

Memorandum

Date:	August 28, 2014
To:	Upper Santa Ana River HCP Team
Cc:	Bob Tincher, Heather Dyer, Doug Headrick San Bernardino Valley Municipal Water District
From:	Scott Fleury, Leo Lentsch; ICF International
Subject:	Consideration for inclusion of an NCCP with the Upper SAR HCP

Introduction

The Upper Santa Ana River HCP Team is considering the decision to prepare a Natural Community Conservation Plan (NCCP). If the decision is made to prepare an NCCP, it would be integrated with the Upper SAR HCP for federal endangered species compliance, and would provide similar incidental take permit streamlining for California listed as well as unlisted species. However, an NCCP has additional requirements above those of an HCP. As such, it is important to weigh the costs and benefits of developing an NCCP carefully. For example, an NCCP must take a broad-based ecosystem approach to conservation planning for the protection and perpetuation of biological diversity. An NCCP identifies and provides for the regional or area-wide protection of plants, animals, and their habitats, while allowing compatible and appropriate economic activity. Therefore, an NCCP must address the effects of covered activities on natural communities and ecological functions in addition to the effects on the covered species themselves. An HCP must mitigate impacts to species to the maximum extent practicable, while an NCCP must provide for a level of conservation that is beyond the HCP standard of mitigation. An NCCP, therefore, is intended to meet Plan Area-wide biological goals and objectives above those simply related to mitigation for impacts of covered activities. An NCCP also requires the establishment of a formal independent science advisory group, and requires a higher level of public involvement beyond the environmental review process.

Purpose of this Memorandum

The purpose of this memorandum is to provide information based on an assessment of the potential benefits and likely costs associated with the development and implementation of an NCCP. The information contained herein describes what is required to develop and implement an NCCP to provide guidance to the HCP Team to make an informed decision.

Background

The Upper SAR HCP participating water resource agencies (applicants) intend to apply for federal take coverage for several federally listed species under Section 10 of the federal Endangered Species

Act (ESA). The applicants also will need take authorization for state-listed species, and have two options for state take authorization: (1) a 2081 permit under the California Endangered Species Act (CESA), or (2) a Natural Community Conservation Plan (NCCP) pursuant to the Natural Community Conservation Planning Act (NCCP Act). The federal compliance would be the same under either option, so the permit application process would either require an HCP/2081 conservation plan or an HCP/NCCP.

Table 1 summarizes important differences between the two permitting options. Key differences between an NCCP and 2081 permit that the applicants should consider in determining which option to pursue include the following.

1. **Strong Regulatory Assurances.** NCCPs provide strong and durable “No Surprises” assurances from the state for all listed and non-listed covered species. These No Surprises assurances are not available under a CESA 2081 permit, nor can a CESA permit cover non-listed species.
2. **Take of Fully Protected Species.** NCCPs allow for direct take of fully protected species. Direct take of fully protected species is not allowed under a CESA 2081 permit.
3. **Higher Conservation and Procedural Standards.** NCCPs require a higher standard of “conservation” of covered species, rather than “fully mitigate” as under a CESA 2081 permit. Additional planning and implementation costs would be incurred to meet the higher conservation standard of an NCCP. NCCPs also have additional procedural requirements that contribute to slightly higher planning costs as compared to a 2081 permit.

Each of these factors is discussed in more detail below. The applicants can use the information presented in this memo to help determine whether the increased planning and implementation costs of an NCCP are worth the additional benefits that an NCCP provides.

Table 1. Comparison of 2081 Permit and NCCP Permit Requirements and Benefits

Parameter	California Endangered Species Act (2081 Permit)	Natural Community Conservation Plan Act (2835 Permit)
Planning Agreement	Not required	Required
Geographic Scope	Small to large scale	Landscape scale only ¹
Species Covered	State-listed species only	Listed and non-listed species ²
Regulatory Standards for Take Authorization	<ul style="list-style-type: none"> • Minimize and fully mitigate • Rough proportionality • No jeopardy • Consistent with recovery • Adequate funding 	<ul style="list-style-type: none"> • CESA 2081 permit requirements • Consistent with Planning Agreement • Meet or help meet recovery • Protect habitat on a landscape scale • Preserve ecological integrity • Support sustainable populations • Sustain movement

