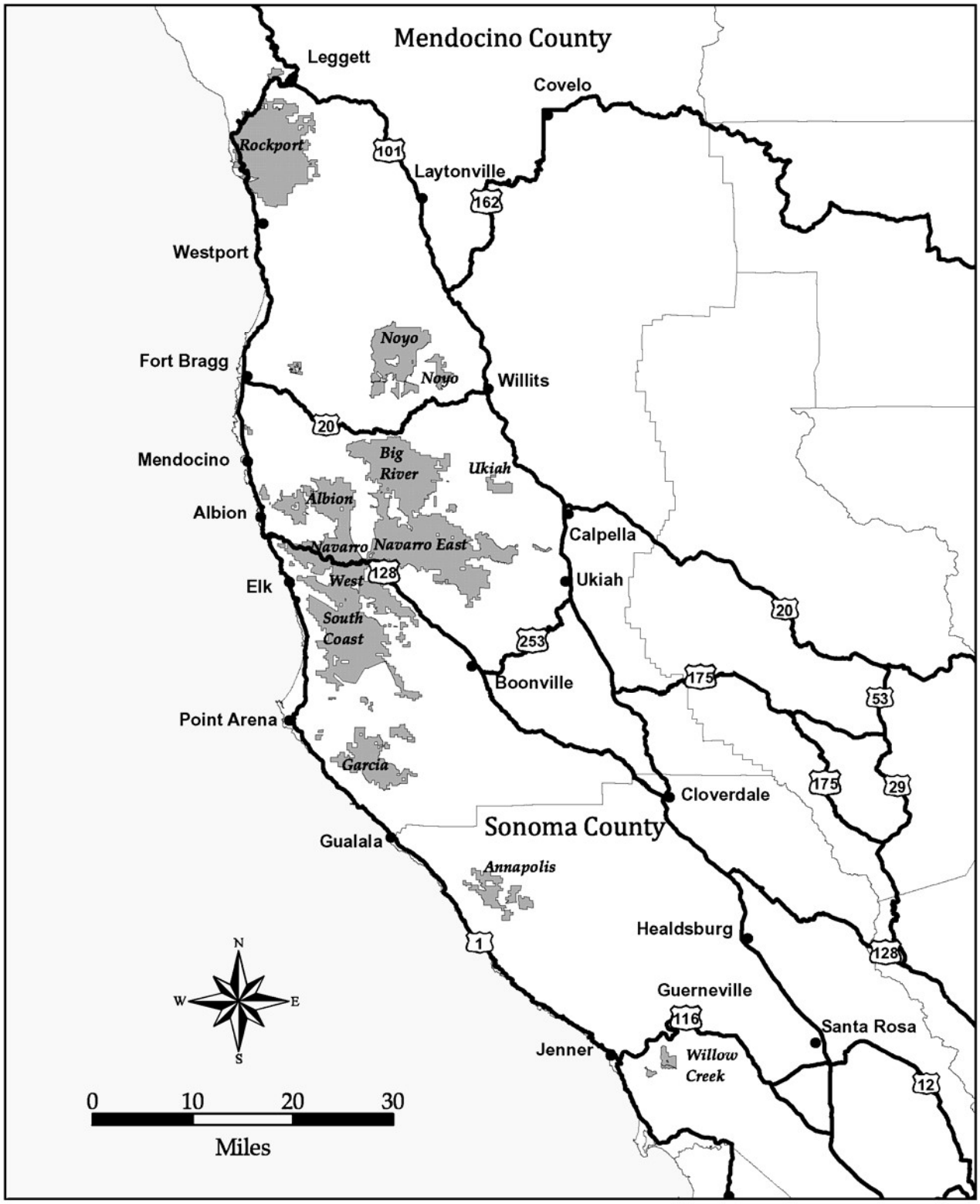

Figure 1: Mendocino Redwood Company forestlands comprising 228,000 acres in Mendocino and Sonoma counties.

I. MENDOCINO REDWOOD COMPANY SPOTTED OWL SURVEY PROTOCOL

1.0 Source and purpose of MRC protocol

MRC developed the following protocol based on the USFWS-endorsed protocol from 1992. Using the latest scientific data on owls and site-specific knowledge, we modified the protocol to better fit our land and harvesting methods. When implemented, the MRC protocol shall:

1. Provide adequate coverage and assessment of an area for the presence of spotted owls.
2. Ensure a high probability of locating resident spotted owls and identifying owl territories that may be affected by a proposed management activity, such as timber harvesting, modification of habitat, or noise disturbance.
3. Identify areas with barred owls and other potential avian predators/competitors.
4. Reduce the likelihood of incidental take.
5. Determine nesting and reproductive success (number of fledged young) of northern spotted owl territories within covered lands.

1.1 Activities requiring surveys

Table 1 indicates all activities that require surveys for spotted owl territories. The subsection immediately following the table clarifies the assessment area for each required survey.

Table 1: Activities Requiring NSO Surveys

Northern Spotted Owl (NSO) Surveys		
Activity	**Survey?**	**Comments**
Commercial harvesting operations	Yes	Needs survey unless there is no suitable NSO habitat within 0.7 miles of boundaries, inclusive of the harvesting operation, and no known activity center within ½ mile.
Vegetation management		
▪ Planting	No	
▪ Manual brush removal	Generally not	Needs survey only for operations using mechanized equipment; see requirements below.
▪ Chainsaw work	Generally not	• Needs survey only if work will result in reduction of NSO habitat during non-breeding season. • Needs survey during breeding season only if conducted within 0.5 mile of a known activity center and off a mainline road. • No requirement for a survey if simply using a chainsaw to clear roads for access.

Northern Spotted Owl (NSO) Surveys		
Activity	**Survey?**	**Comments**
• Heavy equipment	Generally not	Needs survey only if completed during breeding season within 0.5 miles of known NSO activity centers and off a mainline road.
• Prescribed burning	Generally not	Needs survey only if work will result in reduction of NSO habitat or burning during breeding season.
• Slash pile burning	No	
Roads and landings	Generally	Needs survey unless roads are mainline haul routes and landings are directly on mainline roads.
Rockpits, quarries, surface mining	Yes	Needs survey unless rockpits, quarries, or surface mining occurs on mainline roads
Data collection for monitoring	No	
Emergency fire suppression	No	
Habitat improvement/creation	Yes	

1.1.1 Extent of survey area

- If **disturbance only**[1] is proposed:
  - The survey will extend to 0.5 miles beyond a project boundary for a THP.
  - The survey will extend to 0.25 miles (1320 ft) beyond a potential disturbance for a non-THP project.
- If **habitat reduction** is proposed, the survey area will extend to 0.7 miles beyond the project area.
- If **blasting** is proposed, the survey will extend 1 mile beyond the blast site.

1.2 Accuracy of 1-year and 2-year surveys

In preparing its 1991 protocol for northern spotted owls, USFWS analyzed survey data to determine the number of visits needed to detect territorial owls or to conclude that a lack of owl response reflected an absence of spotted owls. Their data analysis provided the basis for the minimum number of visits that MRC requires for our 2-year survey (i.e., 3 visits per year) and 1-year survey (i.e., 6 visits per year). A **complete survey** covers a survey area to the required number of visits or documents activity centers of all spotted owl territories that account for all spotted owl habitat in the project impact area. Surveys over 2 years provide more confidence that the results reflect presence or absence in the current and subsequent year because owls sometimes occupy territories intermittently. Thus, the USFWS prefers the use of a 2-year survey over the 1-year survey to locate spotted owl sites. MRC staff may actually complete

[1] A "disturbance-only THP" is one that does not propose any reduction in habitat.

such surveys before the end of a 1-year or 2-year survey program if: 1) they obtain a response and confirm the status of the owl(s); and 2) there is a sufficient density of confirmed occupied owl sites to preclude additional owl sites within or around the project impact area.

1.2.1 Recertification surveys

Recertification surveys are surveys that deviate from the timing requirements of visits under the 1-year and 2-year survey protocols, and are usually conducted for areas where 2-year surveys have already been completed or where sufficient owl monitoring has located all active owl territories within 0.5-mile of a project impact area in the previous years. Recertification surveys must consist of a minimum of three surveys in March with a minimum 5-day separation between subsequent surveys. Typically, the USFWS allows recertification surveys for early start-up operations only after 2-year surveys have been completed. However, given that MRC forestlands have a substantial survey history spanning 20 years, the USFWS is supportive of MRC using recertification surveys for areas where only the 1-year survey protocol was followed.

1.2.2 The 2-year survey

If a 2-year survey is completed and no responses are obtained, the results fall under recertification status in subsequent years where a minimum of three surveys in March must be conducted. This also assumes that all active NSO territories within 0.5-mile of a THP are located in the current year of harvest operations.

EXAMPLE OF 2-YEAR SURVEY	
Year 1 (March - July)	3 visits with no response.
Year 2 (March - July)	3 visits with no response. Operations may commence after 3rd survey if no response.
Year 3	A minimum of three surveys in March with no responses prior to commencing operations.
Year 4	A minimum of three surveys in March with no responses prior to commencing operations.
Year 5	A minimum of three surveys in March with no responses prior to commencing operations.

1.2.3 The 1-Year survey

If a 1-year survey is completed and no responses are obtained, harvest may occur before the start of the next breeding season. If harvest is not completed within this time period, a minimum of 3 surveys must be conducted prior to harvest in Year 2. If this additional survey produces no responses and harvest will not occur until after Year 2, then recertification surveys will be necessary in subsequent years (at least three surveys in March) prior to early start-up operations. This assumes that all active NSO territories within 0.5-mile of a THP are located in the current year of harvest operations.

EXAMPLE OF 1-YEAR SURVEY	
Year 1 (March - July)	6 visits with no responses.

Year 2	Conduct at minimum 3 surveys in March with no responses prior to commencing operations. If no responses obtained, additional surveys are not needed.
Year 3	A minimum of three surveys in March with no responses prior to commencing operations.
Year 4	A minimum of three surveys in March with no responses prior to commencing operations.
Year 5	A minimum of three surveys in March with no responses prior to commencing operations.

1.2.4 Daytime-only surveys

In cases where the project impact area is either saturated with owl territories or proximal to an owl site (precluding establishment of additional owl territories), daytime-only surveys or site visits to historically occupied sites are acceptable in lieu of nocturnal surveys ONLY when **all active NSO** territories are verified as occupied in the season in which operations are proposed. Available wildlife agencies (USFWS, DFG) and/or CAL FIRE may provide the criteria for such determinations.

1.2.5 Locating nest site or activity center

If a nest site or activity center is located during a survey and the project area is large enough to possibly support more than one site (i.e., there is at least a 0.5 mile radius from the located owl to another site), the remaining potential habitat should be surveyed (Figure 1). Half a mile is a commonly accepted distance for owl territories. Though our minimum inter-territory distance varies from this number, we know, on average, territorial owl activity occurs a half mile or more from other owl territories.

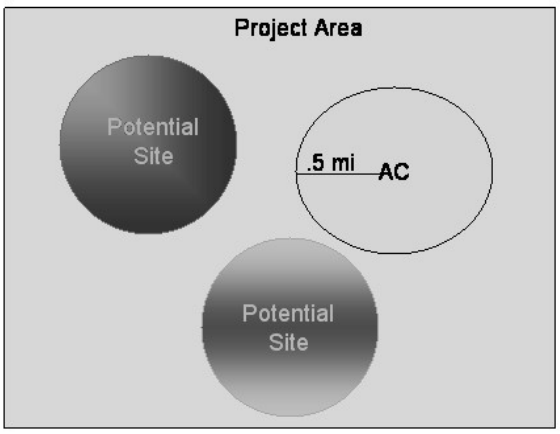

Figure 2 Potential Sites in Project Area

1.3 Area of surveys

MRC will inventory all potential suitable habitat for northern spotted owls in a harvest impact area using current habitat typing. If potentially suitable habitat is located, MRC will conduct surveys. If no potentially suitable habitat is located within the harvest boundary or 0.7 mi. away, no surveys will be required. All areas of suitable habitat within the harvest boundary will be surveyed unless spotted owl territories have been located within 0.5 miles or survey work has adequately covered the area in the current year.

1.3.1 Timing of surveys and operations

MRC will conduct surveys based on the timing of harvest operations. **Ongoing operations** are those in which there is 1 week (i.e. 5 consecutive days) of continuous operations with no breaks prior to February 1st—unless there is a break due to weather or to the requirements of the protection measures.

Ongoing Operations—Option I: Operation may continue from February 1st -March 1st if the following conditions are met:

1. 1-year or 2-year protocol surveys have been completed in the previous year.
2. Operations, other than use of existing roads, are at least a 0.25-mile from a known NSO activity center.

AND

3. Operations are limited to a harvest unit that was started prior to February 1st.

OR

4. All active territories (a) have been located within a 0.5-mile (1 mile if rock-blasting) of the harvest boundary and (b) the operations adhere to breeding disturbance limitations (see Section 2.3.1).

OR

5. Owl territories (a) have been located and either saturate existing habitat or exist in sufficient densities to preclude additional owl sites within 0.5-mile of the harvest boundary and (b) the operations adhere to breeding disturbance limitations (see Section 2.3.1).

Ongoing Operations—Option II: Operations may continue past March 1st if the following conditions are met:

1. 1-year or 2-year protocol surveys have been completed in the previous year.

AND

2. All active territories (a) have been located within a 0.5-mile (1 mile if rock-blasting) of the harvest boundary and (b) the operations adhere to breeding disturbance limitations (see Section 2.3.1).

OR

3. Owl territories (a) have been located and either saturate existing habitat or exist in sufficient densities to preclude additional owl sites within 0.5-mile of the harvest boundary and (b) the operations adhere to breeding disturbance limitations (see Section 2.3.1).

Ongoing Operations—Option III:Felling operations may continue past March 1st if the following conditions are met:

- 1-year or 2-year protocol surveys have been completed in the previous year.
- Falling is limited to completing a harvest unit that was started prior to February 1st and is at least 0.25-miles from a known NSO activity center.

Full Operations—Option I: Full operations can be initiated between March 1st and May 15th if the following conditions are met:

1. 1-year or 2-year protocol surveys have been completed.
2. A minimum of 3 surveys in March have been completed with no NSO detections prior to operation start-up within 0.5 miles of the THP boundary (for projects qualifying for recertification).

AND

3. All active territories (a) have been located within a 0.5-mile (1 mile if rock-blasting) of the harvest boundary and (b) the operations adhere to breeding disturbance limitations (see Section 2.3.1)

OR

4. Owl territories (a) have been located and either saturate existing habitat or exist in sufficient densities to preclude additional owl sites within 0.5-mile of the harvest boundary and (b) the operations adhere to breeding disturbance limitations (see Section 2.3.1).

Full Operations—Option II: Full operations can be initiated between March 1st and May 15th outside of 0.5-mile of any active NSO site if the following conditions are met:

1. 1-year or 2-year protocol surveys have been completed.
2. A minimum of 3 surveys in March have been completed with no NSO detections prior to operation start-up within 0.5 miles of the THP boundary (for projects qualifying for recertification).

Full Operations—Option III: Full operations can be initiated after May 15th if the following conditions are met:

1. 1-year or 2-year protocol surveys have been completed including surveys from the current year.

AND

2. All active territories (a) within a 0.5-mile (1 mile if rock-blasting) of the harvest boundary have been surveyed to protocol and are either located or deemed unoccupied and (b) the operations adhere to disturbance and habitat limitations based on occupancy and reproductive status (see Sections 2.3.1 & 2.3.2).

OR

3. Owl territories (a) have been located and either saturate existing habitat or exist in sufficient densities to preclude additional owl sites within 0.5-mile of the harvest boundary and (b) the operations adhere to breeding disturbance limitations (see Sections 2.3.1 & 2.3.2).

1.4 Protocol for night-calling survey

For survey purposes, northern spotted owl habitat is nesting/roosting or foraging habitat. At a minimum, MRC must survey all nesting/roosting and foraging habitat.

1.4.1 Coordination of information

MRC will avoid common mistakes, such as overlapping visits by more than one survey group, through coordinated planning. When possible, we will also inform adjacent landowners of all surveys near their property. Such surveys could affect their own management and logging operations. Moreover, neighboring landowners may provide information on off-property owls and cooperate in joint surveys.

1.4.2 Survey period

Surveys of proposed management activity areas must take place between March 1st and August 1st, unless proposed operations initiate prior to February 1st. For areas where there is adequate biological information that birds are defending their established territories prior to March 1st, MRC may use earlier dates as a starting time. Positive responses after August 1st are still valid, but negative results after this date do not count as required visits for completing a survey. Positive responses obtained after August 1st also indicate that the area in question should be surveyed the following year.

1.4.3 Establishing the survey area

- Develop transects or calling stations to cover all spotted owl habitat within the delineated survey area, including locations detailed in the Section 1.1.1.

- Establish calling stations and survey routes to achieve complete coverage of the area, preferably from more than 1 calling station. Calling stations should be spaced approximately 0.25 to 0.5 miles apart, depending on topography and background noise levels. Take advantage of prominent points within the survey area when establishing calling stations. If necessary, to ensure complete coverage of the area, supplement the prominent points with intermediate calling

stations. Where known spotted owl activity centers exist within the survey area, survey areas may be adjusted to exclude habitat that would be within earshot of the activity center. However, consider the need to survey the known activity center for current status. The intent is to obtain complete coverage of the area where owls will be able to hear the surveyor and the surveyor will be able to hear the owl.

- Record, for each visit, whether results are positive or negative, and include the following information:
  - County
  - Watershed
  - THP or Inventory Block
  - Survey type (point, cruise, or combination)
  - Surveyor(s) name
  - Survey date
  - Brief description of survey route
  - Survey start and finish time
  - Total time of survey
  - Weather conditions (including estimated precipitation level, wind speed, and percent cloud cover)
  - Survey results, i.e., spotted owl detections, including time of response, sex , and age (if possible); type of response (i.e., audio, visual, or both); azimuth of response; estimated distance of response; behavior or vocalization type; For multiple or moving owls, list information and number each response or observation. This will allow more accurate determinations of management centers.

- Record all sightings of or responses by barred owls, great horned owls, northern goshawks, or any other raptor species. The presence of other raptors may affect spotted owl responses.

- Map the following for each visit:
  - Route surveyed and stations called.

  - Spotted owl response or observation locations. For multiple or moving owls, map all response or observation locations and number to correspond with survey results. Again, this will assist in determining activity centers.

1.4.4 Survey methods

There are four types of acceptable surveys: point calling, cruising or leapfrog calling, daytime calling surveys, and territory monitoring (aka site visits). Point calling is the recommended method for nocturnal surveys, and territory monitoring is the recommended method for daytime surveys at historic site centers or nocturnal detection locations (i.e. daytime follow-up visit).

1. **Point calling (nocturnal)**
   Set up a series of calling stations 0.25 to 0.5 miles apart along the road transects. When possible, pick prominent points which cover large areas. Spend at least 10 minutes at each station. If the topography lends itself to fewer, prominent calling stations, spend more time at each station. Be sure the entire survey area is adequately covered.

2. **Cruising or leapfrog surveys (nocturnal)**
   Walk the designated route calling and pausing at prominent points and at regular intervals throughout the area to conduct informal stations of 10-minute duration. If 2 people are involved, you may use a leapfrog method (Forsman 1983).

3. **Daytime calling surveys**
   Set up a series of calling stations at least 600 feet apart along the road transects. When possible, pick prominent points which cover large areas. Spend at least 20 minutes at each station (see section 1.5).

4. **Territory monitoring (site visits)**
   Walk a route through a historically occupied site during the daytime calling at regular intervals and pausing to search the area for sign of spotted owls (i.e. feathers, whitewash, nest structures, roosting birds, etc.,). Once birds are located, note location of birds with GPS unit and assess occupancy status and reproductive status (see sections 1.6 and 1.7). Spend no less than 90 minutes searching a historically occupied site if unable to detect a spotted owl.

1.4.5 Survey instructions

The following instructions apply to either of the methods described above:

- Elicit responses from northern spotted owls with voice calling or the use of a recommended digital wildlife caller. When arriving at a station, the surveyor will record the time and begin voice calling. The surveyor may use a digitally recorded call to elicit a response. Continue this process for at least 10 minutes at each calling station.

- Characterize behavioral observations. Make note of agitated calls, continuous responses, movement (toward you or away from you), or situations where there is only one owl response followed by quiet. Recording this type of information may assist with the identification of activity centers.

- Conduct night surveys between sunset and sunrise. Be sure not to call the same section of a survey route at the same time on each survey effort if possible (i.e., vary the time you start and the section of the route from which you start).

- Do not survey under inclement weather conditions, such as high winds (> 10 mph), heavy rain, heavy fog, or high noise levels (e.g., stream noise, machinery, etc.) which would prevent you from hearing responses. If weather conditions or noise levels are in doubt, be conservative. Survey visits conducted under

marginal conditions will reduce the quality of the overall survey effort. Negative results collected under inclement weather conditions may not be adequate for evaluating spotted owl presence or absence. When using an alternate survey point because of stream noise, note this on the survey sheet and re-locate the point in approximately the same survey area. Stream noise is generally a problem during surveys early in the breeding season from March through April.

- Resort to more than one visit, if necessary, to complete a survey. The objective of a complete visit is to conduct a thorough survey of the entire area in one field outing; however, in some cases this may not be possible. A complete visit may be a combination of a day and a night field outing and, in addition, may include a daytime follow-up visit. If reasonable effort was made to cover the area in one outing, but this was not accomplished, then the remaining area should be surveyed in the following field effort. To reduce the chance of owls moving between portions of the survey area and, as a result, being missed, complete the visit on consecutive days as much as possible. The entire area should be covered within 7 days in order to be considered as one complete visit.

- Divide a large project area that cannot be surveyed in 7 days into smaller areas based on available habitat, topography, drainages, and other important factors. Survey areas need to be small enough to be completely surveyed within the specified time period.

- Count as 1 complete visit a night outing and daytime follow-up. If a surveyor goes out at night and does not get a response, a daytime follow-up would not be necessary. In this case, the night outing alone would be considered 1 complete visit. Whether or not owls are heard, the entire area needs to be surveyed to count as a complete visit.

- Space visits at least 5 days apart. For example, assume a visit ends on the 3rd of May. Using a proper 5-day spacing (May 4-8), the next possible visit date would be May 9th.

- Conduct at least 2 of the night visits per year before June 30th for a 2-year survey and at least 4 of the night visits before June 30th for a 1-year survey. One survey must occur after May 15th and before June 30th for a 2-year survey, and two surveys must occur during this same time period for a 1-year survey. Also, survey effort should be spread out over 5 months to avoid efforts concentrated in a short period of time, particularly at the beginning of the survey season. Exceptions to this survey standard apply to recertification surveys where either the 1-year or 2-year survey protocol has been previously met.

- Adjust the survey period when there are season restrictions due to snow, landslides, mud, and bridge failures, etc., and provide documentation to explain the modifications.

- Conduct surveys during the day when there are no roads or foot trails to traverse at night or when there are other safety concerns. Provide documentation on the specific safety concerns.

1.5 Protocol for daytime calling surveys

Permit daytime calling in areas that are not accessible with nocturnal surveys in order to reduce the chance of worker injury while hiking at night. Follow the point method, if possible, when using daytime surveys. Space call points no further than 600 ft apart, if using daytime surveys when calling from discrete points; owls do not respond from long distances during the day as they do at night. Surveyors must conduct all daytime calling for at least 20 minutes at individual survey points. An alternative survey strategy may increase inter-station distance up to a 0.25-mile when conducting a cruise survey between points, but surveyors must spend at least 20 minutes surveying each station.

1.5.1 Owls located during surveys

- Estimate the owl's original and final location. One method is to triangulate on the owl's call, taking compass bearings from 2-3 locations. Make sure compass bearings are taken in as short a time-frame as possible. Record on the survey form the method used to estimate the location.

- Record the location(s) of the owl, preferably on a map or photo attached to the survey form.

- Attempt to confirm the owl(s) location with a daytime follow-up. The intent of triangulation and mapping is to provide a means for verification of the location. Daytime locations are very important in determining more precise activity centers.

- Record a bird response. If no response is heard, proceed to the next calling station. Continue until the survey area is completely covered.

- Return to the same area during the day if a bird responds at night; return within 72 hours to verify status. If weather precludes a return visit, document this.

- Conduct an intensive search during a daytime follow-up to locate spotted owls (pairs or singles) within the general vicinity of the night response. Surveys may begin from roads closest to the night response area. However, if owls do not respond to road surveys, surveyors should conduct walking routes through the area. Surveyors should spend sufficient time within the stand to cover the area well. This may take several hours, depending on the terrain. Observers should watch for owls flying in without responding and for other evidence of occupancy, such as pellets, whitewash, and feathers. Pellets, whitewash, or feathers alone are not sufficient to document spotted owl presence or residency. Mobbing jays are also a potential indicator of owl presence. The follow-up should be completed within 72 hours after presence was detected, as owls are more apt to be located

near the previous night's location. A daytime follow-up is only the second part of a complete visit.

- Determine status if a response occurs during daylight hours and there is sufficient time to do so. Use conservative judgment and hoot only as much as needed to determine status. Do not hoot any more than is necessary. By stimulating the owls to move around, you increase their risk of predation. Excessive calling near a nest site may cause harassment by bringing the female off the nest. Excessive use of the agitated call in high owl density areas (e.g., California coastal areas) may also confound survey results by eliciting responses from owls representing multiple territories.

- Complete the survey route to determine pair status once a bird responds at night. To avoid *leading* a spotted owl through calling, go to the other end of the survey route and complete the rest of the survey once an owl responds. If that is not practical, survey only the remaining stations that are beyond the earshot of the responding bird. Beyond earshot is generally over a ridge or at least a 1/2 to 3/4 mile straight-line distance from the owl. Completing the route will provide an opportunity to detect any other owls.

- Continue to call for the duration of the station visit even after other species respond unless the surveyor believes that this will increase the potential for predation, for example, by great horned owls or northern goshawks.

1.5.2 Additional visits

Additional visits may be required if resident status cannot be determined during surveys. These visits should be in the general area of the response (i.e., a 0.5-mile radius around the site). If resident status is determined at any point during the additional visits, no more visits to that particular site are required for the year. The same standards (timing, intervals, weather condition limitations, etc.) apply to additional visits.

In a 2-year survey, MRC will conduct additional visits the same year as the response:

- If the last response occurs on the 1st visit, MRC will conduct 1 additional visit.
- If the last response occurs on the 2nd visit, MRC will conduct 2 additional visits.
- If the last response occurs on the 3rd visit, MRC will conduct 3 additional visits

In a 1-year survey, MRC will conduct additional visits the same year as the response:

- If the last response occurs on the 4th visit, MRC will conduct 1 additional visit.
- If the last response occurs on the 5th visit, MRC will conduct 2 additional visits.
- If the last response occurs on the 6th visit, MRC will conduct 3 additional visits.

If MRC cannot obtain 3 responses even after additional visits, we will not classify the owl as a resident single.

1.6 Protocol for assigning occupancy status

MRC will establish **pair status** if:

1. A male and female are heard or observed (either initially or through their movement) in proximity (< 0.25 mile apart) to each other on the same visit.
2. The male takes a mouse to the female.
3. The female is observed on a nest.
4. One or both adults are observed with young. Young alone do not define a pair because young barred owls look like young spotted owls until late in the summer.

When unidentified calls are heard in the vicinity of a known spotted owl, the surveyor should not assume species identification of the unknown owl. Daytime follow-ups should be used to clarify these situations.

MRC will establish **resident single status** if:

1. There is presence or response of a single owl within the same general area on 3 or more occasions within a breeding season, with no response by an owl of the opposite sex after a complete survey.
2. There are multiple responses over several years (e.g., 2 responses in Year-1 and 1 response in Year-2, from the same general area).

A resident single may represent a succession of single owls within the same general area in single or multiple years. Determining if the responses occur within the same general area should be based on topography and the location of any other owls known for the surrounding area. This should be determined by the wildlife biologist for the particular area. Radio-telemetry and banding data can also be used to aid in determining status of singles.

MRC will establish **status unknown** if there is a response of a male and/or female which does not meet any of the above category definitions.

MRC will establish **unoccupied status** if there are no detections of a spotted owl at a historically occupied site after a minimum three surveys during the breeding season following the timing requirements of a 2-year survey protocol. Night surveys and daytime site visits may be used exclusively or in combination to count towards unoccupied status.

1.7 Protocol for determining reproductive status

Determining reproductive success is not required to avoid "take," if breeding season restrictions are applied to all harvest activity in order to protect owl reproduction during any given year. Restrictions may be dropped if, according to the protocol, surveys reveal that owls are non-nesting or that no young were produced.

Following is MRC protocol for determining reproductive status of spotted owls. Reproduction surveys may provide information on nest tree locations and the most accurate activity center locations. There are 2 stages of reproduction surveys: nesting status and reproductive success.

Nesting Status

- Conduct nesting status surveys between March 11th and July 31st. The start date is based on nest initiation dates. Young identified in July should still confirm nesting.

- Spread the surveys throughout the survey period. Do not conduct all nesting status surveys early in the breeding season.

- Use a standard *mousing* procedure as described below to determine nesting status. However, do not *mouse* birds any more than is necessary to determine nesting status. By stimulating them to move around during the day, you may increase their risk of predation. This applies to hooting as well. Excessive calling near a nest site may cause harassment and endanger eggs or young by bringing the female off the nest.

Mousing

- Locate one or both members of a pair during the day and offer mice or other small prey items.

- Record the *fate* of each prey item (e.g., eaten, cached, or given to female or young) once an owl takes prey or is found with natural prey. The fate of the prey is used to classify nesting status.

- A minimum of four prey items shall be available for determining nesting status, with the exception of a refusal of 2 prey items on a single occasion (see section under *Non-nesting* below).

- Continue to offer additional prey items, if the owl eats the prey, until the owl caches the prey, sits on it for an extended period of time (60 minutes), refuses to take additional prey, or carries the prey away. If the bird flies with the prey, follow and try to determine the final fate of the prey. For more details on mousing procedures, see Forsman (1983).

- Make a concerted effort to get the owl(s) to take mice. Be creative in placing a mouse where the owl can easily see and capture it; offer mice to the mate of an owl.

1.7.1 Classifying sites

MRC will classify a site as nesting, non-nesting, or unknown nesting status based on field observations.

1.7.2 Nesting

MRC will classify owls as nesting if any of the following conditions are observed:

- Two observations, at least 7 days apart, if the first observation occurs before May 15th.

NOTE

This is necessary because owls may show signs of initiating nesting early in the season. A surveyor may consider them nesting when, in fact, they are not nesting. For instance, a female observed on a nest early in the season may simply be roosting and not incubating eggs.

- One observation, if after May 15th.

Nesting is confirmed if, on 2 visits before May 15th or 1 visit after May 15th, any of the following observations are made:

- The female is observed on a nest.
- Either member of a pair carries natural or observer-provided prey to the nest.
- A female possesses a brood patch when examined in hand during mid-April to mid-June. Only 1 observation is required. Dates may vary with the particular areas. Be careful not to confuse the normal small area of bare skin (apteria) on the abdomen with the much larger brood patch. A fully developed brood patch covers most of the lower abdomen, extending to the base of the wings. Describe the brood patch on the field form, including length, width, color, and texture of the skin, and any evidence of regenerating feathers around the edge. While a scientific research permit is not required by USFWS for calling spotted owls, any capture or handling of spotted owls does require such a permit.
- One or both adults are observed with young. Because young barred owls look like young spotted owls until late in the summer, young alone are not sufficient.

1.7.3 Non-nesting

Non-nesting can be inferred for a NSO territory if, on two visits between March 11th and May 15th, and with at least 3 weeks separating visits, any of the following observations are made:

- The female is observed roosting for 60 minutes, particularly early in the season. Be aware that nesting females with large nestlings often roost outside the nest during warm weather. If in doubt be sure to schedule 1 or more visits in mid-June to check for fledglings.
- The female does not possess a brood patch when examined in hand between mid-April and mid-June.
- Prey are offered to one or both adults and they cache the prey, sit with the prey for an extended period of time (60 minutes), or refuse to take additional prey beyond the minimum of 2 prey items.
- One or both spotted owls refuse to take prey for 60 minutes. **This can only count for one of the two required visits to infer non-nesting**; the other visit must use the procedure outlined above to infer non-nesting status.

Non-nesting can be inferred for a NSO territory if, on two visits between May 15th and August 1st, with at least 7 days separating the visits, any of the following observations are made:

- A pair is located on at least 2 visits.
- Prey are offered to one or both adults and they cache the prey, sit with the prey for an extended period of time (60 minutes), or refuse to take additional prey beyond the minimum of 2 prey items.

OR

- One or both spotted owls refuse to take prey for 60 minutes. **This can only count for one of the two required visits** to infer non-nesting; the other visit must use the procedure outlined above (see March 11th-May 15th) to infer non-nesting status.

1.7.4 Unknown nesting status

Nesting status is unknown if any of the following apply:

- None of the conditions are met for nesting or non-nesting above

1.8 Reproductive success

Once an owl pair is classified as nesting, MRC will conduct reproductive success surveys when the young leave the nest (fledge)—although surveys are more successful in late May to late June. Surveyors may also assess reproductive success through the month of July and even later with positive results. The following process will be used to assess reproductive success:

- Schedule at least 2 visits to a site to locate and count fledged young if 1 or 0 fledglings have been located; time the visits so that the fledged young are observed as soon as possible after they leave the nest to reduce predation.

- Attempt to locate fledged young. Use visual searches and mousing. If young are present, the adults should take at least some of the prey to the young. The sight of an adult with prey will usually stimulate the young to beg, revealing their number and location.

- Record 0 young if the birds take at least 2 prey items and eventually cache, sit with, or refuse further prey without ever taking prey to fledged young—on at least 2 occasions separated by at least 1 week.

- Count the number of fledged young seen or heard on the first successful reproductive visit. If 2 or 3 fledged young are identified, the reproductive status is complete.

- Conduct a minimum of 1 follow-up visit if only 1 fledged young is seen; the visit should be 3-10 days after the fledged young is seen in case some owlets are missed on a single visit.

- Classify the production of young as unknown, if there is no response after at least 2 visits, separated by at least 1 week during the fledging period.

- Classify the number of young as 1+, 2+, etc., if you count young on 1 visit but do not get back for a second visit, or find no owls on the second visit.

Opportunistic mousing late in the season (July 31st) may be useful for providing supplemental information about site productivity. However, mousing efforts late in the season must be considered inconclusive if they fail to provide positive information, because dispersal or mortality may have occurred.

1.9 Protocol for determining activity center

Figure 3 illustrates the decision process that MRC uses every year to select an activity center for each spotted owl territory. In reviewing the decision process, a few points should be noted: (1) MRC may locate an owl pair from auditory input; (2) MRC will use the most-used roost site (based on observations, presence of whitewash, and presence of pellets) in the event of multiple roost sites; and (3) MRC may consult with USFWS and CDFG and/or CAL FIRE to designate an alternate activity center, if the decision flow does not result in the most biologically suitable location.

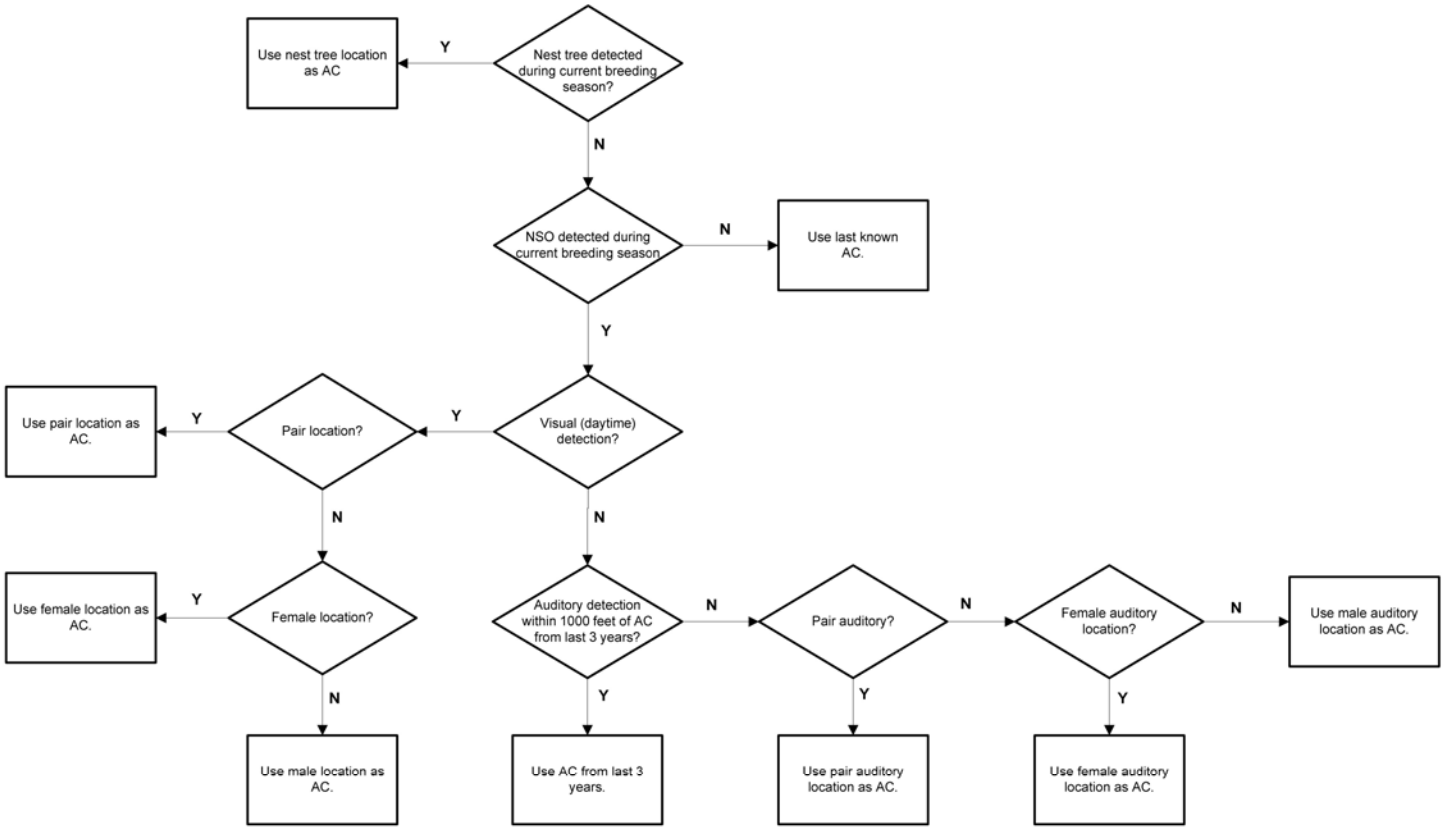

Figure 3: Selecting an Activity Center

II. MENDOCINO REDWOOD COMPANY NORTHERN SPOTTED OWL PROTECTION MEASURES

2. Northern spotted owl habitat definitions

The following guidelines are intended to protect and avoid take of the northern spotted owl. These guidelines prescribe measures that exceed, or are in addition to, the requirements of the FPR and MRC's Option A Report. For purposes of these guidelines, forest structure classes will be categorized as "Foraging" habitat or "Nesting/Roosting" habitat for northern spotted owl, or as "Non-suitable" habitat, as follows:

Structure Class	Tree Type	Dominant Size Class	Min. Canopy	NSO Habitat Type
0	Non-forested	0	0	Non-suitable
1	Mixed Hardwoods	<8"	<40%	Non-suitable
2	Mixed Hardwoods	>16"	<40%	Non-suitable
3	Mixed Hardwoods	8"-16"	>40%	Non-suitable
4	Mixed Hardwoods	>16"	>40%	Foraging
5	Mixed Hardwoods	8"-16"	>60%	Non-suitable
6	Mixed Hardwoods	>16"	>60%	Foraging
7	Mixed Conifer/Hardwoods	8"-16"	<40%	Non-suitable
8	Mixed Conifer/Hardwoods	16-24"	<40%	Non-suitable
9	Mixed Conifer/Hardwoods	8"-16"	>40%	Non-suitable
10	Mixed Conifer/Hardwoods	>16"	>40%	Foraging
11	Mixed Conifer/Hardwoods	<8"	>60%	Non-suitable
12	Mixed Conifer/Hardwoods	16-24"	>60%	Foraging
13	Conifer	8"-16"	<40%	Non-suitable
14	Conifer	16-24"	<40%	Non-suitable
15	Conifer	24-32"	<40%	Non-suitable
16	Conifer	>32"	<40%	Non-suitable
17	Conifer	8"-16"	>40%	Foraging
18	Conifer	16-24"	>40%	Foraging
19	Conifer	24-32"	>40%	Foraging
20	Conifer	>32"	>40%	Foraging
21	Conifer	8"-16"	>60%	Foraging
22	Conifer	16-24"	>60%	Nesting/Roosting
23	Conifer	24-32"	>60%	Nesting/Roosting
24	Conifer	>32"	>60%	Nesting/Roosting

2.1 Take avoidance guidelines.

MRC will continue to follow the procedure prescribed in section 919.9 of the FPR, including providing information to enable CAL FIRE to make no-take determinations and, when applicable, obtaining technical assistance directly from the USFWS or through CAL FIRE prior to implementation of any THP until the NCCP/HCP is finalized and even after the NCCP/HCP is

formalized for lands not included in the NCCP/HCP. MRC will include the information below for each THP. MRC acknowledges that the USFWS' provision of technical assistance is subject to the availability of appropriated funds and available staffing.

The technical assistance reflected in this section will apply for so long as the USFWS continues to provide technical assistance to CAL FIRE or MRC. If the USFWS stops providing technical assistance, MRC may elect to stop using these technical assistance guidelines but would remain obligated to comply with the Endangered Species Act and its prohibition against the take of listed species, such as the northern spotted owl.

2.1.1 Activity center map and other information

In each THP, MRC will include one copy of a map of known northern spotted owl activity centers[2] in or near (within 0.7 miles) the THP ("Activity Center Map"). The Activity Center Map will include, at a minimum, all activity centers identified in the previous three years. The Activity Center Map will also include activity centers identified prior to the previous three years, unless the activity center is inactive. "Inactive" means that 1) there are 3 years of negative results to surveys (for a mapped 72-acre core area and assuming no interference competition from barred owls) as described in 2.1.2 below, or 2) based on site-specific conditions identified by MRC, the USFWS concurs that an identified activity center is inactive or otherwise does not warrant designation as an activity center. The Activity Center Map will identify any portion of the THP that is within 0.7 miles of a northern spotted owl activity center. If no portion of the THP is within 0.7 miles of an activity center, the THP will include a statement to that effect, explain the basis for the conclusion that the THP is not within 0.7 miles of an activity center, and describe any surveys or other actions taken to determine that no activity center is present. For the THP area and areas within 0.7 of each activity center, MRC will also provide one copy of each item below in the THP.

A. Pre- and post-harvest habitat maps for the THP.

B. Description of silvicultural acreage for the THP.

C. Pre- and post-harvest northern spotted owl habitat acreages by silviculture and harvest unit, including an estimate of the post-harvest basal area minimums. A pre-harvest basal area assessment must also be provided where timber harvest will occur in Nesting/Roosting habitat that is ~ 500' from the Activity Center or contiguous with the 72-acre core area (see 2.4, below).

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[2] "Northern spotted owl activity center" means a geographical point derived from owl survey data that is used to depict the location of an important functional area of an owl territory for the year of the survey and to locate the application of protection measures. An activity center is identified during the daytime by locating within a northern spotted owl's territory the point or center of the area that for that year is most important biologically to the owl. The factors used to map the activity centers are, in order of importance, the location of: nest sites, non-nesting pairs, single females, single unknowns, and single males. While it is best to locate activity centers during the daytime, it is acceptable to identify an activity center at night if: 1) a pair of northern spotted owls is detected at night (i.e. two birds of the opposite sex ≤ 0.25 miles of each other); 2) an individual owl is detected at night on three separate surveys within a breeding season and the detections are within 0.25-miles of each other; and 3) an individual owl is detected at night in the same area over successive years.

D. Map with the last three consecutive years of northern spotted owl activity centers (all locations within the last three years or the most recent location for old sites not abandoned) within 0.7 miles of the THP boundary. This map must also include the location of the biologically most significant location ("BMSL") from DFG's California Natural Diversity Database ("NDDB") Spotted Owl Viewer and a discussion if it is different from MRC's location of the activity center.

E. For all activity centers within 0.7 miles of the THP area (including territories with disjunct activity centers that are separated by ≥ 1000 feet), a map depicting northern spotted owl habitat distribution at 1000 feet, 0.5-mile, and 0.7-mile scales and a table that quantifies the habitat distribution.

F. Map of all appurtenant roads associated with the THP, identifying existing mainline and seasonal roads.

G. Map identifying any proposed new road construction.

H. DFG NDDB Spotted Owl Viewer reports 1, 2, and 3 for area extending 0.7 miles beyond THP boundary.

I. Color aerial photo coverage of the 0.7 mile area surrounding all activity center(s) associated with THP, including additional color maps with polygons representing stands of differing structure classes and northern spotted owl habitat overlay (i.e., a transparency) using the best available aerial photographs. Any apparent discrepancies between the habitat layer and the aerial photo should be explained. For example, if the aerial photo appears to depict a forest structure class that is categorized in the table above as "Foraging" habitat, and it is identified as non-suitable habitat in the habitat layer, an explanation must be provided.

J. Maps of all timber operations within 0.7 miles of known activity centers that have occurred since the date the aerial photo or equivalent imagery.

K. Maps showing all approved THPs within 0.7 miles of known activity centers.

L. The best available northern spotted owl survey data, which must include: 1) a map of the survey route; 2) a table or spreadsheet that summarizes surveys conducted in the area, including the start and end times of each survey; 3) results of follow-up visits wherever northern spotted owls have been detected; and a map of detection locations for northern spotted owls and barred owls.

M. Because many of the functional habitat designations in the above described analyses are derived from secondary information, a certification from the RPF that he/she has verified NSO functional habitat assignments within the THP and the adjacent 500 feet.

2.1.2. Surveys results

Using the USFWS Arcata Field Office's modified version (8-14-2009TA-3640) of the USFWS endorsed NSO survey protocol (revised March 17, 1992); MRC will conduct northern spotted owl surveys throughout the THP area and all areas within 0.7 miles of the THP. MRC will provide the results of these surveys and survey station layout to CALFIRE in THPs and, if available, in TA requests to the USFWS. MRC may propose an alternative survey regime to CALFIRE and to the USFWS, identifying an appropriate number and location of survey stations. USFWS may review any alternatives and, approve it as proposed, or approve it subject to specific, appropriate modifications needed to achieve equivalent efficiency for detecting northern spotted owls. MRC will conduct the survey and provide the survey results to CALFIRE and, if available to review them, the USFWS. USFWS may review the survey results and inform MRC if a field assessment of the proposed THP area is warranted. If the USFWS issues new NSO survey protocols, MRC, the USFWS and DFG will confer to decide how best to update MRC's survey protocols based on the new USFWS protocols.