Parameter	California Endangered Species Act (2081 Permit)	Natural Community Conservation Plan Act (2835 Permit)
Regulatory Assurances	<ul style="list-style-type: none"> • Covered species only • No take authorization for fully protected species 	<ul style="list-style-type: none"> • Broad assurances (“No Surprises”) • Take authorization for fully protected species
Public Participation	Through CEQA (and NEPA) process only	<ul style="list-style-type: none"> • Public participation and outreach as part of NCCP preparation • Stakeholder group as part of NCCP preparation • CEQA and NEPA process
Independent Scientific Input	Not required	Required
Public Funding Available for Implementation	Limited	Yes

¹ Landscape scale plans in California are typically on the order of hundreds of thousands to millions of acres. Plans of this size allow for the preservation of more ecological diversity than smaller, project-level plan areas.

² Species expected to be listed by the State during the permit term.

Higher Conservation and Procedural Standards

NCCPs must meet higher regulatory standards than a 2081 permit. Under the NCCP Act, applicants must *conserve* the species being afforded take authorization. “Conserve” is defined by NCCP Act to essentially mean that one must contribute to the recovery of species. In some cases, this has been interpreted to mean that species should be recovered in the plan area.

The NCCP Act also has additional requirements to conserve biological diversity, ecological integrity, and environmental gradients, among others. These requirements change the conservation strategy approach compared to a 2081 permit, including a focus on natural community conservation, rather than just species mitigation. By contrast, under a 2081 permit the standard is that the applicant must fully mitigate for the effects of the covered actions.

Pursuing an HCP/NCCP would require the applicants to protect more land through conservation easements or fee title acquisition or possibly provide more water for habitat than would be required by an HCP/2081. The additional conservation required to meet the NCCP standard could be 25–50% based on the conservation strategies of recent NCCP’s that are either approved or close to approval by CDFW.

It may be difficult to meet the higher NCCP standards for upland species and communities. While the study area includes the broadly defined upper Santa Ana River watershed above Prado Dam, the applicants only have discretionary authority over their own water resource-related projects.

Without some level of discretionary authority over the land use in the majority of the study area, it would be very difficult to meet the NCCP standards for ecosystem-based conservation at a landscape level for any of the upland habitat types. Conversely, the applicants do have direct control of much of the land use and the hydrologic processes and conveyances (streams, rivers, and channels) throughout the study area. Therefore, a “river only” NCCP is feasible.

Strong Regulatory Assurances

Federal ESA take authorization (harm, harassment, mortality) and assurances under the Upper SAR HCP will be the same under either option. However, state take authorization differs between the two options. Preparation of an NCCP allows the applicants to assess the impacts of their covered actions on and create a conservation strategy for all covered non-listed species as well, and receive take authorization for these species as soon as they become listed by the state. This approach gives applicants the opportunity to evaluate potential effects on species that are expected to become listed during the permit term thereby avoiding a costly plan amendment. This “insurance policy” could be valuable for the Upper SAR HCP for species expected to become a state-listed species during the permit term. Table 2 identifies the proposed list of species to be evaluated for coverage under the Upper SAR HCP and the additional benefits or assurances offered under an NCCP compared to a 2081 permit for non-listed or fully protected species.

The assurances provided by the NCCP permit are nearly identical to the federal assurances known as “No Surprises”. According to the California Fish and Game Code Section 2820(f)(2), “If there are unforeseen circumstances, additional land, water, or financial compensation or additional restrictions on the use of land, water, or other natural resources shall not be required without the consent of plan participants for a period of time specified in the implementation agreement, unless the department determines that the plan is not being implemented consistent with the substantive terms of the implementation agreement.” What this means is that if conditions change during the permit term in ways not anticipated by the plan, the state cannot require the applicants to provide more conservation or more funding for conservation without their consent, as long as the plan is being implemented properly. These assurances have proven very durable in operating HCPs and NCCPs, but they are not available under a 2081 permit.