2.1.3. Field assessment

If USFWS informs MRC a field assessment is necessary for any reason, USFWS may conduct a field assessment with MRC personnel prior to issuance of a letter of TA.

2.1.4. THPs receiving USFWS technical assistance

Following receipt of the above information and the proposed protection measures for any THP, the USFWS may identify any measures in addition to the NSO Protection Measures below that are necessary to avoid take. The USFWS will include an explanation of its conclusion that implementation of the THP without the additional measure(s) is likely to cause take of a northern spotted owl. The RPF responsible for the THP will include the necessary take avoidance measures, if any, as an enforceable amendment to the THP before timber harvest is initiated.

2.2. Northern spotted owl protection measures

All THPs that occur within 0.7 miles of an activity center identified on the Activity Center Map (see section 2.1.1) or in the surveys described in Section 2.1.2 will include all applicable Protection Measures described in Sections 2.3 to 2.6, unless alternatives are proposed by MRC and accepted by the USFWS. For all activity centers, MRC will include the habitat protection measures in Sections 2.4 to 2.6, below. For *occupied* activity centers, MRC will also implement the disturbance prevention measures in section 2.3, below.

2.3. Disturbance prevention measures

MRC will include the disturbance prevention measures in this Section in all THPs that are within 0.7 miles of any *occupied* activity centers. MRC will stratify northern spotted owl disturbance prevention measures based on the categorization of habitat, breeding season, and non-breeding season. For purposes of these measures, the breeding season for northern spotted owls is February 1-July 31st. The end-date of July 31st will be used unless additional site-specific biological data show that northern spotted owls are absent, are not nesting, have failed to nest successfully, or have fledged young capable of flight, in which case the breeding season for purposes of that THP area will be shortened accordingly.

2.3.1. Breeding season (February 1st-July 31st).

Each THP will include the following measures for occupied activity centers during the northern spotted owl breeding season:

- Only the following operations will be allowed within 1000 feet (305m) of the occupied activity center:
    - Use of mainline haul roads and maintenance of mainline haul roads as designated by maps in the THP. For purposes of this section, "maintenance" does not include the changing the prism of the road or other actions that are considered reconstruction of roads under the California Forest Practice Rules.
    - Use of public roads.
    - Use and maintenance of existing non-mainline haul roads that (1) are located at least the same distance from the current spotted owl activity center as a public road or mainline haul road; or (2) are existing seasonal roads ≥ 500 feet from the activity center and in use throughout the time the spotted owl territory has been active.
    - Use of pickups and ATVs on existing roads.

- Helicopter operations, including service landings, will be prohibited within 2640 feet (805m) of the occupied activity center.

- Falling and yarding within 1000 feet of an activity center may be allowed *only if* the activity center is determined after May 15th to be inactive because owls are absent, non-nesting, or had a nest failure. Falling and yarding shall not occur within a northern spotted owl core area that has fledged young until there is evidence that the fledges have been out of the nest for at least two weeks and are capable of sustained flight.

- Stopping logging vehicles outside of mainline haul roads will be allowed within 1000 feet of an active nest site for safety reasons only.

- Any trees allowed to be felled within a core area for road maintenance will be retained for woody debris.

- Non-habitat disturbing activities, such as road reconstructions and maintenance, and other types of road use, may be allowed after July 9th.

- Stumps at least 425' from an activity center may be used to guy a yarder for yarding ground outside the core area.

2.3.2. Non -breeding season (August 1st-January 31st)

Each THP will include the following measures for occupied activity centers outside of the northern spotted owl breeding season:

- Operations, including use and maintenance of all existing roads and rock pits, may be allowed.

- Only the following operations may be allowed within the nest core area (i.e., within a 500' radius of the occupied activity center):
    - Use of cable corridors and tailholds, provided.
    - Only trees less than 6 inch dbh may be felled for the cable corridor.
    - All trees felled for the cable corridor will be left on the forest floor for woody debris.
    - Exclude nest or screen trees from felling.
    - Use and maintenance of existing roads.

- Helicopter operations—including service landings—that are at least 1000 feet from an activity center may be allowed.

2.4. Activity center protection

All THPs will include a buffer zone around each northern spotted owl activity center-the "core area." A northern spotted owl *core area* is a 72-acre acre area surrounding an activity center, which includes the 18-acre "nest core" area within a fixed 500' radius of the center and the 54-acre "roost protection zone" outside the 500' radius. A core area will ordinarily have a circular radius of 1000 feet from the activity center. However, MRC may deviate from a circular core area by adjusting the boundaries to 1) include Nesting/Roosting habitat instead of Foraging habitat, 2) include contiguous habitat instead of isolated habitat, 3) exclude habitat cut off from the activity center by a topographic divide, such as a ridge, or 4) conform to local landscape attributes such as draws and streamcourses. Core areas must include a minimum of 72 acres and must maximize the amount of retained Nesting/Roosting habitat. All THPs will include the following measures for northern spotted owl core areas.

- MRC shall mark with a "wildlife tree" tag, any tree confirmed to have a northern spotted owl nest in it to enable its retention. No tree or snag previously identified as containing a northern spotted owl nest structure will be felled regardless of the occupancy status of the activity center. Historic spotted owl nest trees in areas unoccupied or abandoned by owls will be provided with screen trees for additional protection.

- Harvest will be prohibited within the nest core area.

- Functional Nesting/Roosting habitat will be retained within the roost protection zone.

- MRC will only be required to protect that portion of a core area that is on its property.

- 72-acres of Nesting/Roosting will be retained in the core area, if possible. If a core area contains less than 72 acres of Nesting/Roosting habitat, the roost protection zone will be modified to maximize the amount of Nesting/Roosting habitat that is contiguous with and outside the nest core (500 foot radius) while conforming to local landscape attributes. If a core area cannot be redrawn to retain 72 contiguous acres of Nesting/Roosting habitat, all Nesting/Roosting habitat within 1000' of the activity center will be retained, and no harvest will be allowed within the 1000' area. If the core area contains at least 72 acres of

Nesting/Roosting, then harvest may be permitted in the roost protection zone (outside of 500' nest core) as long as:

- At least 2/3 of the pre-harvest basal area is retained, comprising at least 100 square feet of basal area with 60% canopy cover and an average stand diameter of at least 16"inches per acre.
- If the above objective cannot he met, then no harvest in the roost protection zone will be allowed.
- All suitable habitat (Nesting/Roosting and Foraging) subject to harvest that is within the roost protection zone (i.e., 500-1000 feet or topographical area around nest core) will be harvested in a way that retains its pre-harvest functional definition. Immediately post-harvest, these areas will maintain or increase pre-harvest mean stand diameter.

2.5. Habitat retention within 0.7 miles of activity centers

All THPs will include the following measures to retain habitat within.7 miles of activity centers.

- At least 500 acres of suitable habitat (Nesting/Roosting and Foraging) will be retained within 0.7 miles of the activity center. If there is less than 500 acres of suitable habitat within 0.7 miles of the activity center, all suitable habitat will be retained. Or no operations within any suitable habitat.

- At least 200 of the 500 acres of suitable habitat will be maintained as Nesting/Roosting.

- At least 100 acres of Nesting/Roosting habitat within 0.7 miles of an activity center will be retained. If a northern spotted owl territory contains ≤ 100 acres of Nesting/Roosting habitat within 0.7 miles of an activity center, then no harvest shall occur in those acres of Nesting/Roosting habitat.

- Harvest may occur in Nesting/Roosting habitat that is between 100 and 200 acres within 0.7 miles of an activity center, provided the Nesting/Roosting habitat is not contiguous with the core area and is maintained with at least a 60% canopy cover of at least 16" dbh trees.

- For northern spotted owl territories[3] containing ≤ 200 acres of Nesting/Roosting habitat within 0.7 miles of an activity center, timber harvest in Nesting/Roosting habitat harvest is permitted only if:
    - contiguous Nesting/Roosting habitat within and extending beyond the core area is retained so that at least 2/3 of the pre-harvest basal area in the NR stand to be harvested is maintained post-harvest, comprising at least 100 square feet of basal area with 60% canopy cover and an average stand diameter of at least 16" inches per acre; and

[3]A "northern spotted owl territory" is a spatial area that is defended by a single resident or pair of northern spotted owls. Specific northern spotted owl territories refer to generally fixed geographic areas. As a working definition, a territory is that area within 0.7 miles of the AC.

    - Nesting/Roosting habitat not contiguous with the core area is maintained with at least a 60% canopy cover of at least 16" dbh trees.

- Before harvesting timber within Nesting/Roosting habitat that is within 0.7 miles of an activity center, where the Nesting/Roosting habitat either comprises < 200 acres or the harvest would reduce the Nesting/Roosting habitat to < 200 acres, MRC staff trained in habitat typing will conduct a field review to confirm the actual acreage of suitable Nesting/Roosting habitat.

- Operations will be limited to ≤ 50% of available suitable habitat within 0.7 miles of a northern spotted owl territory in anyone year.

2.6. Relocation of activity centers and emergence of new northern spotted owl territories

Northern spotted owl activity centers may move over time, or new territories may become established within the area of a THP or within the biological assessment area of the THP after a THP is approved, but before operations under the THP are begun. To ensure take of northern spotted owls is avoided in these circumstances, MRC will update and include in the THP the information required in Section 2.1.1 with regard to any new or relocated activity centers, and will include all applicable measures required in Sections 2.2 to 2.5.

From: Matt Simmons <matt@wildcalifornia.org>
Sent: Monday, July 12, 2021 11:33 AM
To: Santa Rosa Review Team@CALFIRE
Cc: jacob@frmforestry.com; Hutchins, Adam@Wildlife; Hendrix, Jon@Wildlife; Tom Wheeler
Subject: Public Comments on THP 1-20-00218-MEN
Attachments: Final Comments on Russel Brook THP.pdf

Warning: this message is from an external user and should be treated with caution.

Dear Santa Rosa Review Team,

The Russell Brook THP 1-20-00218-MEN recently conducted its PHI and received agency recommendations. As part of that report item 78 stated the following: "Response to any Public Comment received prior to the conclusion of the PHI, if any: No public comment has been received to date."

This is false. EPIC submitted the attached comments on March 18th, 2021. We ask that the consolidated PHI be corrected to reflect EPIC's substantive comments on this THP.

Thank you,

--
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Pronouns: he/him/his
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Licensed in California

Privileged and Confidential Communication

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COAST AREA OFFICE
RESOURCE MANAGEMENT

Santa Rosa Review Team
135 Ridgway Avenue
Santa Rosa, CA 95401
(707) 576-2959

Dear Santa Rosa Review Team,

On behalf of the Environmental Protection Information Center, please accept these comments on THP 1-20-00218-MEN, "Russel Brook". EPIC believes that MRC's deviation from Attachment A without consulting with USFWS violates the Forest Practice Rule 919.9 and could result in potential take of northern spotted owls ("NSO"). In addition, EPIC believes that widespread adoption of the deviation proposed by MRC will result in widespread negative cumulative impacts to NSO habitat. For these reasons, CAL FIRE should not approve this THP.

I. Forest Practice Rule 919.9(e) allows RPFs to base their NSO take avoidance procedures on a discussion with the USFWS

This THP contains 3 NSO territories within 0.7 miles of the plan area.[1] Because of the NSO's federally threatened status, the Forest Practice Rules contain numerous safeguards designed to protect the NSO and its habitat. California Code of Regulations, Title 14, Section 919.9 states the following:

> "Every proposed timber harvesting Plan, NTMP, WFMP, conversion permit, Spotted Owl Resource Plan, or major amendment located in the Northern Spotted Owl Evaluation Area or within 1.3 miles of a known northern spotted owl Activity Center outside of the Northern Spotted Owl Evaluation Area shall follow one of the procedures required in subsections (a)-(g) below for the area within the THP boundary as shown on the THP map and also for adjacent areas as specified within this section. The submitter may choose any alternative (a)-(g) that meets the on-the-ground circumstances. The required information shall be used by the Director to evaluate whether or not the proposed activity would result in the "take" of an individual northern spotted owl."[2]

For this THP, the RPF selected option (e).[3] Option (e) allows the plan submitter to proceed with a THP "pursuant to the outcome of a discussion with the U.S. Fish and Wildlife Service".[4] This requires the submitter to "submit a letter prepared by the RPF that the described or proposed

[1] Russel Brook THP 1-20-00218-MEN, sec 2, p. 63.
[2] Cal. Code. Regs. tit. 14, § 919.9 Northern Spotted Owl.
[3] Russel Brook THP 1-20-00218-MEN, sec 2, pp. 63, 193.
[4] Cal. Code. Regs. tit. 14, § 919.9(e) Northern Spotted Owl.

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RESOURCE MANAGEMENT

management prescription is acceptable to the USFWS."[5] In this instance, the RPF did not have a unique discussion with USFWS, instead they decided to rely on a document known as the Northern Spotted Owl Take Avoidance Analysis and Guidance for Private lands in California Attachment A: Take Avoidance Analysis - Coast Redwood Region ("Attachment A").[6]

This THP guarantees the reviewer that this "THP follows the guidance put forth in Attachment A."[7] By stating that they would follow the guidance set forth in Attachment A in order to satisfy the requirements of § 919.9(e), the RPF has bound themselves to follow that document when conducting NSO surveys. The reason is that by selecting option (e) the RPF is indicating to the Director of CAL FIRE, who is charged with determining whether or not the proposed harvest would result in the "take" of an individual northern spotted owl, that the USFWS has approved of their procedures for preventing take. Selecting option (e) is meant to assure the Director of CAL FIRE and the public that the expertise of the USFWS has been consulted when designing the procedures for preventing take within a THP. It follows that the RPF is not free to make amendments or propose alternative practices to Attachment A within an individual THP that USFWS has not approved and still select option (e). This is further evidenced by the fact that option (g) is designed for a situation where the RPF wishes to propose their own protection measures.[8] As will be discussed in more detail below, in this THP the RPF has chosen not to conform the NSO surveys with Attachment A and has therefore violated the requirements of § 919.9. In doing so, the RPF has violated the Forest Practice Act and CEQA and this THP should, therefore, be rejected by CAL FIRE.

II. Attachment A States that Multiple Activity Centers for an NSO Home Range Are Possible and Often Necessary to Protect the Species

Attachment A was developed by the U.S. Fish and Wildlife Service to provide guidelines to foresters on how best to avoid incidental take of NSO when conducting timber harvests in the coast redwood region of California.[9] The guidelines provide specific measures which "the Service believes… represent effective measures to avoid take of NSO."[10] Attachment A makes clear that "[a]ccurately mapping the location of each activity center is critical to the protection of core use area habitat.[11] In doing so, Attachment A stresses that "[m]ultiple activity centers for an

[5] Cal. Code. Regs. tit. 14, § 919.9(e) Northern Spotted Owl.
[6] Russel Brook THP 1-20-00218-MEN, sec 2, p. 63.
[7] Russel Brook THP 1-20-00218-MEN, sec 2, p. 63.
[8] Cal. Code. Regs. tit. 14, § 919.9(g) Northern Spotted Owl.
[9] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California (Nov. 1, 2019)
[10] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California (Nov. 1, 2019)
[11] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California, p.2 (Nov. 1, 2019)

NSO home range are possible."[12] This means that "[i]f one core use area does not encompass all known activity centers (current and historical), then multiple core use areas will need to be mapped and protected to avoid the likelihood of incidental take" and that "[w]here it makes biological sense, multiple activity centers can be contained within a single core use area."[13] Attachment A further specifies that "[i]f NSO move to a new location (>1,000 feet from the historical activity center), the appropriate protection measures should be provided to each activity center, or consultation with NSO review agencies should occur to evaluate the status of what may be multiple activity centers."[14]

The reason for these broad protection measures is that NSO reuse nests and regularly rotate between nest sites.[15] Forsman et al. (1984) conducted a long-term demographic study of NSO nest sites in Oregon.[16] They found that "[o]f 25 nests that were checked in 2 or more years, 17 were used more than once."[17] They also documented a single NSO pair using 5 different nest sites.[18] Some NSO pairs used alternative nest sites as far away as 1.2km.[19] During another long-term demography study, Sovereign, Taylor, & Forsman (2011) observed that NSO "switched nests between nesting attempts 81.2% of the time."[20] Similarly, Forsman & Giese (1997) found that "[o]wls changed nests between successive nesting events in 80% of all cases."[21] This was

[12] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California, p. 2 (Nov. 1, 2019)
[13] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California, p. 2 (Nov. 1, 2019)
[14] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California, p. 9 (Nov. 1, 2019)
[15] *See, e.g.*, Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): pp. 3-64; Sovern, Stan G., Margaret Taylor, and Eric D. Forsman. "Nest reuse by Northern Spotted Owls on the east slope of the Cascade Range, Washington." *Northwestern Naturalist* 92.2 (2011): 101-106; Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): 3-64; Blakesley, Jennifer A., Alan B. Franklin, and R. J. Gutiérrez. "Spotted owl roost and nest site selection in northwestern California." *The Journal of wildlife management* (1992): 388-392.
[16] Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): pp. 3-64.
[17] Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): p. 32
[18] Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): p. 32
[19] Forsman, Eric D., E. Charles Meslow, and Howard M. Wight. "Distribution and biology of the spotted owl in Oregon." *Wildlife Monographs* (1984): p. 32
[20] Sovern, Stan G., Margaret Taylor, and Eric D. Forsman. "Nest reuse by Northern Spotted Owls on the east slope of the Cascade Range, Washington." *Northwestern Naturalist* 92.2 (2011)
[21] Forsman, Eric D., and Alan R. Giese. "Nests of northern spotted owls on the Olympic Peninsula, Washington." *The Wilson Bulletin* (1997): 28-41.

true despite the fact that "their historical nests were usually still intact."[22] Just because an activity center is not believed to be occupied does not mean that protecting the area around it from timber harvests is no longer necessary to prevent take of NSO. This is because NSO could have returned to a previous activity center, unbeknownst to the timber operator. It is also true that NSO that would have returned to an activity center to breed may no longer be able to do so because of timber operations near that activity center. This is why Attachment A specifies multiple times that protecting multiple activity centers within one territory, even presumably unoccupied activity centers, is necessary to prevent incidental take of NSO.

III. This THP's NSO Take Avoidance Determination Package Does Not Comply with the Attachment A Guidelines

A. The RPF's deviations from Attachment May Result in Take of NSO

This THP's NSO Take-Avoidance Determination package begins by once again confirming that this THP was submitted for review under § 919.9(e).[23] The RPF explains this in the following way:

> "Specifically using USFWS recommendations to CAL FIRE under scenario 4 and 'Attachment A.' This THP proposes alternative measures to some of these recommendations. They are discussed in the following NSO take avoidance determination package."[24]

On its face, this explanation is unsatisfactory. §919.9(e) allows timber harvesters to submit a timber harvest plan "pursuant to the outcome of a discussion with the U.S. Fish and Wildlife Service" not to propose their own alternatives.[25] It is true that Attachment A is the outcome of such a discussion but it does not follow that RPFs are free to propose their own alternatives within an individual THP. The reason is that USFWS will never review these individual THPs and therefore it makes no sense to say that a THP containing alternative measures to those outlined in Attachment A was submitted "pursuant to the outcome of a discussion with the U.S. Fish and Wildlife Service." To allow RPFs to do this would be to eliminate the justification for §919.9(e) because it would allow RPFs to effectively ignore USFWS recommendations in their THPs while gaining the presumptive incidental take avoidance afforded by checking the box for §919.9(e). By simultaneously purporting to rely on Attachment A while proposing alternative measures to Attachment A, the RPF has violated §919.9 of the Forest Practice Act.

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[22] Forsman, Eric D., and Alan R. Giese. "Nests of northern spotted owls on the Olympic Peninsula, Washington." *The Wilson Bulletin* (1997): 28-41.
[23] Russel Brook THP 1-20-00218-MEN, sec 5, p. 193.
[24] Russel Brook THP 1-20-00218-MEN, sec 5, p. 193.
[25] Cal. Code. Regs. tit. 14, § 919.9(e) Northern Spotted Owl

The THP states that it will deviate from Attachment A. The RPF has indicated that "AC location deviates from CNDBB BMSL (Biologically Most Significant Location)."[26] It appears that what the RPF has chosen to do is protect only "the most significant NSO location" and not consider protecting past ACs.[27] This is evident from the fact that the THPs maps only show one AC per NSO territory.[28] The RPF has given a rationale for only protecting "the most significant location", but that rationale is immaterial to whether this THP complies with the forest practice rules.[29] As discussed above, Attachment A clearly stipulates that in order to avoid incidental take of NSO, it may be necessary to protect multiple ACs, including unoccupied ACs. By automatically not protecting past ACs, the RPF has decided to risk conducting timber operations in places that could result in the incidental take of NSO. This is because NSO move around between ACs and have a tendency to reuse old ACs.[30] So, there is a significant chance that NSO are currently occupying past ACs and not the one that MRC believes is the best. As such, the Director cannot certify that this THP will not result in the take of NSO because the RPF has not complied with the forest practice rules designed to prevent the take of NSO.

B. The RPF's deviations from Attachment A will result in significant negative cumulative impacts to NSO

There is an additional concern that MRC's proposed deviation will cause significant negative cumulative impacts to NSO. The reason is that even if an NSO is not currently occupying a past AC, that NSO or other NSOs may have need of the high quality habitat located near a past AC in the future. So, every time MRC conducts a timber harvest around a past AC they are significantly reducing the best NSO roosting habitat in the area. This negatively impacts the individual NSO or NSO pair that used that past AC (because they may have needed to return in the future) as well as future NSOs who could have made use of that AC. These effects are already visible within this THP. During the first review, CDFW commented that the 100 acre core for MEN0067 was not consistent with the Attachment A guidelines because it excluded nesting/roosting habitat in favor of foraging habitat.[31] The RPF responded that this was the case because there were more NSO detections in the foraging habitat than in the nesting habitat and that therefore "we deemed this area more important biologically."[32] But this response misunderstands the purpose of the Attachment A guidelines which is in part to preserve high

[26] Russel Brook THP 1-20-00218-MEN, sec 5, p. 195.
[27] Russel Brook THP 1-20-00218-MEN, sec 5, p. 213
[28] Russel Brook THP 1-20-00218-MEN, sec 5, p. 198-211
[29] Russel Brook THP 1-20-00218-MEN, sec 5, p. 198-211
[30] Sovern, Stan G., Margaret Taylor, and Eric D. Forsman. "Nest reuse by Northern Spotted Owls on the east slope of the Cascade Range, Washington." *Northwestern Naturalist* 92.2 (2011): 101-106.
[31] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 6.
[32] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 6.

quality nesting and roosting habitat even if it is currently unoccupied because it may be necessary for future NSO occupations.[33] CDFW also noted that this timber harvest will not provide a buffer, which would be required under the Attachment A guidelines, around a 1990 nest site for MEN0067 because the nest site is not considered by MRC to be a most significant location.[34] Similar past nest/roosting locations were identified by CDFW as lacking protection under MRC's deviation for MEN0069.[35] So, despite the RPF's protestation that this THP complies with Attachment A, it is clear that this THP proposes harvests in high quality nesting/roosting habitat that would be excluded if Attachment A was properly followed. The RPF responded to these concerns, when CDFW raised similar ones, by arguing that their deviations from Attachment A were based on rational and scientific information and judgements.[36] Whether or not that is the case, §919.9(e) requires the RPF to develop these measures *in consultation with* USFWS. The RPF has clearly not consulted for this THP, choosing instead to develop their own alternative measures without input from USFWS. So, regardless of any rationalization the RPF offers, this THP violates the forest practice rules.

Furthermore, if allowed to continue with this practice, MRC will degrade all of the high quality NSO habitat on their lands as NSO move from location. Under MRC's deviation, each time an NSO moves and MRC identifies a new "most significant location" they permit themselves to log in the old Activity Center. Because NSO move frequently between ACs, this practice will result in MRC regularly changing what land is protected and allowing themselves to log there. In essence, MRC will chase the NSO, logging where they had previously been. The result will be that MRC THPs will log much of the best habitat for the NSO still available simply because NSO are not currently using that habitat. Logging in high quality habitat reduces the quality of that habitat for NSO and makes NSO more vulnerable to two of their highest causes of mortality: predation and cold wet weather.[37] By only protecting the most recent or best sites, MRC is making both of these outcomes more likely to occur in an area that is vital for the NSO's future as a species. So, MRC's proposed deviation has the result of significantly reducing the future viability of the species on their lands.

IV. Conclusion

The RPF has indicated that they would comply with forest practice rule §919.9(e) which requires them to consult with the USFWS about measures to prevent take of NSO. Instead of relying on

[33] Dept. of Interior, Fish and Wildlife Service, NSO Take Avoidance Analysis and Guidance for Private lands in California (Nov. 1, 2019)
[34] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 7.
[35] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 7.
[36] Responses to First Review THP 1-20-00217-MEN (Feb. 23, 2020) at p. 8.
[37] Franklin, Alan B., et al. "Climate, habitat quality, and fitness in northern spotted owl populations in northwestern California." *Ecological Monographs* 70.4 (2000): 539-590.

Attachment A, a document that was produced by USFWS for the purposes of such consultation, the RPF chose to propose their own deviations from Attachment A without consulting with USFWS. The proposed deviations have the potential to cause incidental take of NSO as well as seriously reduce the amount of high quality NSO habitat on MRC lands which will have a negative cumulative effect on NSO. By proposing their own deviations from Attachment A without consulting with USFWS, the RPF has violated the Forest Practice Rules and this THP must be rejected. If you have any questions about the content of this letter, please do not hesitate to contact EPIC at matt@wildcalifornia.org.

From: Alan Levine <alevine@mcn.org>
Sent: Friday, August 6, 2021 11:03 AM
To: Santa Rosa Public Comment@CALFIRE
Subject: Comments (supporting document) – 1-20-00218 MEN, Russell Brook, 1-21-0096 Daughert y Creek/Snuffins Creek]
Attachments: THPREV 1-20-00218 Russel Brook - 1-21-00096 Daugherty Creek Big R.rtf; NMFS ASP Comments to BOF.pdf

Warning: this message is from an external user and should be treated with caution.

Dear Review Team

Attachments not routed due to volume. They are available for review in the Santa Rosa Forest Practice Office or online at: https://caltreesplans.resources.ca.gov/caltrees

I failed to include supporting documents from NOAA Fisheries

Please include these documents in the files of, both, THPs

1-20-00218 MEN, Russell Brook, 1-21-0096 Daugherty Creek/Snuffins Creek

Thank you

Alan

---------- Original Message ----------
Subject: Comments – 1-20-00218 MEN, Russell Brook, 1-21-0096 Daughert y Creek/Snuffins Creek
From: "Alan Levine" <alevine@mcn.org>
Date: Wed, August 4, 2021 3:08 pm
To: santarosapubliccomment@fire.ca.gov

Attached are Comments – 1-20-00218 MEN, Russell Brook, 1-21-0096 Daugherty Creek/Snuffins Creek (both THPs)

Please apply comments to each noted plan (please include these comments in the file of each plan)

Alan Levine
Coast Action Group
Affiliate of Redwood Coast Watersheds Alliance
(707) 542-4408

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COAST AREA OFFICE
RESOURCE MANAGEMENT

COAST ACTION GROUP
126 Steiner Ct.
Santa Rosa, CA 95404

An affiliate of the Redwood Coast Watersheds Alliance

August 4, 2021

California Department of Forestry
Forest Practices

Subject: Comments – 1-20-00218 MEN, Russell Brook, 1-21-0096 Daugherty Creek/Snuffins Creek

Dear Review Team

These comments are process comments (commission and omissions) related directly to issues for Director disapproval of these projects.

BACKGROUND

Both of these proposed THPs are in the Big River watershed. Big River is listed as impaired (California's List of Water Quality Limited Segments- 303 (d) list) by the pollutants sediment and temperature. These THPs fail to address requirements (under noted Authorities - below) for approval. The discussion (below) will demonstrate these failures – that must be corrected prior to approval of the plans.

Both of these plans are subject to an EPA TMDL for Sediment. No TMDL has been set for temperature impairment (though one is due). Neither plan discusses, or demonstrates any assurance in the plan of meeting sediment reduction requirements (per the EPA TMDL sediment reduction targets and Basin Plan Requirements under Non-Point Source Policy – Basin Plan language). There is no temperature TMDL (as stated); however requirements of the Basin Plan non-point source policy language have not been met for the pollutant temperature. The issue with both pollutants, Sediment and Temperature, is that data and discussion necessary to assure pollutant reduction to attain water quality standards and appropriate habitat conditions must be extant in the plan. This data is not included in either plan, nor are the verified means of attainment of water quality standards described and discussed in the plan. This is a violation of the FPRs (see authorities below), Cal Water Code, Non-point Source Policy, and CEQA.

It should be noted that failure to supply such monitoring, or data, precludes determination (findings) of Plan compliance with Water Quality Control Plans (WDRs, Waivers, TMDLs, and the Basin – including non-point source requirements).

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AUTHORITIES: Forest Practice Act and Rules, Cal Water Code (including regional Water Quality Control Plan/Basin Plan), California Environmental Quality Act (CEQA).

1) The Forest Practice Act and the Forest Practice Rules stated objective is consistency with the Porter Cologne Water Quality Control Act, regional Basin Plans - including protection and recovery of aquatic resources

2) Porter Cologne Water Quality Control Act, Water Code Section 13160, objective of consistency with the Federal Clean Water Act mandates must be met.

3) Under Porter Cologne, the MAA, the Forest Practice Rules, THP administration must meet Basin Plan (including non-point source and anti-degradation requirements):

State Anti-degradation Policy (Basin Plan, Chapter 3, Water Quality Objectives):

"Controllable water quality factors shall conform to the water quality objectives contained herein. When other factors result in the degradation of water quality beyond the levels or limits established herein as water quality objectives, then controllable factors shall not cause further degradation of water quality. Controllable water quality factors are those actions, conditions, or circumstances resulting from man's activities that may influence the quality of waters of the State and that may reasonably be controlled."

Nonpoint Source Policy (*found at the SWRCB web site and in the regional Basin Plan)*

Many water bodies in the North Coast Region are impaired by nonpoint sources (NPS) of pollution, such as sediment discharges and elevated water temperatures. The Policy for the Implementation and Enforcement of the Nonpoint Source Pollution Control Program (NPS Policy)14 is a state-wide policy that explains how existing permitting and enforcement tools will be used to address nonpoint sources of pollution. The NPS Policy states that all current and proposed NPS discharges must be regulated under waste discharge requirements (WDRs), waivers of WDRs, a basin plan prohibition, or some combination of these tools. A NPS pollution control implementation program is a program developed to comply with WDRs, waivers of WDRS, or basin plan prohibitions. A NPS pollution control implementation program must contain five Key elements, which are summarized as follows:

Key Element 1: Explanation of the purpose of the NPS pollution control implementation program and how it will meet water quality standards.

Key Element 2: Description of the management practices and other program elements that are to be used to meet water quality standards and an evaluation that ensures proper implementation.

Key Element 3: A time schedule with quantifiable milestones.

Key Element 4: Adequate monitoring.

Key Element 5: The potential consequences for failure.

Neither of these plans provides information, data, monitoring, or other information that complies with the Basin Plan NPS Policy Elements called for in the Basin Plan (or WDRs, Waivers, EPA TMDL sediment targets, or any implied controls to limit (or improve) temperature conditions.

4) Forest Practice Rules Section 916.9 (a) (1) states:

> *(a) Every timber operation shall be planned and conducted to protect, maintain, and contribute to the restoration of properly functioning salmonid habitat and listed salmonid species. To achieve this goal, every timber operation shall be planned and conducted to:*
>
> *(1) Comply with the Terms of a Total Maximum Daily Load. (et sec)*

Note: this rule [916.9 (a) (1)] states CDF responsibility to enforce Basin Plan Guidelines as well as TMDL mandates.

As stated in the FPRs and the Act, the intent of the administration of the Act and Rules emphasize the protection and recovery of water quality resources (along with and interagency agreement to accomplish this requirement). Thus each and every THP must demonstrate how such compliance is assured (in the case of impaired waters, additional actions are necessary to demonstrate compliance – as noted in TMDLs, State Non-point Source Policy and other noted authorities). Furthermore, the FPRs (including ASP rules – where ASP is found by NOAA Fisheries to not be fully protective) as applied in these THPs are minimum (baseline) protections that may not (do not) meet the requirements of the above noted authorities (unless justified by sufficient monitoring over time showing improvement - as movement towards attainment of water quality standards) and that there are sufficient management plans, with timelines, in place to assure continued recovery (also to be justified/verified with evidence supplied by monitoring).

The above regulatory framework is stated in this letter for grounding in the discussion that CDF must accept stated responsibility of its mission to protect water quality values (through all of the above) in exercising its lead agency responsibility.

898.2 Special Conditions Requiring Disapproval of Plans

The Director shall disapprove a plan as not conforming to the Rules of the Board if any one of the following conditions exist:

(c) There is evidence that information contained in the plan is incorrect, incomplete or misleading in a material way, or is insufficient to evaluate significant environmental effects. The sufficiency of the information provided in the THP to evaluate significant environmental ***effects***

shall be judged in light of what is reasonable and necessary.

(h) Implementation of the plan as proposed would cause a violation of any requirement of an applicable water quality control plan (Basin Plan) adopted by the State Water Resources Control Board (this would include State Non-point Source Policy – which is also in the Basin Plan).

Big River Total Maximum Daily Load for Sediment - EPA Region 9

The TMDL discusses the watershed condition(s) and characteristics, watershed habitat conditions for salmonids, water quality standards, summary of water quality indicators and targets, sources of sediment (separated background loading and loading aggravated by land use – timber harvest), and the TMDL (reductions of pollutant inputs needed to attain water quality standards).

Monitoring information in either THP is insufficient (in some cases totally not present) indicating current status of targets or movement (trends) towards the improvement in the suite of Indicator Targets (noted in the TMDL) – for the pollutants sediment or temperature. Nor, do the plans demonstrate or assure movement (recovery) in the direction of improved conditions. However, the TMDL does provide a baseline (indicators related to sediment) for sampling.

The source analysis indicates that management activity is responsible for significant percentage of sediment inputs above background levels.

The TMDL sets the total sediment loading capacity at 125% of background sediment delivery.

LOAD ALLOCATIONS FOR NONPOINTSOURCES (MANAGEMENT-ASSOCIATED LOADS) – with a loading reduction needed of 75% (Cumulative Reduction – from land use/timber operations). This is broken down by source and activity in Source Analysis in the EPA TMDL (pp. 28,29)

These THPs (all of MRC THPs) summarize sediment reduction activity – with numbers (usually noting the total cubic yards of sediment controlled). However, they do not show (via monitoring or work verification) that the numbers they are presenting are meeting the required standards/targest for attainment of water quality standards. There is no baseline presented from which to make assessment. Nor is relevant data presented showing sediment production potential (existing controllable sources and potential sources and sources from roads, skid trails and disturbance from operations, amount sediment controlled, the amount of sediment reduction over time (as opposed to the sediment produced from roads and harvest activity). The very same issue arises with the pollutant –temperature. There is no base line monitoring data or monitoring data showing trends. Thus, rational assessment of progress in the attainment of water quality standards is impossible and the public and review team are deprived of information/data presented in a form that would allow for appropriate and rational decision making.

There is no data presented on the issue of temperature. Both THPs claim that trees marked for

removal will not worsen temperature conditions (where the impaired listings show stream temperatures to be out of the range that would support salmonid survival in all life stages). This information does not meet the required analysis and data presentation required by: 1) the rules for Director decision, 2) Basin Plan (inclusive of non-point source language), 3) CEQA, 4) Big River TMDL sediment reduction targets.

These plans do not meet the legally required standards of disclosure, discussion and control of all sediment and temperature sources. (in compliance with non-point source policy, CEQA, and the FPRs)

Elements of an Erosion Control Plan (ECP must include and assess)

Each plan must include an Erosion Control Plan. Though in the case of these THPs the ECPs are incomplete – missing baseline data, data from road surface erosion and road precipitated landsliding or other failures. Additionally absent from the THPs are instream monitoring noting trends in sediment delivery and/or evidence of recovery.

At a minimum and ECP should include:

Baseline Data Inventory A Baseline Data Inventory includes an ownership-wide (or planning watershed) inventory of Sediment Delivery Sites. Sediment Delivery Sites are controllable, human-caused erosion sites that are currently eroding or have the potential to erode in such a manner as to deliver measurable amounts of sediment. The inventory should include such features as undersized culverts, culverts with diversion
potential, eroding sidecast or fill, downcutting inside ditches, etc. The Baseline Data Inventory shall include a description of all active and potential sediment sources
resulting from roads, landings, skid trails, timber operations and agricultural operations, and other significant human-caused earth movement activities that have or might have the ability to enter waters of the state.

The Baseline Data Inventory shall include, at a minimum:
• A description of the inventory method used;
• A topographic map with 80 foot intervals showing the ownership boundary and the location of all inventoried sites, as well as roads and drainages; and
• For each site, an estimate of the volume of sediment and the relative potential for sediment delivery. The Baseline Data Inventory must be comprehensive and may follow as examples, completely or in part, the inventory methods described in the Assessment and Implementation Techniques for Road-Related Sediment Inventories and Storm-Proofing. (e.g. William Weaver, of Pacific Watershed Associates, Inc.); the *STAR* Worksheet system of the Watershed and Aquatic Habitat Assessment (September 29, 1997,) Inventory and Monitoring Worksheet developed by U.C. Davis (1998). 2. Sediment Reduction Schedule)

The Sediment Reduction Schedule shall describe how and in what order of priority the sediment discharges from the Sediment Delivery Sites identified in the Baseline Data Inventory will be reduced in accordance with the schedule set forth in a an Implementation Schedule section.

The Baseline Data Inventory shall be used when prioritizing and conducting sediment delivery reduction activities, and the highest priority for sediment delivery reduction shall be assigned to those sites with the greatest potential to discharge sediment to a watercourse that supports fish.

Assessment of Unstable Areas

The Assessment of Unstable Areas shall identify through modeling, data analysis and/or a field inventory, areas of instability across the property. Unstable Areas are areas with a naturally high risk of erosion and areas or sites that will not reasonably respond to efforts to prevent, restore or mitigate sediment discharges. Unstable Areas are characterized by slide areas, gullies, eroding stream banks, or unstable soils that are capable of delivering sediment to a watercourse. Slide areas include shallow and deep seated landslides, debris flows, debris slides, debris torrents, earthflows, headwall swales, inner gorges and hummocky ground. Unstable soils include unconsolidated, non-cohesive soils and colluvial debris.

The Assessment of Unstable Areas shall include, at a minimum:

• All known active and potential shallow and deep-seated landslides, debris flows, debris slides, debris torrents, earthflows, headwall swales, inner gorges, and unstable soils.

• All known active or potentially active gullies and streambank erosion sites, as appropriate, but should not include the sites identified in 1. above. Preparers of the Assessment of Unstable Areas may but are not required to use existing California Department of Conservation maps such as the series entitled "Geology and Geomorphic Features Related to Landsliding" or a digital terrain-type model like the one developed by Louisiana Pacific Corporation in its draft Sustained Yield Plan for Coastal Mendocino County (1997) in combination with field-based maps of Unstable Areas

Monitoring Plan

The Monitoring Plan shall describe the method for monitoring the effectiveness of the sediment control efforts the landowner has implemented for the Sediment Delivery Sites identified in the Baseline Data Inventory. The monitoring method must be consistent with the submitted Baseline Data Inventory method so that results are comparable from year to year. The results of the sediment control efforts and any other erosion control related activities, including the implementation of land management measures, shall be included in the plan and submitted to the Regional Water Board in an annual report.

In addition, the landowner (MRC) should establish instream monitoring points above and below any significant land management activity on their properties and in potential anadromous fish refugia – to track and validate compliance with non-point source, water code, basin plan, TMDL, and CEQA requirements.

As noted above: The absence of monitoring (including noted baseline conditions) makes

determination of compliance with a TMDL, WDR or Waiver, or Basin Plan (including non-point source requirements) – impossible.

WATERSHED CONDITIONS (EPA TMDL)

In general, the most sensitive beneficial use in the Big River watershed – protection of the cold water fish species is impaired by poor quality summer rearing and overwintering habitat conditions, excess sediment, lack of deep pools, fair to poor spawning gravels (primarily embeddedness), low large woody debris (LWD) volume, low availability of canopy, high temperatures, and a lack of connection to off-channel habitat (NCRWQCB 2001a, 2001b). Excess sediment is adversely impacting the number and volume of pools. Sediment is also causing moderate to high embeddedness of substrate and spawning gravels in the basin. Recently-increased road building and timber harvest activities may cause additional degradation in the future, although the impacts are not yet reflected in current stream habitat conditions.

Throughout the South Fork Big River, pools are shallow and spawning gravels are embedded. Canopy cover is low and water temperatures are high. In Chamberlain Creek, stream channels are entrenched and have low volumes of LWD. Pool depths are shallow, and embeddedness is high. Sediment inputs are high and canopy cover is low.

Lower Big River PW. *Generally speaking, there is little change apparent in the lower reaches of the estuary. Further upstream, visible changes include channel narrowing by riparian vegetation encroachment onto what were formerly exposed alluvial deposits or former mudflat areas. The number of roads has noticeably increased, a modest amount of residential development has occurred, and the overall age and density of the forest stands appear to have increased. In one photo, the average width of the roads has increased along with increased numbers of turnouts and landings. Extensive areas of timber harvest were visible in some areas, along with a high density of skid trails.*

The EPA TMDL notes that the Road Density in the mainstem is approx. 7 mi/mi2 and Daugherty Creek approx. 6 mi/mi2. These are high road densities and by all accounts in all the literature are a major factor not considered (calculated in a sediment budget) with the inclusion of total sediment production estimates from roads skid trails and disturbance from operations. (this is not consistent with requirements to disclose and estimate outcomes of management necessary to establish progress towards attainment of water quality standards)

Native surface roads were 83% of the total, followed by rocked roads at 14%,

Approximately 20% of the current loading (78 t/mi2/yr) is allocated to management-associated nonpoint sources (management-related landsliding, skid-trail surface erosion and road surface erosion).

Background sources comprise 80% of the load allocation (315t/mi2/yr), including non-management landsliding, soil creep, and fluvial erosion.

The TMDL analysis determined that road and skid trail related sediment sources are approx. 18% of the total TMDL allocation and where the reduction target is 70%.

This issue is raised as there is no estimate, number, or calculation of the road and skid trail potential, or actual, sediment input. The same issues arise in the THP analysis of stream conditions – where there is some data on current conditions – with no data on baseline conditions or changes over time - trends.

This scenario is also mimicked in discussion of the pollutant temperature – where there is no data presented representing baselines, current conditions, or trends.

How could one determine which way things are going? Or – even get an accurate picture of current conditions and how they fit with habitat needs and progress towards target attainment?

CEQA

CEQA requires full disclosure of conditions in the plan (inclusive of historic and current watershed conditions), activities to be undertaken, potential impacts of activities, and actions taken to remedy potential impacts, and a monitoring plan to assure compliance. Due, to the impaired status of Big River and actions needed to be taken to attain water quality standards – there must be baseline data and a description of actions that will assure compliance with noted recovery targets. These items and related discussion and remedies are absent from these THPs.

Conditions as stated in each Plan (what is there and what is not there)

We know that the watercourse conditions in Big River are not meeting water quality standards (not supporting beneficial uses and not meeting water quality objectives).

The EPA TMDL assigns an amount of pollutant loading (sediment) to roads, skid trails, and timber harvesting operations (disturbance from timber harvesting – including compaction from the roads and skid trails + timber operations that leads to increased runoff and peak flows – or diminished time to peak flow – which indicates increased, and concentrated, hydraulic energy which causes more failures and sheet and rill erosion.). The studies in Casper Creek (Cafferata and Reid) and the literature (Klein et al and other literature) all support this conclusion. Neither THP includes data that would support necessary determinations, or findings that can support conclusions that are displayed in the THPs. The failure to include such data and analysis is inconsistent with what is required by the noted authorities (necessary data would include – inventories of sediment sources and potential sediment sources, accounting for total sediment inputs vs remedies applied, stream conditions from baseline to current conditions, and/or changes in conditions over time). Thus, these THPs fail to supply a full description of the plan (conditions related to the plan), and there is no way to determine if progress is being made towards attainment of water quality standards and/or if the mitigations noted in the THPs are sufficient to move the watercourses towards recovery in any reasonable period of time.

These watercourses appear in no better condition than they were over 20 years ago (when they

were listed as impaired). There are no demonstrated changes in stream conditions in almost that same period of time from when the Threatened and Impaired Rules, followed by ASP, were put in place.

Additionally; NOAA Fisheries states that the T & I rules, and ASP, are not fully protective. Though, they do say that these rules are an improvement over the standards FPRs.

1-20-00218 MEN, Russell Brook

This THP does note Big River (and tributaries) are listed as impaired (sections 2,3, and 4).

There are point in time monitoring results for some sediment affected conditions included in the plan. There is an absence of baseline data, or data over time from which trends can be determined. There are no calculations regarding how much sediment is produced from operations, disturbance, roads, or the 82 stream crossings and culverts noted in the plan. Roads are not even mentioned as ongoing or potential sediment sources.

The ECP discussion estimates the removal of 1200 cubic yards of sediment. There is no sediment budget assessing the potential sediment inputs from the sources noted above. Thus, there can be no determinations made in regards to compliance with the stated FPRs, Cal Water Code, Basin Plan non-point source requirements, EPA TMDL targets, and/or CEQA requirements for disclosure of potential effects of the proposed plan.

The plan discloses no temperature data at all (Note: Temperature is a controllable pollutant). Section 3 (p. 108) Water Temperature Effects – states that the mitigations in Section 2, #26 are sufficient, or even beneficial. Section 2, #26 applies the standard ASP management constraints. There is a statement that the temperature mitigations (standard ASP rules), as applied, may be beneficial. Again, no temperature data is supplied and there is no justification or valid basis for this statement.

1-21-0096 Daugherty Creek/Snuffins Creek

The plan does note the watershed is impaired by the pollutant – sediment. The plan fails to note impairment by the pollutant temperature.

There is some monitoring of stream habitat conditions and sediment substrate conditions. (current point in time data). There are no baselines provided and no evidence of improving conditions (over time) – for either pollutant – temperature or sediment.