Table 2. Comparison of Species Assurances under State Permit Scenarios

Species Evaluated for Coverage in Upper SAR HCP	Federal Status	State Status	Additional Benefits from NCCP Permit vs. CESA 2081 Permit		“River Only” NCCP Species
			No Surprises Assurances from State	No Additional Benefits	
Plants					
slender-horned spineflower	Endangered	Endangered		X	
Santa Ana River woolly-star	Endangered	Endangered		X	
Invertebrates					
Delhi Sands flower-loving fly	Endangered	None	X		

Species Evaluated for Coverage in Upper SAR HCP	Federal Status	State Status	Additional Benefits from NCCP Permit vs. CESA 2081 Permit		"River Only" NCCP Species
			No Surprises Assurances from State	No Additional Benefits	
<i>Fish</i>					
Santa Ana sucker	Threatened	SSC	X		X
arroyo chub	None	SSC	X		X
Santa Ana speckled dace	None	SSC	X		X
<i>Amphibians and Reptiles</i>					
arroyo toad	Endangered	SSC	X		X
western spadefoot	None	SSC	X		
South coast garter snake	None	SSC	X		X
California glossy snake	None	None	X		
western pond turtle	None	SSC	X		X
<i>Birds</i>					
burrowing owl	None	SSC	X		
cactus wren	None	None	X		
coastal California gnatcatcher	Threatened	SSC		X	
tricolored blackbird	None	SSC	X		
least Bell's vireo	Endangered	Endangered		X	X
southwestern willow flycatcher	Endangered	Endangered		X	X
yellow-breasted chat	None	SSC	X		X
western yellow-billed cuckoo	Candidate	Endangered	X		X
<i>Mammals</i>					
San Bernardino kangaroo rat	Endangered	SSC	X		
Los Angeles pocket mouse	None	SSC	X		
San Diego black-tailed jackrabbit	None	SSC	X		

SSC = California Department of Fish and Wildlife Species of Special Concern

Take of Fully Protected Species

The California Fish and Game Code lists 37 species as "fully protected," for which the state cannot authorize take of individuals¹, even under a 2081 permit. In October 2011, the Governor signed new legislation allowing take of fully protected species covered by an approved NCCP. The current Upper SAR HCP covered species list does not include any California Fully Protected Species, however four fully protected species have the potential to occur within the Study Area (golden eagle, white-tailed kite, bald eagle, and American peregrine falcon). If any fully protected species were included for

¹ Note that the definition of "take" differs between the federal ESA and CESA. Take is defined more broadly under the federal ESA to include "harm" and "harassment," which may include the removal or modification of unoccupied habitat.

coverage (during Plan development or with a future amendment), take could only be approved by the state if the Plan were an NCCP. Note: None of the currently proposed covered activities are anticipated to cause direct take of any of these Fully Protected species.

Increased Costs to Complete an NCCP

To estimate cost differences between an NCCP and a CESA 2081 permit, we first identified the differences that have cost implications. For an NCCP, the applicants will need to: develop and execute a planning agreement, establish and facilitate a stakeholder group for the remaining duration of the planning process, organize and convene an independent scientific review of the conservation strategy, and create a more expansive conservation strategy, as described above. An Implementing Agreement is also required for an NCCP. This task is not included in the assumptions of additional cost because it is assumed that the applicants would execute an Implementing Agreement for an HCP/2081 permit as well. There will be additional project management time and time spent in meetings because completing an NCCP is expected to take slightly longer than a CESA 2081 permit. For example, there will be additional coordination with CDFW to make sure NCCP requirements are being met. For the purposes of this analysis it is estimated that an HCP/NCCP would require at least 6 months more relative to the project schedule to complete an HCP/2081. Table 3 shows each of those planning components and a range of associated costs. All of these additional costs can be covered by a Section 6 planning grant.