For the pollutant sediment, there are no calculations of total sediment potential inputs from operations, roads and skid trails (and other sources) and the quantities of sediment controlled (or removed) to offset the inputs. The plan notes the construction and reconstruction of 6682 feet of road (some in areas of existing trails or historic road prism). No number of sediment production is attached to the road construction/reconstruction. There is no estimate (or calculation, or data to demonstrate trends) on how sediment production and/or control methods meet EPA TMDL targets, comply with Basin Plan non-point source requirements, CEQA disclosure

requirements. There is a "Finding" that the THP minimizes sediment production by controlling sources. There is no evidence supplied to support this finding.

This plan fails to note that Big River watershed (and tributaries) are impaired by the pollutant temperature. There is no temperature data provided at all. The plan includes a "Finding" that stream buffers (ASP) as provided will set a high level of shade that will moderate temperature effects. No evidence is provided to support this statement.

Conclusion

These two Timber Harvest Plans can not be approved by the Director until the necessary data and information are provided in the plan for the informed decision making process and consistent with the noted authorities.

Alan Levine
For Coast Action Group

Sources:

The sources listed (below) support discussion offered in these comments that roads and skid trails, timber operations and related disturbance are responsible for significant levels of sediment production and/or elevated temperature related to impaired conditions in the Big River watershed.

Applications of Long-Term Watershed Research to Forest Management in California: 50 Years of Learning from the Casper Creek Experimental Watersheds, 2013 Cafferata and Reid

https://www.fs.fed.us/psw/publications/reid/psw_2013_reid001_cafferata.pdf

Big River Total Maximum Daily Load for Sediment - EPA Region 9, 2001

https://19january2017snapshot.epa.gov/www3/region9/water/tmdl/big/bigfinaltmdl.pdf

Road Sediment Production and Delivery: Processes and Management
Lee H. MacDonald (Colorado State University, USA) ____ Drew B.R. Coe (Redding, California, USA)
https://ucanr.edu/sites/forestry/files/138028.pdf

A Method for Measuring Sediment Production from Forest Roads, Keith Kahklen

https://www.fs.fed.us/pnw/pubs/pnw_rn529.pdf

California Nonpoint Source Policy (Overview, Implementation Plan, links to management measures, etc).

https://www.waterboards.ca.gov/water_issues/programs/nps/plans_policies.html

California 2020 – 2025 Nonpoint Source Program Implementation Plan

https://www.waterboards.ca.gov/water_issues/programs/nps/docs/plans_policies/NPS%202020-25%20Accessible%20MH%203.9.21.pdf

Logging and turbidity in the coastal watersheds of northern California, Klein et al, 2011

https://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.730.8559&rep=rep1&type=pdf

Letter(s): National Marine Fisheries to the Board of Forestry 2009,2006 commenting on Threatened and Impaired Rules and Anadromous Salmonid Protection Rules (attached)

23 CCR § 2915
§ 2915. Policy for the Implementation and Enforcement of the Nonpoint Source Pollution Control Program.

On May 20, 2004, the State Water Resources Control Board (SWRCB) adopted Resolution No 2004-0030, adopting the Policy for the Implementation and Enforcement of the Nonpoint Source Pollution Control Program(NPS Implementation Policy) in accordance with California Water Code section 13369.

A nonpoint source (NPS) pollution control implementation program is a program developed to comply with SWRCB or RWQCB waste discharge requirements (WDRs), waivers of WDRs, or basin plan prohibitions. The policy provides a framework for developing NPS pollution control programs throughout the state. NPS pollution control programs may be developed by the SWRCB, a RWQCB or a third-party entity. The policy defines “third-party entities” as entities that are not actual dischargers under RWQCB/SWRCB permitting authority.

All NPS pollution control programs endorsed or approved by a RWQCB as sufficient to meet RWQCB obligations to protect water quality are required, at a minimum, to meet the requirements of the following key elements, thus providing consistent program requirements throughout the state.

1. A NPS control implementation program's purpose must be explicitly stated, and must be designed to achieve and maintain water quality objectives and beneficial uses, including any applicable antidegradation requirements.

2. The NPS program shall include a description of the management practices to be implemented and the process to ensure and verify proper implementation.

3. Where a RWQCB determines time is necessary to achieve water quality requirements, a time schedule and corresponding quantifiable milestones to measure progress are required.

4. Feedback mechanisms must be included in the implementation program so that the RWQCB, dischargers and the public can determine whether the program is achieving its stated purpose(s), or if additional or other actions are required.

5. In addition, each RWQCB shall make clear, in advance, the potential consequences for failure to achieve a program's stated purposes and make clear that any enforcement action that needs to be taken will be taken against individual dischargers, not the third parties.

Investigation, identification, and enforcement of NPS discharger noncompliance with State water quality control laws, regulations, policies and plans shall be consistent with the requirements of the State Water Resources Control Board Water Quality Enforcement Policy (Title 23, California Code of Regulations section 2910).

HISTORY

1. New section summarizing “Policy for Implementation and Enforcement of the Nonpoint Source Pollution Control Program,” Resolution No. 2004-0030 adopted 5-20-2004 by the State Water Resources Control Board; approved by OAL and effective 8-26-2004 pursuant to Government Code section 11353; filed 8-26-2004 (Register 2004, No. 35).
This database is current through 7/9/21 Register 2021, No. 28
23 CCR § 2915, 23 CA ADC § 2915

(1st Form Letter rec'd)
See attached list of commenters

From: Chad Swimmer <cswimmr@gmail.com>
Sent: Tuesday, September 14, 2021 1:22 PM
To: Santa Rosa Public Comment@CALFIRE
Subject: Public comment on THP 1-20-00218-MEN "Russell Brook"

Warning: this message is from an external user and should be treated with caution.

Dear CAL FIRE Santa Rosa Review Team,

I am writing to submit public comments on THP 1-20-00218-MEN "Russell Brook". Please consider these comments and respond in writing to all points raised herein. The Russell Brook THP would seriously negatively impact the environment and requires more environmental review before it can be approved.

First, the THP proposes to conduct selection harvesting within Class 1 and large class 2 WLPZs. According to MRC's option A, there are strict prerequisites that must be met before any such harvesting in these zones can occur. The necessary trigger for the selection harvest in Class 1 and Class 2 WLPZs is a total conifer basal area of >260 square feet for both trees greater than and less than 16 inches diameter. (MRC Option A, Attachment A, P. 30). MRC has not met its burden of demonstrating that the stands it intends to harvest within Class 1 WLPZs and Large Class 2 WLPZ meet these criteria. This is evidenced by the fact that the THP does not describe the stand description for the selection area. Without that information, the THP cannot reliably determine the extent of the environmental impact or whether MRC is complying with its Option A.

Second, the THP has failed to adequately disclose large old trees within the plan area that will be impacted by harvesting as required by the Forest Practice Rules. We know that these trees exist because they were marked for prior mitigation but the THP has failed to adequately document them and explain how environmental impacts to them will be avoided as required by the Forest Practice Rules and CEQA.

Finally, this THP proposes to remove a substantial amount of tanoak without conducting sufficient environmental review of the consequences. First, nowhere does the THP address how the ongoing sudden oak death epidemic will interact with the removal proposed in this THP. Second, the THP fails to explain why MRC should be permitted to violate Mendocino County Measure V by utilizing the technique known as hack and squirt to leave dead standing trees to become fire hazards. CAL FIRE should not approve a THP that blatantly intends to violate county law.

For these reasons, more environmental review is necessary to ensure that environmental impacts are adequately addressed and mitigated before approval can move forward. Thank you for your time and consideration.

Sincerely,
Chad Swimmer
16315 Old Caspar Railroad
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Public Comment ID: 21PC-000000577
Comment Received Date: 10/1/2021
Comment for Plan Number: 1-20-00218-MEN
County: Mendocino
Closest City: Willits
Email to Notify for Official Response: matt@wildcalifornia.org

Comment:
The following documents are submitted by the Environmental Protection Information Center (EPIC) as supporting evidence for our comments on this THP which were submitted on 9/21/2021 & 3/8/2021. Please include these documents in the record.

Attachments not routed due to volume. They are available for review in the Santa Rosa Forest Practice Office or online at: https://caltreesplans.resources.ca.gov/caltrees

RECEIVED
OCT 01 2021
COAST AREA OFFICE
RESOURCE MANAGEMENT

From: Ho Yin Au <hello@hoyinau.com>
Sent: Wednesday, September 15, 2021 11:50 AM
To: Santa Rosa Public Comment@CALFIRE
Subject: Public comment on THP 1-20-00218-MEN "Russell Brook"

Warning: this message is from an external user and should be treated with caution.

Dear CAL FIRE Santa Rosa Review Team,

To whom this may concern,

I'm writing in opposition to THP 1-20-00218-MEN. We should preserve our redwood forests for us to enjoy now, and for our future generations to enjoy later. I live in New England, where most of its forests were cleared back in the late eighteenth and early nineteenth centuries for timber. The resulting erosion and ecological damage clogged up and polluted streams and caused massive floods. Logging activity led to wildfires that burnt much of the Pemigewasset Wilderness and beyond.

When hiking in that part of the world, "There used to be trees that soared into the skies with trunks so thick that you couldn't wrap your arms around them," was a recurring thought (and mantra amongst hiking guides). Let us not repeat the mistakes of our past. Preserve forests for all of us to enjoy now, and for all of our children and grandchildren to enjoy in the future, so that they're not left wondering what they looked like before they were logged.

In addition, with recent events exacerbated by climate change, I should not have to remind CalFire that wildfires have increased in size and intensity, extreme flooding have become more frequent, and extremely droughts have led to costly life-saving measures such as trucking water in Mendocino County. It is now more crucial than ever to ensure we have enough forests to help sequester carbon and retain water. We shouldn't contribute to more destruction of our ecological system. Our economy depends on it. Our species's survival depends on it.

Lastly, these are lands that have cultural significance to the Pomo people. The logging of old growth trees will contribute to the diminishment and devastation of their sacred and spiritual sites.

I also would like add my support to the reasons against the THP put forth by the Environmental Protection Information Center here: https://epic.salsalabs.org/actionalertrussellbrookthp/index.html

Thank you for your time and consideration.

Ho Yin Au
Malden, MA

Sincerely,
Ho Yin Au
710 Main St Apt 2
Malden, MA 02148

RECEIVED

SEP 15 2021

COAST AREA OFFICE
RESOURCE MANAGEMENT

From: Santa Rosa Review Team@CALFIRE
Sent: Tuesday, September 21, 2021 10:16 AM
To: Santa Rosa Public Comment@CALFIRE
Subject: FW: Public Comments re THP 1-20-00218-MEN
Attachments: Russell Brook Final Comments.pdf

From: Matt Simmons [mailto:matt@wildcalifornia.org]
Sent: Tuesday, September 21, 2021 10:04 AM
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Cc: jacob@frmforestry.com; Tom Wheeler <tom@wildcalifornia.org>; Justin Augustine <jaugustine@biologicaldiversity.org>; Linda Perkins <lperkins@mcn.org>; SClub MEN Chair Mary Walsh <bella@mcn.org>; Hutchins, Adam@Wildlife <Adam.Hutchins@wildlife.ca.gov>
Subject: Public Comments re THP 1-20-00218-MEN

Warning: this message is from an external user and should be treated with caution.

Dear Santa Rosa Review Team,

Please see the attached comments regarding THP 1-20-00218-MEN "Russell Brook" submitted by EPIC, the Mendocino Group of the Sierra Club, and Center for Biological Diversity.

We appreciate your consideration of these comments in your decision whether to approve this THP.

Sincerely,
--
Matthew Simmons
Pronouns: he/him/his
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SEP 21 2021
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RESOURCE MANAGEMENT

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SEP 21 2021

COAST AREA OFFICE
RESOURCE MANAGEMENT

To: CalFire Santa Rosa Review Team

From: Environmental protection Information Center, Mendocino Group of the Sierra Club, & Center for Biological Diversity

Date: 9/21/2021

Re: Russell Brook Timber Harvest Plan 1-20-00218-MEN

Dear Cal Fire Santa Rosa Review Team,

On behalf of the Environmental Protection Information Center, the Mendocino Group of the Sierra Club, and the Center for Biological Diversity (collectively "conservation organizations"), please accept these comments on THP 1-20-00218-MEN "Russell Brook". These comments are in addition to EPIC's comments submitted on March 8th, 2021. The THP preparation and approval process is the functional equivalent of the preparation of an environmental impact report (EIR) contemplated by CEQA.[1] The purpose of a THP is "to identify the proposed harvest plan, provide public and governmental decisionmakers with detailed information on the project's likely effect on the environment, describe ways of minimizing any significant impacts, point out mitigation measures, and identify any alternatives that are less environmentally destructive."[2] CAL FIRE's approval of timber operations is subject to CEQA's standard of judicial review.[3] "If an EIR fails to include relevant information and precludes informed decision-making and public participation, the goals of CEQA are thwarted and a prejudicial abuse of discretion has occurred."[4] The conservation organizations are concerned about several issues which have not been adequately addressed within the THP and which we believe constitute prejudicial abuses of discretion.

I. Hardwood Removal Will Have a Negative Environmental Impact That Has Not Been Adequately Considered

[1] *Environmental Protection Information Center, Inc. v. Johnson*, 170 Cal. App. 3d 604, 61, (1985).
[2] *County of Santa Cruz v. State Bd. of Forestry*, 64 Cal.App.4th 826, 830, (1998).
[3] Cal. Pub. Res. Code §§ 21168, 21168.5; *Sierra Club v. State Bd. of Forestry*, 876 P.2d 505, 7 Cal. 4th 1215 (1994).
[4] *Save Our Peninsula Committee v. Monterey County Board of Supervisors*, 87 Cal.App.4th 99, 128 (2001)

The conservation organizations are concerned that this Timber Harvest Plan, which calls for substantial removal of tanoak and other hardwoods, would produce significant environmental impacts and would violate Measure V, a local nuisance ordinance that prohibits the practice.

The THP states that "Tanoak under 24" DBH are proposed for treatment within the Variable Retention Units, Rehab Unit, and portions of the Group selection units."[5] In the Rehab and Variable retention units, "except where marked with an "O", "W", or "L"… hardwoods shall be harvested or controlled."[6] The purpose of this is to "reduce tanoak site occupancy to historical levels." Control methods will include hack and squirt.[7] The hack and squirt method involves making a series of small cuts into the bark of the tree followed by filling those cuts with herbicide. With access to the interior of the tree, the herbicide is able to kill the tree quickly and leaves a dead tree standing. The trees are left standing in order to reduce the work required to treat them as well as to maintain canopy cover. The types of herbicide which have been used in the past include glyphosate, imazapyr, and triclopyr. Imazapyr is banned in Europe except for essential use. Glyphosate is heavily regulated and sometimes outright banned around the world. As discussed below, the proposed "hack and squirt" hardwood removal contained in this THP both is likely to produce significant effects and violates local nuisance law. Accordingly, CALFIRE must reject this THP.

a. Hardwood Removal will Produce Significant Unstudied Environmental Effects

The THP envisions the killing of a large number of the hardwoods in the THP area.[8] Doing so will have a sweeping negative impact on the coast redwood ecosystem because hardwoods provide fundamental habitat and nutrition to coast redwood ecosystems. This is particularly concerning because the invasive disease Sudden Oak Death (SOD) is currently decimating hardwood populations throughout California. Despite the ecosystem benefits provided by hardwoods and the current SOD epidemic, the THP fails to actually consider the environmental impacts of killing a large number of hardwoods within the THP area. Therefore, CALFIRE must reject the proposed THP because it both contains misleading information and fails to incorporate feasible mitigation measures.

i. <u>Hardwoods are a fundamental element of coast redwood ecosystems</u>

Killing a large percentage of the hardwoods in the THP area will have negative effects on local wildlife as tanoaks are a vital part of the California Coastal ecosystem. A mature tanoak can produce more than 200 pounds of nuts per year with estimates ranging as high as 1000 pounds per year for old growth trees.[9] Researches have described tanoak as having "ecological impacts out of proportion to their representation" and as "the principal (or only) nut-producing species" in the California Coastal ecosystem.[10] Their acorns are an irreplaceable food source for mammals

[5] Russell Brook THP, sec. 2, p. 13.
[6] Russell Brook THP, sec. 2, p. 18.
[7] Russell Brook THP, sec. 2, p. 13.
[8] Russell Brook THP, sec. 2, p. 18.
[9] Bowcutt, Frederica. *The tanoak tree: An environmental history of a Pacific Coast Hardwood*. University of Washington Press, 2015. At p.21
[10] McPherson, Brice A., et al. "Sudden oak death in California: disease progression in oaks and tanoaks." *Forest Ecology and Management* 213.1-3 (2005): 71-89.

and birds.[11] The following quote from Ramage et al. (2011) exemplifies the importance of Tanoak to coast redwood wildlife including the northern spotted owl:

> Tanoak regularly produces large nutritious acorns that are utilized by many wildlife species (e.g. bear, deer, and several rodent and bird species), in contrast to redwood's unpredictable crops of small and light seeds with limited wildlife value. If tanoak is not replaced by one or more functionally similar tree species (e.g. a true oak species), its loss could result in serious cascading impacts. For instance, acorns are a primary food source for the dusky footed woodrat (*Neotoma fuscipes Baird*), which is in turn a primary food source for the northern spotted owl.[12]

Tanoak also "help to create forests with multi-layered tree canopies favorable to northern spotted owls."[13] Other predators that prey on tanoak-reliant herbivores include the coyote, the mountain lion, and the pacific fisher.[14]

Tanoak roots also support a diverse community of fungi which provide crucial ecological benefits.[15] In coast redwood forests, tanoak is the dominant ectomycorrhizal host.[16] Researchers have predicted that the current loss of tanoak, due to sudden oak death, will cause a correlational decline in beneficial ectomycorrhizal fungi which "will likely disrupt the function and structure of these forests."[17] These fungi allow all woody plants, including redwoods, to gather nutrients from the soil and their decline will negatively impact the health of the entire ecosystem.[18] Researchers have also recently discovered that Tanoak have their own insect pollination pathway that certain species of insect may be dependent on.[19] This newly discovered pathway highlights how much we are still learning about the importance of this species which has been neglected by researchers until recently.

ii. <u>Deliberate poisoning of hardwoods compounds issues of hardwood loss associated with Sudden Oak Death</u>

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[11] IMMEL, D. L. 2006. Plant Guide: tanoak Lithocarpus densiflorus (Hook. & Arn.) Rehd. USDA, NRCS, National Plant Data Center.

[12] Ramage, Benjamin S., Kevin L. O'Hara, and Alison B. Forrestel. "Forest transformation resulting from an exotic pathogen: regeneration and tanoak mortality in coast redwood stands affected by sudden oak death." *Canadian Journal of Forest Research* 41.4 (2011): 763-772.

[13] Bowcutt, Frederica. *The tanoak tree: An environmental history of a Pacific Coast Hardwood*. University of Washington Press, 2015. At p.14

[14] Bowcutt, Frederica. *The tanoak tree: An environmental history of a Pacific Coast Hardwood*. University of Washington Press, 2015. At p.14

[15] BERGEMANN, S. E. AND M. GARBELOTTO. 2006. High diversity of fungi recovered from the roots of mature tanoak (Lithocarpus densiflorus) in northern California. Canadian Journal of Botany 84:1380–1394.

[16] Bergemann, S. E., and M. Garbelotto. "High diversity of fungi recovered from the roots of mature tanoak (Lithocarpus densiflorus) in northern California." *Botany* 84.9 (2006): 1380-1394.

[17] Bergemann, Sarah E., et al. "Implications of tanoak decline in forests impacted by Phytophthora ramorum: girdling decreases the soil hyphal abundance of ectomycorrhizal fungi associated with Notholithocarpus densiflorus." *Madroño* 60.2 (2013): 95-106.

[18] Molina, Randy. "The Role Mycorrhizal Symbioses in the Health of Giant Redwoods and Other Forest Ecosystems." USDA Forest Service Gen. Tech. Rep. PSW-151. 1994

[19] Wright, Jessica W., and Richard S. Dodd. "Could tanoak mortality affect insect biodiversity? Evidence for insect pollination in tanoaks." *Madroño* 60.2 (2013): 87-94.

The death of a mature tanoak due to Sudden Oak Death (SOD) in California was first recorded in 1994. SOD is caused by the invasive pathogen Phytophthora ramorum which obstructs plant xylem cells and reduces water supply until eventually killing the host. The disease causes mature tanoaks to develop cankers which bleed profusely before the tree eventually dies off. Tanoak is incredibly susceptible to SOD with death usually occurring 2-8 years after infection. Since its emergence, the disease has killed tens of millions of trees in California forests and has reached epidemic proportions. The most recent estimate is that "38.94 million tanoak stems [have been] killed [by SOD] since the outbreak emerged."

Researchers have raised the alarm about the effect of SOD induced Tanoak decline on Coastal Redwood ecosystems. Ramage et al (2010) found that "[c]urrent research indicates drastic declines in tanoak populations and mounting evidence (e.g., field studies, genetic resistance trials, disease progression models) suggests that SOD could eventually drive tanoak toward extinction in redwood forests." Those same researchers predict that because "tanoak is extremely valuable as a food source to numerous wildlife species . . . its decline could have major impacts on redwood forest communities." The effects of hack and squirt are very similar to the effects of SOD, in fact, researchers have used hack and squirt to simulate the effects of SOD.

The THP states that "there are no visible signs [of SOD] within the THP area."[20] Mendocino county is currently considered "at high risk for widespread *P. ramorum infection*."[21] If it is true that there is currently no SOD within the THP area, it is one of a quickly diminishing number of places in California where SOD does not severely threaten tanoak. Other THPs in Mendocino County have begun to forego the use of herbicide on hardwoods because SOD has had such a devastating effect on hardwoods within their plan areas.[22] As this disease continues to spread through the county, areas without infection will become more and more rare. Nevertheless, the THP fails to account for the potential compounded impact of killing tanoaks in an area that is susceptible to SOD. By not considering the compounded impacts of SOD and hack n' squirt on tanoaks, the THP has failed to analyze important information that will have a profound effect on the ecosystem within the THP area and the surrounding area.

The conservation organizations are further concerned that the THP does not contain sufficient safeguards to protect the area against SOD transmission. SOD can be spread by equipment or workers entering a new area after previously working in an area infected by SOD.[23] While the THP does contain provisions for preventing the spread of SOD *out* of the THP area, it does not currently contain any provisions for preventing the spread of SOD *into* the THP area. Best Management Practices for preventing the spread of SOD during forestry have been developed by California's Sudden Oak Death Taskforce.[24] These include inspecting and sanitizing equipment vehicles before they enter a new area and making sure workers are sanitizing their boots before

[20] Russell Brook THP, sec. 2, p. 18.1.
[21] Bowcutt, Frederica. *The tanoak tree: An environmental history of a Pacific Coast Hardwood*. University of Washington Press, 2015. At p.108
[22] Little North Fork Big River THP, 1-20-00173-MEN sec. 2, p.13.
[23] California Oak Mortality Taskforce, Sanitation measures to minimize pathogen spread
[24] California Oak Mortality Taskforce, Sudden Oak Death Guidelines for Forestry

entering a new area. We believe that such precautions are both sensible and necessary particularly given the fact that the project intends to decimate the tanoak population. The THP is incomplete without these additional mitigation measures.

The THP fails to take the threat of hardwood loss seriously. The cumulative impacts assessment states that the widespread killing of hardwoods is not a significant impact on wildlife. However, the cumulative impacts assessment has failed to account for the impacts of SOD on the overall availability of tanoak at a landscape level. This is despite the fact that the THP is in an area designated as a Zone of Infestation for SOD. Given that current research suggests that tanoak is already seriously threatened in Redwood forests due to SOD, the assumption that wildlife dependent on hardwoods will simply be able to find a different place to live is unsupported.[25] Moreover, the cumulative impacts assessment is deeply flawed because it fails to consider how killing a large number of hardwoods within the context of a forest already struggling with the SOD epidemic will produce a cumulative negative impact to the ecosystem. By not considering how a devastating epidemic has reduced and will reduce the availability of this important food source and then proposing to exacerbate that problem, the THP fails to conduct the necessary environmental review.

iii. CAL FIRE must reject the proposed THP

CALFIRE must reject the proposed THP as it is incomplete and misleading and therefore the conclusions contained within cannot be supported.

First, the THP is materially incomplete and contains misleading information that thereby undermines the fundamental conclusion that the proposed activity would not result in significant environmental effects.[26] As demonstrated above, the THP fails to consider both the important role that tanoaks play in coastal redwood ecosystems as well as the effects of the proposed activity together with the ongoing and foreseeable impacts of sudden oak death. Forest Practice Rule 898.2(c) requires the director to disapprove a THP that is "incorrect, incomplete or misleading in a material way, or is insufficient to evaluate significant environmental effects".

Second, the THP fails to incorporate feasible mitigation measures to prevent the spread of SOD. Forest Practice rules 919.4, states "[w]here significant adverse impacts to non-listed species are identified, the RPF and Director shall incorporate feasible practices to reduce Impacts as described in 14 CCR 898." There are many non-listed species which will be significantly impacted by the loss of tanoak within the THP area. The THP's proposed killing of tanoak is adding to an already existing epidemic of tanoak death and its cumulative impact will be far greater than its individual impact. Forest Practice Rule 898.1(c)(1) requires the Director to reject THPs that "[d]o not incorporate feasible silvicultural systems, operating methods and procedures

[25] Ramage, Benjamin S., and Kevin L. O'Hara. "Sudden oak death-induced tanoak mortality in coast redwood forests: current and predicted impacts to stand structure." *Forests* 1.3 (2010): 114-130.

[26] 14 Cal. Code Regs. 898.2(c). ("The Director shall disapprove a plan as not conforming to the Rules of the Board if any one of the following conditions exist: There is evidence that the information contained in the plan is incorrect, incomplete or misleading in a material way, or is insufficient to evaluate significant environmental effects.")

that will substantially lessen significant adverse Impacts on the environment." The conservation organizations believe that prohibiting the use of hack and squirt to kill tanoak is a feasible mitigation measure necessary to prevent significant adverse impacts to non-listed species.

b. MRC's Use Of Hack And Squirt Will Create A Public Nuisance Under Mendocino County Law And, Therefore, The THP Should Not Be Approved

The THP as written intends to use the hack and squirt method on a large number of hardwoods throughout the THP area. Out of concern about the potential fire hazard associated with hack and squirt, the voters of Mendocino County passed Measure V in 2016. The Measure made it a public nuisance under the Mendocino County Code to kill and leave standing trees greater in height than five meters for more than 90 days. Mendocino's ordinance is not preempted by the Forest Practice Act or the Timber Production Act and therefore the RPF should have to comply with it. Moreover, CALFIRE cannot approve a THP that violates Mendocino's non-preempted ordinance because to do so would be to approve a significant environmental impact.

i. Mendocino County has declared trees killed and left standing a public nuisance

In 2016, Mendocino voters passed Measure V also known as the Killed and Standing Trees Prohibition initiative.[27] The purpose of Measure V was to have trees killed by the "hack and squirt" technique declared a public nuisance under county law because they presented a fire hazard. The citizens of Mendocino county found in section 8.400.010(B-C) that "[s]ome industrial owners manage their forest lands by intentionally killing but not downing unwanted trees" and that "intentionally killed and left standing trees present an extreme fire hazard."[28] Moreover, in section 8.400.010(D-E) the citizens found "[i[ntentionally killed and left standing trees can impede rapid suppression of fires" and "[i]ntentionally killed and left standing trees pose a life safety risk to firefighters."[29] Finally in section 8.400.10(F) the citizens found that "[i]ntentionally killed and left standing trees endanger the public health and safety of rural residents."[30]

The measure added Chapter 8.400 to Title 8 of the Mendocino County Code which defined "trees greater in height than five meters, intentionally killed and left standing for more than 90 days (except those created for the benefit of wildlife habitat) [as] a public nuisance."[31] The party responsible is liable for any resulting damage if the tree is (1) within 1000 meters of roads, telecommunication infrastructure, electrical infrastructure, or a significant water source, (2)

[27]Ballotpedia, Mendocino County, California, Killed and Standing Trees Prohibition Initiative, Measure V (June 2016) (accessed Mar. 16, 2021)
[28]Mendocino County Code, Title 8, Chapter 8.400 et seq., Declare Intentionally Killed And Left Standing Trees A Public Nuisance (Enacted 6/7/2016)
[29]Mendocino County Code, Title 8, Chapter 8.400 et seq., Declare Intentionally Killed And Left Standing Trees A Public Nuisance (Enacted 6/7/2016)
[30]Mendocino County Code, Title 8, Chapter 8.400 et seq., Declare Intentionally Killed And Left Standing Trees A Public Nuisance (Enacted 6/7/2016)
[31]Mendocino County Code, Title 8, Chapter 8.400 et seq., Declare Intentionally Killed And Left Standing Trees A Public Nuisance (Enacted 6/7/2016)

within 1000 meters of a structure, or (3) within a CAL FIRE state responsibility area.[32] Mendocino has every right to enact such an ordinance under its broad police powers.[33]

ii. Mendocino's Ordinance is not preempted by the Forest Practice Act or the Timberland Productivity Act

The California Constitution provides general authority for a local government to "make and enforce within its limits all local, police, sanitary, and other ordinances and regulations not in conflict with general laws."[34] If a local ordinance conflicts with a general law it is preempted.[35] A conflict exists if the local regulation 'duplicates, contradicts, or enters an area fully occupied by state law (either expressly or by legislative implication)".[36] According to the California Supreme Court in *Deukmejian* "[p]reemption by implication of legislative intent may not be found when the Legislature has expressed its intent to permit local regulations" and "it should not be found when the statutory scheme recognizes local regulations."[37]

1. The Forest Practice Act preserves local regulation of nuisances and therefore does not preempt Mendocino's ordinance

With regards to preemption, The Forest Practice Act (FPA) provides in Public Recourses Code (PRC) 4516.5(d) "[e]xcept as provided in subdivision (e)[38], individual counties shall not otherwise regulate the conduct of timber operations, as defined by this chapter[39], or require the issuance of any permit or license for those operations.[40] This displays a general desire by the legislature for the FPA to preempt local control of the conduct of timber operations. However, The Forest Practice Act also contains a savings clause located in PRC 4514. The clause states in full:

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[32]Mendocino County Code, Title 8, Chapter 8.400 et seq., Declare Intentionally Killed And Left Standing Trees A Public Nuisance (Enacted 6/7/2016)

[33] *Kucera v. Lizza*, 59 Cal. App. 4th 1141, 69 Cal. Rptr. 2d 582 (Ct. App. 1997) (holding that the Town of Tiburon's ordinance that declared trees which blocked the view of a neighbor's property a public nuisance valid under the Town's general police power)

[34] Cal. Const., art. XI §7.

[35] *People ex rel. Deukmejian v County of Mendocino*, 36 Cal. 3d 476,484 (1984)

[36] *People ex rel. Deukmejian v County of Mendocino*, 36 Cal. 3d 476,485 (1984)

[37] *People ex rel. Deukmejian v County of Mendocino*, 36 Cal. 3d 476,485 (1984)

[38] Pub. Rec. Code 4516.5(e) provides in full "The board may delegate to individual counties its authority to require performance bonds or other surety for the protection of roads, in which case, the procedures and forms shall be the same as those used in similar circumstances in the county. The board may establish reasonable limits on the amount of performance bonds or other surety which may be required for any timber operation and criteria for the requirement, payment, and release of those bonds or other surety. If the county fails to inform the director of the claims within 30 days after the completion report has been filed, the bond or surety shall be released."

[39] Pub. Rec. Code 4527(a)(1) defines "Timber Operations" as "the cutting or removal, or both, of timber or other solid wood forest products, including Christmas trees, from Timberlands for commercial purposes, *together with all the incidental work, including, but not limited to*, construction and maintenance of roads, fuel breaks, firebreaks, stream crossings, Landings, skid trails, and beds for the falling of trees, fire hazard abatement, and Site Preparation that involves disturbance of soil or burning of vegetation following timber harvesting activities, but excluding preparatory work such as treemarking, surveying, or roadflagging." (emphasis added) Given this broad definition of "Timber Operations" it is reasonable to assume that hardwood treatment such as hack and squirt would fall within the incidental work category.

[40] Pub. Res. Code 4516.5(d)

> This chapter or a ruling, requirement, or policy of the board is not a limitation on the following:
> (a) On the power of a city or county or city and county to declare, prohibit, and abate nuisances.
> (b) On the power of the Attorney General, at the request of the board, or upon his or her own motion, to bring an action in the name of the people of the State of California to enjoin pollution or nuisance.
> (c) On the power of a state agency in the enforcement or administration of the law that it is specifically authorized or required to enforce or administer.
> (d) On the right of a person to maintain at any time an appropriate action for relief against a private nuisance as defined in Part 3 (commencing with Section 3479) of Division 4 of the Civil Code or for any other private relief.[41]

This clause has been interpreted by the Supreme Court of California twice. In both cases, the Court found that the clause acted to negate the preemptive effect of PRC 4516(d).

In *Big Creek Lumber v City of Santa* Cruz, the city passed a local ordinance which limited the parcels on which helicopter operations associated with timber harvesting could occur.[42] Big Creek Lumber challenged the ordinance on the grounds that the power of the city to pass such an ordinance had been preempted by the FPA. The court upheld the ordinance based in part on the fact that the ordinance did not directly regulate the *conduct* of a timber operation but rather the *location* where a timber operation could occur.[43] Because of this the court held "the helicopter ordinance is preempted neither expressly by section 4516.5(d) nor impliedly by general state forestry law".[44] The court then continued "[i]n the case of the helicopter ordinance, which [Santa Cruz] County apparently enacted to address citizens' fears created by helicopters transporting multi-ton logs by air over or near their neighborhoods, and citizen concerns with throbbing and unbearable noise, th[is] conclusion is buttressed by the fact that both the FPA and the TPA expressly contemplate the survival of localities' power to abate nuisances endangering public health or safety."[45] The court specifically cited the language in PRC 4514(a) that "[t]his chapter or a ruling, requirement, or policy of the board is not a limitation … on the power of a city or county or city and county to declare, prohibit, and abate nuisances."[46]

Similarly, in *Pacific Lumber Co. v State Water Res. Control Bd.*, Pacific Lumber argued that the FPA preempted the State Water Resources Control board from regulating timber harvesting.[47] The Supreme Court of California looked to section 4514(c) of the FPA which provides that "[t]his chapter or a ruling, requirement, or policy of the board is not a limitation on… the power

[41] Pub. Res. Code 4514
[42] *Big Creek Lumber v. County of Santa Cruz*, 10 Cal. Rptr. 3d 356 (Ct. App. 2004).
[43] *Big Creek Lumber v. County of Santa Cruz*, 10 Cal. Rptr. 3d 356 (Ct. App. 2004).
[44] *Big Creek Lumber v. County of Santa Cruz*, 10 Cal. Rptr. 3d 356 (Ct. App. 2004).
[45] *Big Creek Lumber v. County of Santa Cruz*, 10 Cal. Rptr. 3d 356 (Ct. App. 2004). (citing Pub. Res. Code, § 4514; Gov. Code, § 51115.5, subds. (a), (b).))
[46] *Big Creek Lumber V. County Of Santa Cruz*, 10 Cal. Rptr. 3d 356 (Ct. App. 2004) (citing Pub. Res. Code, § 4514)
[47] *Pacific Lumber v. Water Res. Control Bd.*, 126 P.3d 1040, 38 Cal. Rptr. 3d 220, 37 Cal. 4th 921 (2006).

of any state agency in the enforcement or administration of any provision of law which it is specifically authorized or required to enforce or administer." The court held that "[i]n light of the Forest Practice Act's express disclaimer of any interference with agency responsibilities[i.e. 4514(c)], and the absence of any irreconcilable conflict between the savings clause and other provisions of the Forest Practice Act, we cannot accept Pacific Lumber's argument."[48] The court determined that section 4514(c) was "fatal to Pacific Lumber's argument" because no implicit preemption can exist when an act has an express savings clause designed to limit it's preemptive effect.

Given the reasoning in *Big Creek Lumber* and *Pacific Lumber* it is clear that the FPA does not preempt Mendocino's power to regulate public nuisances. When the Legislature chooses to enact a savings clause such as PRC 4514 that preserves local control over vital local concerns, it is important for State Agencies implementing the law to respect that fact.

2. The Timberland Productivity Act preserves local regulation of nuisances which endanger public safety and therefore does not preempt Mendocino's ordinance

The California Timberland Productivity Act (TPA) in Government Code (GOV) section 51115.5(a) states "[n]otwithstanding any other provision of law, timber operations conducted within a timber production zone pursuant to the provisions of the Z'berg-Nejedly Forest Practice Act of 1973 (Chapter 8 (commencing with Section 4511) of Division 4 of the Public Resources Code) shall not constitute a nuisance, private or public." This is immediately followed by GOV 51115.5(b) which carves out the following exception "[t]his section is not applicable with respect to any timber operation which endangers public health or public safety." 51115.5(b) acts as a savings clause which expressly limits the TPA's preemptive effect on nuisances.

In Big Creek Lumber v City of Santa Cruz, the Supreme Court of California addressed this section with regards to the helicopter ordinance discussed above. The court's test to determine if the ordinance fell within the GOV 51115.5(b) savings clause involved assessing the purpose for which the ordinance was passed. The court stated that it was clear that because the ordinance was enacted to "address citizens' fears created by helicopters transporting multi-ton logs by air over or near their neighborhoods" that it fell within the scope of the endangers public safety exception of GOV 51115.5(b) and was not barred by GOV 51115.5(a). Even the dissent in that case conceded that "[i]t might be the case that the County can defend its helicopter ordinance under a nuisance theory."

Like the helicopter ordinance in Big Creek Lumber, Measure V was passed to "address citizens' fears" about a hazard created by timber operations. The citizens of Mendocino county found in section 8.400.010(B-C) = that "[s]ome industrial owners manage their forest lands by intentionally killing but not downing unwanted trees" and that "intentionally killed and left standing trees present an extreme fire hazard."[49] Moreover, in section 8.400.010(D-E) the

[48] *Pacific Lumber v. Water Res. Control Bd.*, 126 P.3d 1040, 38 Cal. Rptr. 3d 220, 37 Cal. 4th 921 (2006).
[49] Mendocino County Code, Title 8, Chapter 8.400 et seq., Declare Intentionally Killed And Left Standing Trees A Public Nuisance (Enacted 6/7/2016)

citizens found "Intentionally killed and left standing trees can impede rapid suppression of fires" and "Intentionally killed and left standing trees pose a life safety risk to firefighters."[50] Finally in section 8.400.10(F) the citizens found that "Intentionally killed and left standing trees endanger the public health and safety of rural residents."[51]

Because Measure V creates a public nuisance in order to protect public safety and the purpose of GOV 51115.5(b) is to preserve local regulation of public nuisances that threaten public safety, it is apparent that Measure V is not preempted by the TPA. This interpretation was endorsed by Mendocino's Office of the County Counsel in a letter to Mendocino Redwood Company regarding Measure V.[52] The Office stated that "[o]n it's face, [Measure V] would appear to fall within the scope of the local authority the legislature intended to preserve with the savings clause contained in Government Code Section 51115.5(b).[53]

iii. <u>CALFIRE cannot approve a THP that will violate Measure V because to do so would be to approve a significant adverse environmental impact</u>

The Forest Practice Rules indicate that this THP is flawed because it does not seriously consider the environmental effects of creating a public nuisance by using the hack and squirt method. Forest Practice Rule 898.1(c) states "[i]n reviewing plans, the Director shall disapprove all plans which: Do not incorporate feasible silvicultural systems, operating methods and procedures that will substantially lessen significant adverse impacts on the environment."[54] The Forest Practice Rules define a "Significant Adverse Impact" on the Environment as a "substantial, or potentially substantial, adverse change in any of the physical conditions within the area affected by the project including land, air, water, minerals, flora, fauna, ambient noise, and objects of historic or aesthetic significance."[55] Despite the fact that Mendocino voters have declared killed and left standing trees a public nuisance as a matter of law, the THP does not seriously contend with the environmental impact of this practice. The citizens of Mendocino have found, and passed into law, multiple reasons why killed and left standing trees substantially negatively impact the environment. Despite this, the THP only focuses on the assumed positive implications of the use of hack and squirt and does not consider the potential fire and safety hazards caused by this practice.

Moreover, Forest Practice Rule 898.2(c) states "[t]he Director shall disapprove a plan as not conforming to the Rules of the Board if any one of the following conditions exist: There is evidence that the information contained in the plan is incorrect, incomplete or misleading in a material way, or is insufficient to evaluate significant environmental effects."[56] The fact that this THP fails to contend with Mendocino's ordinance misleads the reviewer because it fails to

[50] Mendocino County Code, Title 8, Chapter 8.400 et seq., Declare Intentionally Killed And Left Standing Trees A Public Nuisance (Enacted 6/7/2016)
[51]Mendocino County Code, Title 8, Chapter 8.400 et seq., Declare Intentionally Killed And Left Standing Trees A Public Nuisance (Enacted 6/7/2016)
[52] Letter From Christian Curtis to Dennis Thiebeault (Nov. 18, 2019)
[53] Letter From Christian Curtis to Dennis Thiebeault (Nov. 18, 2019)
[54] 14 Cal. Code Regs. 898.1(c)
[55] 14 Cal. Code. Regs. 895.1
[56] 14 Cal. Code Regs. 898.2(c)

mention that the THP allows MRC to violate Mendocino's ordinance. Creating a public nuisance that endangers health and safety by creating a fire hazard ought to qualify as an adverse environmental impact. Yet, the THP materially misleads the reader by failing to contend with MRC's intention to create a public nuisance. This makes the THP insufficient to evaluate a significant environmental effect, namely the creation of a public nuisance.

For the foregoing reasons, CAL FIRE must not approve the proposed THP.

II. WLPZ Selection Cut

The THP proposes to conduct 72 acres of selection logging in the WLPZ. Specifically, the THP proposes selection logging in the 'Class 1 Inner Zone' from 30' to 100' from a Class 1 Watercourse.[57] The same is proposed for Class II watercourses.[58] Because Russell Brook, the primary class 1 watercourse within the plan area, is a 303(d) listed watercourse for sedimentation and temperature, it is of the utmost importance that this plan fully document and account for adverse sediment and temperature effects caused by logging within the WLPZ.

First, there is a lack of information about this selection cut within the plan. Sec. 2 briefly describes the plan to conduct selection harvesting within the WLPZ.[59] Cal. Code Regs. § 1034(m)(1) requires that "[t]he Plan shall provide a description of the stand before and after harvesting including: volume, growth projection, Stocking, and Species composition."[60] In this THP, the plan describes the stand description for the group selection, variable retention, and rehabilitation areas but not the selection area.[61] The plan states : "The areas being managed under the WLPZ selection are included under the group selection stand. These areas will meet stocking as described in section II of this THP immediately following operations."[62] But in section 2, there is no stand description for the WLPZ cut.[63] Instead, the THP says to see item #26 for that information for the WLPZ cut.[64] But, once we turn to item #26, we are given protection measures for WLPZs as required by the FPR ASP rules, but no stocking standards.[65] Thus, the THP fails to include stocking standards for the WLPZ cut. Without this information about the baseline stand description prior to the harvest, it is impossible for the public and the agency to fully understand the environmental impact of proposed logging within this sensitive area.

Second, the selection cut goes against MRC's own stated policies without stating an adequate reason for doing so. The 2017 Mendocino Redwood Company Management Plan states the following:

> "Another method of protecting key aquatic habitat elements is to limit management activities within the watercourse protection zone (See policies on following page).

[57] Russell Brook THP, sec. 2, pg. 51.
[58] Id.
[59] Russell Brook THP, sec. 2, pg. 51.
[60] Cal. Code Regs. § 1034(m)(1)
[61] Russel Brook THP, sec. 3, pgs. 89-90.
[62] Russell Brook THP sec. 3, pg 89
[63] Russell Brook THP sec. 2, p.11
[64] Russell Brook THP sec. 2, p.11
[65] Russel Brook THP sec. 2, p.51

> Silviculture activities in these zones are generally restricted to High Retention Selection. A practical result of MRC's restrictive streamside policies is that **MRC will delay harvest in most stream zones for the next 10 years**."[66]

That management plan was written in 2017 and yet in 2021, 4 years later, MRC is already proposing extensive selection harvesting in this WLPZ.

Mendocino Redwood Company would likely reply that they are relying on their Option A. Page 30 of their Option A contains a table entitled "Silviculture Regimes for Stands of Special Concerns."[67] Importantly, a stand is defined as "(a discrete geographic unit 30 acres or less) [that is] the spatial basis for determining if the forest unit meets the trigger conditions for the Selection, Group Selection, or Alternative Group Selection silvicultures."[68] For selection harvesting in class 1 and large class 2 WLPZs, the table states that the necessary trigger for the selection harvest is a total conifer basal area of >260 square feet for both trees greater than and less than 16 inches diameter.[69] MRC has not met its burden of demonstrating that the stands it intends to harvest within Class 1 WLPZs and Large Class 2 WLPZ meet these criteria. This is evidenced by the fact that the THP does not describe the stand description for the selection area.[70] Given that this trigger is clearly meant to be an exacting requirement that severely limits the instances when MRC can conduct a timber harvest in these sensitive areas, it would be irresponsible to permit a THP that proposes to harvest in these areas without first describing the pre harvest stand density for each individual stand. If MRC were to harvest without demonstrating adequate stand density within these WLPZ stands, they would be violating their own Option A and thus also the Forest Practice Rules.

One of the reasons that timber harvests within the WLPZ are discouraged is that removing shade over watercourses can raise stream temperatures to an extent that is harmful to aquatic life. This is particularly important in Northern California's Anadromous Salmonid Protection (ASP) watersheds which are home to California's endangered salmonid species. And is doubly important in watersheds that are listed as 303(d) temperature impaired such as Russell Brook. Past THPs within the plan area have specifically avoided harvesting within the WLPZ because of these temperature impacts. Most recently, THP 1-07-007 stated: "To ensure retention of shade canopy, filter strip properties and the maintenance of wildlife values and to protect water temperature, filter strip properties, upslope stability, and fish and wildlife values WLPZs are not proposed for harvest."[71] The current THP has not met its burden of demonstrating why harvesting within the WLPZ now will not result in significant environmental harm. These same values that were protected by previous decisions not to harvest within the WLPZ are still at risk. The THP has failed to adequately address or measure the impacts of this harvest. For example, the THP does not contain adequate analysis of stream temperature, shade coverage, or current

[66] Mendocino Redwood Company, Mendocino Redwood Company Management Plan (2017) P. 47 (emphasis added)
[67] Mendocino Redwood Company Option A 2008, Appendix A page 30
[68] Mendocino Redwood Company Option A 2008 p. 22
[69] Mendocino Redwood Company Option A 2008, Appendix A page 30
[70] Russel Brook THP, sec. 3, pgs. 89-90.
[71] 1-07-007 THP, Sec. 2 page 25

wildlife values for aquatic species. Without this information, the THP can not accurately state that the harvest will not have a negative impact on these factors of environmental quality. Given the sensitive nature of water quality and aquatic habitat, it is not reasonable for MRC to move forward without this information. As such, CAL FIRE must not approve this THP as currently written.

III. Old Growth/Large Old Trees Within the Plan Area and Surrounding Screen Trees
   a. Cutting the mitigation

This THP area contains multiple large, old trees that were previously not harvested in other timber harvest plans in order to avoid the significant impacts the logging of these trees would have caused.[72]. CAL FIRE should not approve a THP that permits cutting of trees that were previously protected in order to avoid significant impacts, especially when, as here, no meaningful statement is provided in the THP to explain why the cutting of these same trees now would somehow not lead to significant impacts. These large old trees that were protected previously have only gotten larger and older in the years since the previous THP and therefore their loss would again cause significant impacts and yet the THP does not address that fact.

CDFW addressed this issue as well in their comment #4 where the wildlife agency noted that large old trees had previously been retained:

> CDFW observed numerous large old trees identified with a faded blue "W" with evidence of decadence or "over maturity" such as deep-furrowed or plated bark, epicormic branching, reiterating limbs, damaged tops, larger diameter limbs, burn scars, basal hollows, and conk. The "W" is a wildlife tree mark for residual old growth trees retained during the last THP that overlapped Unit 9A (Unit 2 under 1-04-107 MEN).

CDFW also explained why such trees are of extreme value to wildlife and hence why there loss (even of one of them) is significant:

> Residual old growth trees provide valuable habitat to wildlife that provide "lifeboats" for species re-establishing in regenerating stands (Mazurek and Zielinski – 2004, and Franklin et al – 2000). Structural enrichment through maintaining and protecting large old trees enhances structural complexity and biological connectivity while younger- surrounding stands re-generate and recruitment trees develop characteristics valuable to the persistence of wildlife.

CDFW also described the importance of screen trees and how previously such trees had been retained in order to avoid harm to large old trees:

> The prior THP included mitigations for potential significant impacts to old growth trees from transition silviculture by retaining screen trees adjacent to the old growth trees. Trees to be retained as screen trees are defined in 1-04-107 MEN as

[72] See e.g, previous THP stating: "No trees which the RPF or company wildlife biologist deem significant for wildlife purposes will be harvested."

> the following: "The screen trees will be immediately adjacent trees or trees which are close enough to influence the growth and form of the retained old growth tree. These may have intermingling crowns or crowns which if left to grow will eventually intermingle with the retained old growth crown. For redwoods, trees with shared root systems (i.e., crown sprouts) indicate suitable candidates for screen trees.

CDFW also explained that procedurally, "impacts to 'large old trees' even when considering a single tree or a small stand should be disclosed and addressed," whereas the THP "does not accurately disclose and address the potential significant impacts to large old trees and mitigating screen trees retained under 1-04-107 MEN."

In short, unless and until the THP identifies and discloses all large old trees and potential impacts to them (such as the logging of associated screen trees), the THP is deficient for failing to disclose information necessary to discern the THP's potential for significant impacts. If the THP intends to retain all large old trees and associated screen trees, then that must be explicitly stated to avoid any misunderstanding.

CDFW further emphasized their concerns during second review, stating the following:

> The THP omits clear-enough disclosure of old growth densities and definable standards for mitigation for CDFW to evaluate potential impacts to wildlife trees, large old trees, old growth trees, and their know (sic), attendant wildlife that could be impacted by THP 1-20-00218-MEN, "Russell Brook". For example the current THP overlaps similar, justified, and approved mitigations for these elements and wildlife included in and affected by past THPs in the past 20 years.

It is unacceptable that the THP currently does not accurately disclose impacts to large old trees.[73] Failing to adequately disclose and consider the import of the presence of old growth trees is inconsistent with the FPA and CEQA. CAL FIRE Assistant Deputy Director, Mr. Duane Shintaku on March 2, 2005, wrote a memo (attached hereto and incorporated herein) in which he recognizes the potential biological, cultural, historical and aesthetic value or significance of stands of large old trees, as well as some individual specimens. The memorandum states that potential significant adverse impacts pertaining to large old trees must be adequately disclosed, evaluated, and mitigated within the context of the existing FPRs, California Environmental Quality Act (CEQA), and the California Endangered Species Act (CESA) and extends this assessment to individual large old trees and small stands of large old trees less than 20 acres in size.

The current THP has not met the burden of demonstrating by substantial evidence that this project will not cause adverse impacts by harvesting trees that were previously not harvested as mitigation. In fact, the RPF's comments that many of the trees that were previously marked with a W may still be harvested indicates that they are actively intending to harvest trees that were previously spared to avoid significant impacts. It is unacceptable for this THP to potentially

[73] Duane Shintaku, Disclosure, evaluation and protection of large old trees, March 2, 2005

harvest trees that were saved from an earlier plan as mitigation. The reason is very simple. If trees that can live up to 2,500 years are retained as mitigation for one plan and then are harvested as part of another plan less than 20 years later, then no such mitigation would ever be meaningful.

The RPF has responded to a similar comment by CDFW during first and second review by stating that these past mitigations were the result of a "planning agreement for the preparation of an NCCP and HCP as well as part of a SORP. Those measures were provided in part to mitigate for other operational planning flexibilities allowed by the planning agreement and SORP such as continuing operations, one year survey coverage, and the protection of only the three most recent activity centers. That planning agreement is no longer valid and the SORP was terminated by USFWS. Therefore, MRC does not agree with the recommendation."[74]This explanation is not satisfactory. Those mitigations were specifically detailed in prior timber harvest plans. Given the fact that those plans were approved in part because of the mitigations contained within them, it is not reasonable for MRC to propose cutting those same mitigations 17 years later. Otherwise, foresters could write plans that permitted considerable environmental damage by mitigating that damage elsewhere and then just wait a few years to harvest the mitigation. For mitigation of harm to an ecosystem that contains trees that live thousands of years to be meaningful, it must last far longer than 17 years.

b. Even Ignoring the Previous THP, Large Old Must Be Protected under the Forest Practice Rules and CEQA

According to the Duane Shintaku Large Old Trees Memo, "disclosure of potential significant adverse impacts pertaining to large old trees is required, even in those situations involving a single tree or small stand of trees less than 20 acres in size (i.e. does not meet the minimum stand acreage for Late Succession Forest Stands per 14 CCR § 895.1)."[75] The memorandum goes on to say: "During Plan preparation, the RPF should identify large old trees and stands of trees having significant or unique characteristics and those activities or operations having the potential to affect such trees, resulting in significant adverse impacts on the environment."[76] Disclosure may be required regardless of meeting the 20-acre stand size associate with a Late Succession Forest Stand.[77]

In this case, there are trees within the plan area which we know meet the standard of large old trees because they were previously specifically selected as mitigation because of those attributes within prior THPs. Despite this, the RPF has failed to adequately identify the locations of these trees or the negative environmental impacts of harvesting screen trees nearby to them.

[74] Russell Brook THP 2nd review RPF response to comments
[75] Duane Shintaku, Disclosure, evaluation and protection of large old trees, March 2, 2005
[76] Id.
[77] 14 CCR 895.1, Definitions

In THP 1-04-107-MEN, which was located within the same footprint as this plan, the RPF stated the following regarding screen trees around remnant old growth:

> "Based on the cruise data, the stand averages approximately 3 old growth trees per acre. None of these trees will be harvested. They will further be protected retaining all screen trees adjacent to them. The screen trees will be immediately adjacent trees or trees which are close enough to influence the growth and form of the retained old growth tree. These may have intermingling crowns or crowns which if left to grow will eventually intermingle with the retained old growth crown. For redwoods, trees with shared root systems (Le. crown sprouts) indicate suitable candidates for screen trees."[78]

The THP further clarified that "generally it's been MRC practice to maintain screen trees around retained old growth trees. Where they exist, screening trees are generally maintained to provide additional cover."[79] The plan specifically states "[s]ingle old growth trees as defined by MRC (definitions found in Section II) are also proposed for retention with screen trees."[80] Screen trees were also maintained for the benefit of raptors within the plan area such as sharp shinned hawk and cooper's hawk.[81] The RPF has failed to explain why these measures, which were necessary to prevent environmental harm within the same plan area in 2004, are no longer necessary. All of the factors that necessitated the retention of screen trees in 2004 are still present in the plan area. As such, the RPF should amend the THP to indicate that screen trees around remnant old growth and large old trees will be retained or explain why this measure is no longer necessary to prevent a negative environmental impact.

IV. Lack of Botanical Surveys

The THP currently states that a botanical survey will be conducted and amended to the plan a minimum of 5 days before operations begin.[82] Therefore, the results of these surveys will not be available until after the public comment period has ended, the interagency review has concluded, and the THP has already been approved. This clearly violates CEQA and therefore should not be approved under a THP which is meant to be a "functionally equivalent document" to an EIR.[83]

a. Deferring surveys should not be permitted because it stifles interagency review

The Forest Practice Act requires that CAL FIRE establish interdisciplinary review teams in order to evaluate timber operations. The FPA mandates that CDFW have a representative on the

[78] THP 1-04-107-MEN p. 44
[79] THP 1-04-107, p.22
[80] THP 1-04-107, p.72
[81] THP 1-04-107, p.69
[82] 1-20-00218-MEN p. 68
[83] *Sierra Club v. State Bd. of Forestry*, 7 Cal. 4th 1215, 30 (1994); Pub. Rec. Code § 21080.5(a), (d), (e)

interdisciplinary review team. The review team's function "shall be to assist the Director in determining if Plans are in conformance with Board Rules and to evaluate the potential environmental impacts of Timber Operations." Review team members have the option to file a non-concurrence for a plan explaining that environmental resources are not being adequately protected. The Director, when making the decision whether to approve a THP, is charged "to consider recommendations and mitigation measures of other agencies" and "to respond in writing to the issues raised". In doing so, "[t]he Director shall insure that an interdisciplinary review team has had an opportunity to review each Plan."[84] CAL FIRE's practice of conducting surveys after a THP has been approved and amending them into the plan violates these requirements.

The Forest Practice Rules make clear that CDFW is meant to consult with CAL FIRE during the decision making process, not after it is concluded. The reason for this is obvious: Consultation is meant to influence the Director's Decision. That's why the Director is required to "review and consider the recommendations made on each Plan by the interdisciplinary review team before determining if the Plan conforms to the Rules of the Board." But, if the plan has already been approved long before the surveys have been conducted, there is no opportunity for that consultation to occur. Having already approved the plan, any consultation that does occur is merely a courtesy on CAL FIRE's part. And, if CAL FIRE feels strongly that they would not like to hear CDFW's input on a survey, they can choose not to request it. In many cases, this can lead to CDFW being unable to fulfill its obligations as a member of the review team and as the state agency tasked with managing California's fish, wildlife, and plant resources.
This dynamic obfuscates the entire purpose of the Forest Practice Act and CEQA. These laws are meant to ensure that forest managers, in this case CAL FIRE, are subject to environmental review before a THP is approved. The drafters of the Forest Practice Act determined that substantive environmental review required an interdisciplinary review team to provide recommendations and consultation with regards to each Timber Harvest Plan. CAL FIRE should not be permitted to evade that review simply by scheduling surveys for a time period after the Director's Decision. While surveys do need to be conducted at certain times of the year in order to be effective, there is nothing preventing CAL FIRE from conducting those surveys prior to the Director's Decision. Doing so would ensure that all agencies tasked with reviewing Timber Harvest Plans have a fair opportunity to provide recommendations and consultation with regards to these proposed discretionary actions. Having taken their advice into consideration, the Director could then approve THPs in accordance with the Forest Practice Act. In this case, approval of this THP should be delayed until surveys can be conducted and CDFW has an opportunity review the results and consult with CAL FIRE about them.

b. Delaying Surveys should not be allowed because it stifles public participation

[84] Cal. Code Regs., tit. 14 § 1037.4

The other victim of CAL FIRE's decision to conduct surveys after the Director's decision is public participation. The Forest Practice Act and CEQA both require an opportunity for public participation and comment prior to a decision being made with regards to a discretionary project such as a Timber Harvest Plan. The Forest Practice Act mandates a public comment period wherein the public can submit comments in writing. When making a decision regarding whether to approve a THP, "The Director shall consider all written comments regarding the Plan."[85] This mandate ensures that the thoughts of the public are taken into account when THPs are being approved.

Likewise, CEQA requires an opportunity for public comment on discretionary projects. One of the key purposes of CEQA and the THP process is to allow the public to comment on proposed plans before they are approved with the information necessary to make informed comments. In order for that public comment to be meaningful, it must be received at a point in the planning process where "genuine flexibility remains."[86] Sundstrom v. County of Mendocino explains:

> In Bozung v. Local Agency Formation Com., supra, 13 Cal.3d 263, 282, the Supreme Court approved "the principle that the environmental impact should be assessed as early as possible in government planning." Environmental problems should be considered at a point in the planning process "'where genuine flexibility remains.'" (Mount Sutro Defense Committee v. Regents of University of California, supra, 77 Cal.App.3d 20, 34.) A study conducted after approval of a project will inevitably have a diminished influence on decisionmaking. Even if the study is subject to administrative approval, it is analogous to the sort of post hoc rationalization of agency actions that has been repeatedly condemned in decisions construing CEQA. (Id. at p. 35; No Oil, Inc. v. City of Los Angeles, supra, 13 Cal.3d 68, 81; Environmental Defense Fund, Inc. v. Coastside County Water Dist. (1972) 27 Cal.App.3d 695, 706 [104 Cal.Rptr. 197].)

By conducting these surveys after the public comment period has closed, CAL FIRE has foreclosed the possibility of the public commenting on their results. Surveys can provide valuable information about the location of sensitive species. It's also difficult, if not impossible, to analyze the feasibility and effectiveness of mitigation measures without assessing them side by side with survey data. But the public has no opportunity to provide insights to CAL FIRE regarding what measures should be taken in response to that new information. In this case, the public will have no opportunity to provide public comments or feedback on the results of these surveys because they will not be available until well after the public comment period has ended. As such, CAL FIRE should not approve this plan until after the botanical surveys are conducted and the public as well as CDFW have a chance to review their results.

V. Conclusion

[85] Cal. Code Regs., tit. 14 § 1037.4

[86] *Mount Sutro Defense Committee v. Regents of University of California*, 77 Cal.App.3d 20, 34 (1978).

EPIC, the Mendocino Group of the Sierra Club, and Center for Biological Diversity urge the Director to deny this THP. As has been discussed, this THP is replete with inaccurate and insufficient information and will have a significant negative environmental effect. By not accurately or meaningfully contemplating the environmental baseline, direct impacts, and cumulative impacts of this project, the RPF has submitted a THP that does not comply with the Forest Practice Rules or CEQA. As such, the Director should not approve this THP.

Sincerely,

Matt Simmons, Legal Fellow
Environmental Protection Information Center
145 G Street, Suite A
Arcata, CA 95521

UNIT, ER, RPF, CalT **1-20-00218-MEN** 21PC-000000 **587**

From: Justin Augustine <jaugustine@biologicaldiversity.org>
Sent: Friday, October 1, 2021 4:15 PM
To: Santa Rosa Review Team@CALFIRE; Santa Rosa Public Comment@CALFIRE
Subject: Public Comments re THP 1-20-00218-MEN
Attachments: CBD EPIC additional comments re russell brook thp.pdf

Categories: Has a PC Number

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Please see the attached comments.

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COAST AREA OFFICE
RESOURCE MANAGEMENT

October 1, 2021

Cal Fire Timber Harvest Review Team
Santa Rosa
(submitted electronically)

Comments regarding THP 1-20-00218-MEN ("Russell Brook")

Dear CAL FIRE:

The Center for Biological Diversity ("Center") and EPIC submit the following additional comments.

THPs are subject to the California Environmental Quality Act ("CEQA"), which mandates that the environmental impacts of a THP be considered and analyzed, and that CAL FIRE "mitigate or avoid the significant effects on the environment of projects that it carries out or approves whenever it is feasible to do so." Pub. Res. Code § 21002.1(b); *see also* Pub. Res. Code § 21002 ("[It is the] policy of the state that public agencies should not approve projects as proposed if there are feasible alternatives or feasible mitigation measures which will avoid or substantially lessen the significant environmental effects of such projects.").

I. The THP fails to properly disclose existing conditions, fails to properly disclose which large old trees will be logged, and fails to demonstrate that mitigation or avoidance of significant environmental impacts has been achieved

CEQA and the Forest Practice Rules require that CAL FIRE identify, analyze and avoid or mitigate all potential significant environmental effects of timber operations, including impacts to large, old trees. *See e.g. Sierra Club* v. *Board of Forestry*,7 Cal. 4th 1215, 1228-31 (1994); *Environmental Protection Information Center* v. *Johnson,* 170 Cal. App.3d 604, 615-618 (1985). That has not yet occurred. CAL FIRE must therefore gather a sufficient amount of information to conduct such analyses: "The department cannot discharge its obligation to disapprove plans that do not incorporate feasible measures to reduce the significant adverse effects of the plan on the environment if it is unable to identify those significant adverse impacts due to a lack of information." *Sierra Club*, 7 Cal. 4th at 1228. Here, information necessary to determine potentially significant impacts to large old trees has not been disclosed.

Pages 69 and 69.1 of the THP state that “MRC will not harvest old growth as defined below: 1. Any redwood tree, 48" dbh and larger, established prior to 1800; 2. Any Douglas-fir tree, 36" dbh and larger, established prior to 1800; 3. Any tree established prior to 1800 (conifer or hardwood), regardless of diameter size, with a preponderance of old growth characteristic; 4. In addition to the above, MRC retains any tree (conifer or hardwood), established prior to 1800, that cannot be replaced in size or ecological function within 80-130 years, regardless of diameter or presence of old growth characteristics (generally most applicable to areas of exceptionally low site, for example, pigmy forest, pigmy transition soil, serpentine soils, site five and shallow rocky outcroppings).” That is insufficient.

Large old trees can establish after 1800. Moreover, nowhere does the THP disclose which large old trees were determined to be established prior to, or after, 1800, and consequently it is impossible for the public to know which trees will in fact be retained or not. In other words, there may exist large old trees with important wildlife attributes, but which will be logged because MRC believes the tree established after 1800. We don’t know because MRC has not disclosed that information. Further, nowhere does the THP disclose which screen trees will or will not be left unlogged in order to adequately protect the large old trees.

This lack of disclosure is of consequence because, as the record states, “CDFW observed numerous large old trees [during the PHI]” that contained “evidence of decadence or ‘over maturity’ such as deep-furrowed or plated bark, epicormic branching, reiterating limbs, damaged tops, larger diameter limbs, burn scars, basal hollows, and conk.” The THP, however, such as at pages 69 and 69.1, does not identify these large old trees nor does it disclose what will be done with each of them (or their associated screen trees) in terms of retention, as nowhere does the THP discuss how these large old trees meet (or do not meet) the criteria identified on pages 69 and 69.1. Consequently, until that disclosure occurs, and is appropriately discussed and addressed, the THP fails to comply with CEQA.

For instance, as noted in the record, the RPF stated “that some of the large old trees identified for retention under the previous THP may be cored to determine their age and old growth status and determination for retention, even if they meet the MRC old-growth definition under the current ocular evaluation.” In other words, which large old trees will in fact be retained by MRC is unknown because MRC might cut large old trees simply based on their arbitrary use of 1800 as a cutoff or some other arbitrary cutoff (e.g., “the RPF suggested trees currently marked with a “W” may not warrant protections under the MRC Old Growth Tree definitions if they are less than the 48-inches in diameter at breast height (dbh) for redwood, [or] 36-inches dbh for Douglas fir” even though redwoods under 48 inches can in fact be a large old tree (see e.g. Mazurek and Zielinski 2004)). In addition, the 2004 THP retained “screen trees adjacent to the old growth trees” in order to protect the values associated with large old trees, yet the current THP makes no effort at all to disclose or address how screen trees will be protected. Thus, the THP does not appropriately disclose and address the potential significant impacts to large old trees and screen trees.

II. MRC Is Obligated To Protect Large Old Trees Irrespective of Past Or Current Policies

Regardless of past or current policies, MRC must avoid significant impacts to large old trees. Here, because of the severe lack of large old trees in the region and the importance such trees can play for wildlife, MRC must either retain all such trees or at least clearly explain why any particular large old tree (or its associated screen trees) can be logged without causing significant cumulative impacts. Because that has not yet occurred, the THP violates CEQA.

Sincerely,

Justin Augustine
Center for Biological Diversity
1212 Broadway, Suite #800
Oakland, CA 94612

From: Linda Perkins <lperkins@mcn.org>
Sent: Monday, October 4, 2021 12:05 PM
To: Santa Rosa Public Comment@CALFIRE
Subject: Comments on THP 1-20-00218 MEN Russell Brook
Attachments: Scan_0003.pdf; comments on THP 1-20-00218 MEN Russell Brook.odt

Warning: this message is from an external user and should be treated with caution.

To whom it may concern:

Please add these comments from Linda Perkins on behalf of Albion River Watershed Protection Association/Friends of Salmon Creek to the file of THP 1-20-00218 MEN, Russel Brook.

Also, please add Attachment B (Scan_0003.pdf) as part of my comments to the file of THP 1-20-00218 MEN.

Thank you.

Linda Perkins

707-937-0903

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1-20-00218-MEN

21PC-000000 588 cont.

October 4, 2021

Linda Perkins
Albion River Watershed Protection Association/
Friends of Salmon Creek (ARWPA/FOSC)
PO Box 467, Albion CA 95410
(707) 937-0903

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COAST AREA OFFICE
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Director
Department of Forestry and Fire Protection
Northern Region Headquarters – Santa Rosa
135 Ridgway Avenue
Santa Rosa CA 95401

Regarding Timber Harvest Plan 1-20-00218 MEN, Mendocino Redwood Company on Russell Brook/Big River

Dear Director and others To Whom It May Concern:

Please accept these comments on THP 1-20-00218 on behalf of Albion River Watershed Protection Association/Friends of Salmon Creek. We have read the timber plan and agency reports as well as public comment submitted to the plan record. We also participated in both Inter-agency Second Review Team meetings held on August 13 and September 22, 2021.

We believe the Director needs to disapprove this plan because the information in the plan is "insufficient to evaluate significant environmental effects" pursuant to 14CCR 898.2 Special Conditions Requiring Disapproval of Plans. We outline below areas of the plan we believe lacking in information to allow the Director to make a determination that there will be no significant environmental effects.

BIG RIVER TEMPERATURE IMPAIRMENT and WLPZ SELECTION HARVESTING

The plan uses what the forester calls a WLPZ (Watercourse and Lake Protection Zone) Selection silviculture method that proposes harvesting 72 acres in the riparian areas along more than 3 miles of Class I and Class II-Large streams that are within the plan. Both Russel Brook and Big River are listed by the EPA 303(d) as watersheds impaired by sediment and temperature. We are concerned that there may be adverse effects to water temperature as the result of applying a selection silviculture to these streamsides.

CalFire's inspection report dated 6-16-2021, Item 75, p. 13, states "The RPF has described Russell Brook Creek as..."impaired" from temperature effects under the Section 303(d) listing...A reasonable assessment...is contained in THP Section V."

However, there is no "reasonable assessment" to be found in Section V – or anywhere else in the plan – in fact, nothing can be found regarding stream temperatures - neither data from stream monitoring nor any discussion of the temperature trends in either the plan area or in the Watershed Assessment Area (WAA) in which the plan is located. Without this information, plan reviewers, agencies and the public are not able to determine whether the plan proposal to harvest in the WLPZs

will result in increased temperatures and significant adverse effects- in the short-term or the long-term - to the beneficial uses of water.

We decided to check back into the records of past plans submitted by this same landowner and in the same Watershed Assessment Area as the proposed plan.

We looked for

(1) stream temperature information:
(2) the RPF's assessments of stream temperature effects as a result of the plan's proposals;
(3) stream protections proposed as a result of the assessment; and
(4) the source for the increased stream protections. Was it because MRC was obligated by rules or by an agreement with another agency? Or was the explanation that the MRC forester had looked at stream and riparian conditions and recognized the biological need for increased protections?

We reviewed seven previous THPs: 1-97-218, 1-00-437, 1-04-107, 1-04-263, 1-06-143, 1-07-007, and 1-11-104. To repeat, these are all past Mendocino Redwood Company plans and all are in the same area as the current plan.

This is a summary of the information gleaned from those seven previous plans; details from each plan follow below:

(1.) There was an acknowledgement of temperature as a limiting factor for salmonids and other aquatic creatures in Russel Brook. Percentage of shade canopy along the streams was also considered.

(2.) As a result of these considerations **all seven plans** were configured so that either the plan boundaries were always outside Class I stream zones - and sometimes outside Class II large stream zones – or no-harvest WLPZs were established. .

(3.) Several of the plans provided temperature data and/or mentioned shade canopy levels and used this data and information as a basis for proposing no-harvest zones adjacent to streams. None of the plans cited either the Forest Practice Rules or other binding regulations or agreements as a reason for the additional protections.

1-04-107

THP 1-04-107, **within the footprint of the current plan**, discussed the table entitled 'Russell Brook Stream Temperature Summary' (pages 62 and 105-106) as follows,

"The temperature data at the sites described above show temperatures above the optimal range...This is the main reason why MRC has established no harvest areas adjacent to fish bearing stream as well as larger Class 2 watercourses on their ownership." (page 62.)

As to shade canopy, the plan states: "It should be noted that many portions of the canopy in the Class II WLPZ have been reduced to levels at below 50% by previous owners. Therefore, many of the Class 2 WLPZs will not be entered for harvesting under this plan." (Attachment A, answer to Review Team Question #3)

Plan 107 then goes on to anticipate the future conditions of the riparian areas as a result of the no-harvest and even that future harvests will retain these conditions,

"These stands, including Class II WLPZ areas, have been managed under an evenaged basis in the past. The future unevenaged stand will accomplish a number of goals. A multi-storied canopy will provide greater shade and positive thermal conditions in the WLPZ area as the stand develops. Future harvests will retain these shade conditions..."

Protections are provided that, among others, address the conditions of elevated stream temperatures and reduced shade canopy:

"A watercourse and lake protection zone shall be established on the Class I watercourse (Russell

Brook) which shall be 150 feet in width.....No harvesting shall occur in the Class I WLPZ....In addition, 50% overstory canopy will be retained from the WLPZ to a point 40 feet upslope of the WLPZ." (THP, p.12)

1-97-218

THP 1-97-218 draws its THP boundaries outside of the WLPZs and notes that "Russell Brook's shade canopy as a whole is approximately 60%." (page 20) The stream temperature data given in the plan shows that most temperature readings are above the preferred range for coho salmon. (pages 113-114)

1-00-437

THP 1-00-437 has provided no temperature data but the CDF Pre-Harvest Inspection Report, 12-8-2000, page 4 notes that "The plan area includes no Class I watercourses...[and] a "No Harvest" for all Class II WLPZs...".

1-04-263

THP 1-04-263 also falls within the footprint of the proposed plan. It was originally part of THP 1-04-107 but was submitted as a separate plan. Plan "107" was taken out of the middle of "263", such that the former became the "hole in the donut".

Obviously, the plans share the same watershed assessment area and the remarks above regarding elevated stream temperatures and streamside canopy conditions apply to both plans. It makes sense, then, that the watercourse protection measures are almost identical for both plans:

"No harvesting shall occur in the Class I WLPZ...No harvesting shall occur in the large Class II WLPZ...all small Class II watercourses [shall have] no harvesting within the Class II WLPZ." (THP, p. 13)

The plan acknowledges the importance of forest canopy to stream temperatures and how it is influenced by forest management:

"In a comparison of 20 years of temperature records form Steamboat Creek, Oregon, Hostetler (1991) found that streamside canopy cover was the most important variable to changes in stream temperature. Many physical factors can influence stream temperature including: solar radiation, air temperature, relative humidity, water depth, and ground water inflow. Forest management can most influence solar radiation input, riparaian air temperature and relative humidity by alteration of streamside vegetation and cover." (THP, p.69)

1-06-143

This plan proposed 233 acres of seed tree removal. A limited amount of stream temperature data was given in THP Section V, pp. 182-183. All temperatures were higher than the preferred range for coho of 10-12 degrees Celcius.

The plan thus proposes,

"To protect water temperatures, filter strip properties, upslope stability, and fish and wildlife values, no timber will be marked for harvest in the Class I WLPZ...Timber operations within 190 feet of Class I watercourses are designed and will be conducted so that the significant objective of protection, maintenance, or restoration of the beneficial uses of water or the populations and habitat of anandromous salmonids or listed aquatic or riparian-associated species will be observed." (THP, page 130)

And for Class II Large streams:

"...no trees will be harvested within the WLPZ and a 65%+ shade canopy will be maintained in

the RMZ [riparian management zone] which extends outward from the watercourse for a total distance of 190 feet."

1-07-007

This 183-acre plan is made up of 2 and1/2 miles of separate units scattered along the north side of Russel Brook. All unit boundaries are outside the riparian area of the Class I Russel Brook stream, and outside many of its tributaries.

The stream protections proposed are:

"To ensure retention of shade canopy, filter strip properties and the maintenance of wildlife values and to protect water temperature, filter strip properties, upslope stability, and fish and wildlife values WLPZs are not proposed for harvest. (page 25)

The Class I, large and small Class II WLPZ's are NH therefore, there will be no reduction in shade canopy." (THP, Section 2 page 25)

1-11-104

The boundaries of this plan were placed well outside the Class I streams. Further watercourse protections, among others, were there would be no harvest of Class IIL WLPZs. (THP, Section 2, page 27)

1-20-00218 – Current Proposed Plan

The current Russell Brook proposal must, of course, apply watercourse protection measures as prescribed for streams, such as Russell Brook, that are home to anadromous salmonids, pursuant to 14 CCR 916.9. The proposal is nonetheless – still - to harvest in the WLPZs and to remove undisclosed numbers and sizes of trees.

This is without providing any data or analysis as to why or how stream or streamside conditions have changed to now allow harvest to be conducted in these stream zones – as all seven of the previous plans cited so carefully avoided. Are there increased shade canopy levels in the plan area now? Has this increased shade reduced stream temperatures? Have stream temperatures and shade canopy levels in the Watershed Assessment area undergone favorable changes? In any case, information related to stream conditions must be included in the plan to allow reviewers to assess potential significant environmental effects.

The director must not allow stream zones to become harvest units without provision of adequate data and a reasoned analysis of this data to justify the current entry into WLPZs. There is nothing in the plan to justify the proposal. The plan must be disapproved.

NORTHERN SPOTTED OWLS

We have read the public comment on the potential take of northern spotted owls (NSO) as a result of operations on this plan, submitted by the Environmental Protection Information Center and posted to CalTrees on 3-18-2021. We agree that the RPF, by selecting option 14 CCR 919.9(e) – that is, consultation with USFWS – and then substituting the use of a USFWS guidance document for take avoidance (Attachment A) plus including critical deviations from the document with no consultation with USFWS regarding the changes, is a violation of the Forest Practice Rule 919.9(e). We agree the plan should be rejected on this basis.

The NSO maps submitted with the plan should be corrected.

In looking at the plan we see that **the plan boundaries of "218" are incorrectly drawn on the pre- and post-harvest northern spotted owl (NSO) maps for MEN0069 (2005).** These maps are found in Section V, pp 204-205. The plan boundary, starting within the 1000-foot circle buffer for MEN0069 and traveling south along the Class I WLPZ in Unit 8, is drawn to the north side of Russel Brook. This means that the riparian zone is outside of the plan and undergoes no NSO habitat type change. It remains foraging post-harvest. However, we know that the Russel Brook WLPZ is slated to be harvested in this plan under the WLPZ selection method and is, therefore, within the plan boundaries. (Please see the silviculture map in Section II, page 73.)

To be accurate, the boundary needs to be moved to the south side of the stream and, given that the WLPZ is within the plan, the reviewing agencies should reconsider post-harvest habitat typing.

The plan boundaries are also incorrectly drawn on the pre- and post-harvest northern spotted owl (NSO) maps for MEN0067 (2002). (Sec. V, pp 208-209) In this instance, the Class IIL stream in Unit 1 and the Class IIS in Unit 3 are shown to be outside the harvest boundary, when it is clear from the silviculture map that both are proposed for the WLPZ Selection method.

To be accurate the boundaries need to be drawn to show that the streams are within the plan boundaries. And again, the agencies need to reconsider how the WLPZ Selection method applied to these streams will affect post-harvest NSO functional habitat. We are further concerned – if the current riparian habitat is reduced – that water quality values will diminish as well as NSO habitat values.

Set Aside for NSO on current plan?

I've attached a copy of a CalFire post-harvest inspection map from THP 1-04-107. (Attachment B) Note that on this map the area that is marked with horizontal stripes was not harvested because of northern spotted owl concerns. That area is now within the boundaries of the current plan. It is also currently typed as nest/roost habitat on the NSO maps referenced above. It would appear that this area might be a small area of "old trees" or "old growth" or "wildlife trees." Has this area been inspected for potential late seral elements? Should it again be excluded from harvest because of NSO or other wildlife concerns?

MRC POLICY ON THE USE OF SCREEN TREES TO PROTECT OLD GROWTH, SNAGS AND OTHER WILDLIFE TREES

I have read and concur with the comment letters submitted by EPIC, Sierra Club and The Center for Biological Diversity regarding the need to disclose current conditions as to the presence of old growth and other wildlife trees, the potential for adverse impacts to these trees as a result of the implementation of proposed THP 218, and the need to know how the plan will avoid significant environmental impacts to these trees. I further agree that these trees and their value to wildlife are irreplaceable in any short-term view and certainly not in the 16 or so years since they were protected under THP 1-04-107.

The points made in those public comment letters regarding the old growth and other wildlife trees already having been well made, I want to focus here particularly and more extensively on the screen trees that provide protection to the old growth, snags and other wildlife trees. The consideration given these wildlife features is especially needed on THP 218 as there are 469 acres - or almost half the plan - proposed for variable retention and rehabilitation silviculture methods that will primarily leave very young stands, or newly planted stands, for retention. The legacy trees need to be retained and protected

to prevent significant impacts to wildlife.

Information On Screen Trees From Previous Russell Brook THP 1-04-107
It is clear from this 2004 plan, which covered some of the same area as the proposed plan, that MRC policies were to protect, consistently and over a long time frame, wildlife habitat in the form of snags, raptor nest trees and old growth trees (or mature forest trees) by retaining not only the wildlife trees themselves but also by providing the additional protection of screen trees, both to help shield the wildlife trees from adverse impacts and to enhance their value for wildlife in the future. Nothing that was said in the 2004 plan referenced any agency agreements, agency requirements or other prescriptive regulation that bound them to this assessment. These were simply MRC policies or MRC practices to help reduce potential significant impacts of the timber harvest by maintaining important legacy elements across the landscape. And MRC's intent to both retain and enhance the value of these elements can be seen in the policy decisions made for the 2004 timber plan.

As you can see from their considerations for the protection of snags, for example, (THP 1-04-107, page 21) that MRC planned to "monitor snags over time." Moreover, a promise and expectation for future protection was expressed in this statement: "Snags are marked for retention with circles as well as screen trees surrounding the snag in the hopes that if it is not currently being used by wildlife species, surrounding vegetation will mature to a point in which it is used." (page 21) Clearly, MRC was considering the long-term retention of these screen trees so that even snags currently not occupied by wildlife might become habitat for wildlife in the future.

And here is MRC's explanation for retaining screen trees around old growth, "...generally it's been MRC practice to maintain screen trees...close enough to influence the growth and form of the retained old growth tree." (page 22) Again, clearly, one does not influence the growth and form of an old growth tree in the short-term. This would indicate an intention to continue this for the long-term, something ongoing for many, many years and much beyond the life of a single timber harvest plan.

The plan goes on to state further predictions for the future with the retention of screen trees:
"Old growth redwood, Douglas fir, and tanoak which meet the above criteria are found in the unit. Based on the cruise data, the stand averages approximately 3 old growth trees per acre. None of these trees will be harvested. They will further be protected retaining all screen trees adjacent to them. The screen trees....may have intermingling crowns or crowns which if left to grow will eventually intermingle with the retained old growth crown. For redwoods, trees with shared root systems (ie. crown sprouts) indicate suitable candidates for screen trees."(page 44) Once again, MRC is indicating their intention to retain these trees into the future to encourage the intermingling of the screen tree branches and roots with those of the old growth to enhance the wildlife value by the close connections and grouping of the trees.

Current MRC Policy on Screen Trees
Current MRC policy seems clear and doesn't seem to have changed from its implementation on THP 107 cited above. We are unclear as to why the forester has not included this policy in the proposed Russell Brook plan. We respectfully request that the Director go to the website below where HRC/MRC Old Growth policy can be found. I've included just below the policy statement on screen trees that is found there:

"Screen Trees. In addition to the policies above, we also retain screen trees around retained old growth trees where they exist. These trees provide additional cover and are usually immediately

adjacent trees or trees which are close enough to influence the growth and form of the retained old growth tree. These may have intermingling crowns or crowns which if left to grow would eventually intermingle with the retained tree crown. For redwoods, trees with shared root systems (i.e. crown sprouts) indicate potential candidates for screen trees." https://www.hrcllc.com/old-growth

Please note that this policy applies to both Humboldt Redwood Company and Mendocino Redwood Company.

Please require clear disclosure of old growth, snags and other wildlife trees and their screen trees present on the plan area and a careful assessment of how removal of any of these might cause significant environmental impacts.

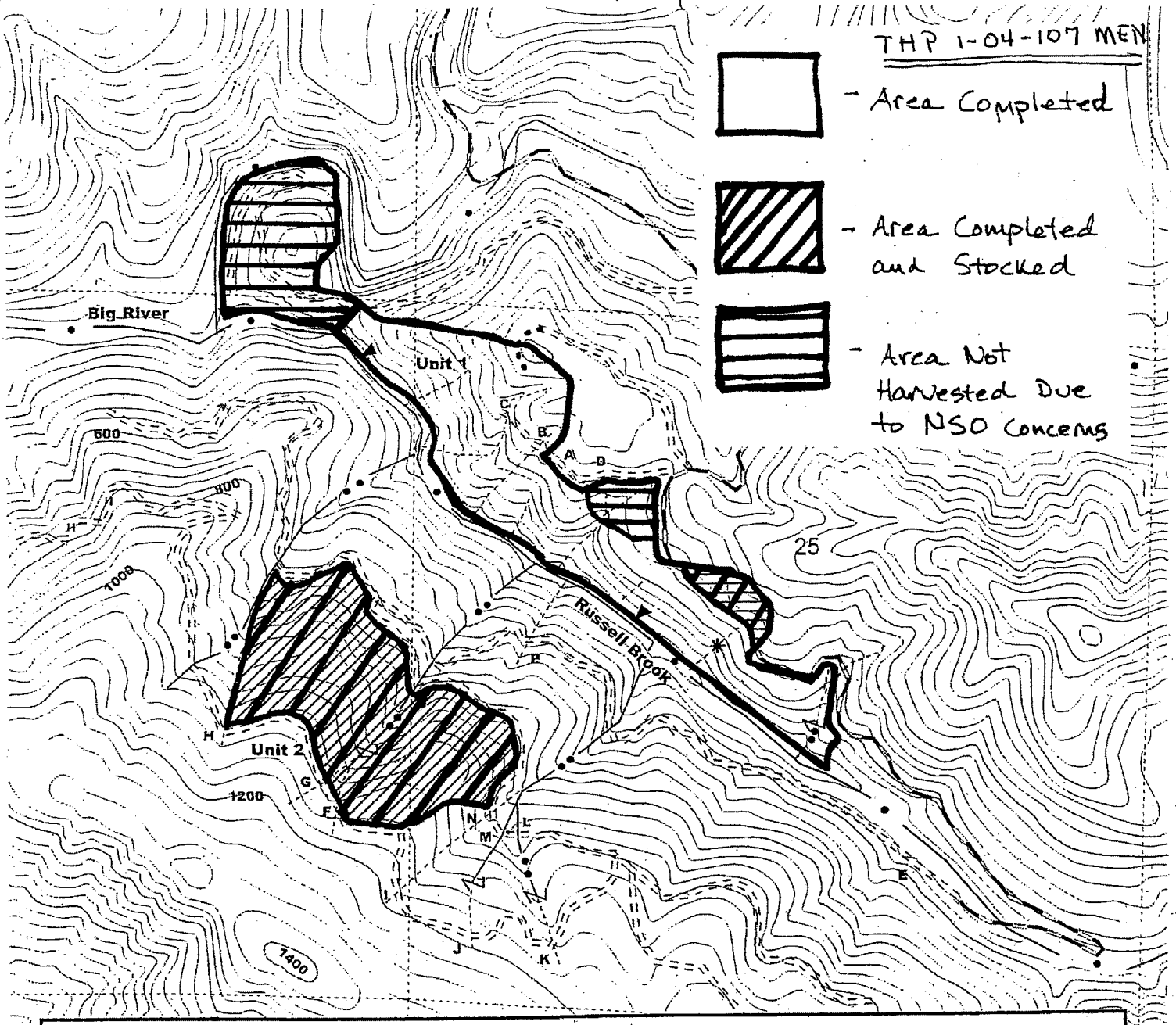
Thank you for your consideration of these comments.

Sincerely,

Linda Perkins

ARWPA/FOSC

ATTACHMENT B to comments by Linda Perkins 1-20-00218 MEN 1-04-107



Section 25 Timber Harvest Plan
Silviculture Map

T17N, R15W, MDBM, Sections 23, 25, & 26
Contour Interval: 40 feet, 1"=1000'

N
W E
S

Harvest area (Site III)	
Existing, rocked road	
Existing, seasonal road	
Proposed, seasonal road	
Class 1 watercourse	
Small Class 2 watercourse	
Class 3 watercourse	
Slide	
Spring	
Mitigation site	A-P
Transition	
Alternative prescription (Transition/Rehabilitation)	
Seed Tree Removal	

RECEIVED
JUN 22 2007
COAST AREA OFFICE
RESOURCE MANAGEMENT

RECEIVED
APR 11 2007
COAST AREA OFFICE
RESOURCE MANAGEMENT

MENDOCINO
REDWOOD COMPANY, LLC

From: Abigail Maguire <abby.maguire@gmail.com>
Sent: Thursday, September 16, 2021 6:39 AM
To: Santa Rosa Public Comment@CALFIRE
Subject: Public comment on THP 1-20-00218-MEN "Russell Brook"

Categories: Has a PC Number

Warning: this message is from an external user and should be treated with caution.

Dear CAL FIRE Santa Rosa Review Team,

You should invest in land that doesn't have old growth redwood trees and grow your own trees for the purposes of logging. Don't take from these animals! The owl in this community will suffer and the tanwood tree you refer to as a trashtree's healthy population has been lowering; you can't take the healthy ones from the forest! Old growth redwoods have been through enough with your industry. Have a more dedicated practice so this ecosystem doesn't suffer!

Sincerely,
Abigail Maguire
1658 Mad River Road
Arcata, CA 95521

RECEIVED
SEP 16 2021
COAST AREA OFFICE
RESOURCE MANAGEMENT

From: Justin Augustine <jaugustine@biologicaldiversity.org>
Sent: Thursday, October 14, 2021 9:54 AM
To: Santa Rosa Public Comment@CALFIRE
Subject: RE: Public Comments re THP 1-20-00218-MEN
Attachments: CBD EPIC Sierra Club additional comments re russell brook thp.pdf

Warning: this message is from an external user and should be treated with caution.

Here are some additional comments, thanks.

From: Santa Rosa Public Comment@CALFIRE <SantaRosaPublicComment@fire.ca.gov>
Sent: Wednesday, October 13, 2021 1:04 PM
To: Justin Augustine <jaugustine@biologicaldiversity.org>
Subject: RE: Public Comments re THP 1-20-00218-MEN

Hello Justin,
What is a good email address for the Sierra Club?
Thank you,
Traci

From: Justin Augustine [mailto:jaugustine@biologicaldiversity.org]
Sent: Monday, October 4, 2021 2:36 PM
To: Santa Rosa Review Team@CALFIRE <SantaRosaReviewTeam@fire.ca.gov>; Santa Rosa Public Comment@CALFIRE <SantaRosaPublicComment@fire.ca.gov>
Subject: Re: Public Comments re THP 1-20-00218-MEN

Warning: this message is from an external user and should be treated with caution.

The Sierra Club (Mendocino Group) also joins the comments submitted on October 1.

Thanks,
Justin Augustine

From: Justin Augustine
Sent: Friday, October 1, 2021 4:15 PM
To: SantaRosaReviewTeam@fire.ca.gov <SantaRosaReviewTeam@fire.ca.gov>; santarosapubliccomment@fire.ca.gov <santarosapubliccomment@fire.ca.gov>
Subject: Public Comments re THP 1-20-00218-MEN

Please see the attached comments.

RECEIVED

OCT 14 2021

COAST AREA OFFICE
RESOURCE MANAGEMENT

October 1, 2021

Cal Fire Timber Harvest Review Team
Santa Rosa
(submitted electronically)

Comments regarding THP 1-20-00218-MEN ("Russell Brook")

Dear CAL FIRE:

The Center for Biological Diversity, EPIC, and Sierra Club submit the following additional comments.

Page 71 in the October 6, 2021, response letter states: "Blue W's and L's exist throughout the harvest area from an existing THP and are not proposed for retention." This statement further demonstrates why the THP violates CEQA. No explanation is provided to justify why the large trees (and associated screen trees) with "[b]lue W's and L's … throughout the harvest area from an existing THP . . . are not proposed for retention." Based on the information that is contained in the record for this THP, these large trees (and associated screen trees) with "[b]lue W's and L's" must be retained in light of their potential significant value for wildlife. Moreover, nowhere does the THP address any changes in the environmental baseline that would justify logging these once protected trees. To harvest trees that were protected in a prior THP within the same footprint, it must be explained how environmental conditions have changed such that removal is now acceptable.

Sincerely,

Justin Augustine

Justin Augustine
Center for Biological Diversity
1212 Broadway, Suite #800
Oakland, CA 94612

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OCT 14 2021
COAST AREA OFFICE
RESOURCE MANAGEMENT