Table 3. Estimated Planning Costs of Required NCCP Components that Would Not Be Necessary for an HCP/2081 Conservation Plan

NCCP Component with Cost Implications	Range of Additional Planning Costs	Notes and Assumptions
Planning Agreement	\$0–25,000	Applicants and CDFW could prepare the Planning Agreement at no additional cost; high end assumes an attorney is hired to prepare the agreement
Expanded Public Involvement	\$40,000–75,000	Low end is ICF team cost. High end assumes a professional facilitator is also hired. Assumes monthly meetings for up to three years
Convene Independent Scientific Review Process	\$75,000	Cost depends largely on the number of panel members. The cost for the science review process includes approximately \$50,000 in consultant fees and up to \$25,000 to for hiring a lead reviewer to coordinate the panel and complete the final review document, offering an honorarium to reviewers, paying for travel and lodging for one two-

NCCP Component with Cost Implications	Range of Additional Planning Costs	Notes and Assumptions
Expanded Conservation Strategy	\$75,000	day workshop, and the organization and execution of the workshop and a field trip to familiarize reviewers with the study area. Additional analysis would be required to analyze natural communities and broader ecology of the system to ensure NCCP standards are met
Project Management/Meetings	\$20,000	Assumes additional 6 months of active project management and meetings
Total	\$210,000–270,000	

Effect on HCP Implementation Costs

If an NCCP be pursued, there would be additional land acquisition and possibly water provisioning requirements necessary to meet the NCCP conservation standards. A portion of the cost associated with additional land and water could be paid for by state and federal grants as well as other funding sources. However, at least some of that increased cost could be paid for by applicants proportional to the amount of take each has under the Plan. This results in an expected increase relative to costs that would apply under an HCP/2081. A simple way to calculate the difference in fees between the HCP/2081 option and the HCP/NCCP option would be to directly apply the estimated 25–50% increase in land acquisition and possibly water provisioning costs, a range observed in other regional NCCP efforts. In addition, it is reasonable to assume that approximately 10–20% of the land acquisition under an HCP/NCCP would be paid for by state and federal grants as has been the case for other approved NCCPs (see funding section below). Therefore, the net increase in costs for an HCP/NCCP could be somewhere closer to 5–40% higher than would be expected under an HCP/2081. *The actual costs required to implement the conservation strategy will not be developed until the conservation plan is farther along. These percentages are only provided for a relative comparison between the two approaches.*

Increased permittee contributions are not the only way to pay for the additional cost of an NCCP. Alternatively, the applicants may be able to find other local sources of funding. For example, there is funding available through the federal Section 6 grant program for land acquisition once the conservation plan is approved. This is the same grant program that is expected to be available to fund the planning effort, except there are monies allocated only for planning and other monies allocated for land acquisition during implementation. Permittees can apply for funding through the Section 6 grant program regardless if the permit is an HCP/2081 or an HCP/NCCP but it can only fund non-mitigation costs (and costs beyond mitigation would typically only be associated with an

NCCP). Similar to the planning grants, the implementation money comes from the federal government but CDFW is influential in determining who receives the grants within the state. In the past several years the trend has been that NCCPs receive the majority of Section 6 land acquisition grants in California. As long as this funding source remains in the federal budget, it is likely that the additional NCCP cost would be partially offset by these federal grants.

Conclusions

The information provided in this memo is intended to assist the HCP Team in assessing the costs and benefits of including the NCCP requirements to the current HCP process and determine whether the increased planning and implementation costs of an NCCP are worth the additional benefits that an NCCP provides.

Cost

Development of an integrated NCCP/HCP would take additional time and effort. The additional requirement for species and natural community conservation above and beyond basic mitigation, and the additional adaptive management and monitoring expectations are obligations that must be considered in comparison with the benefits. It is likely that inclusion on an NCCP would take a minimum of an additional 6 months in plan preparation time. Completing an NCCP would cost an estimated additional \$210,000 to \$270,000, and would likely increase the implementation costs of the plan, approximately 5-40% higher than for an HCP/2081.

Benefits

The primary benefit to completing an NCCP would be obtaining state incidental take coverage for the non-federally listed species. However, as noted above, the benefit would likely only be realized for aquatic and riparian species under a "river only" NCCP scenario, because the applicants do not have sufficient land use authority to implement an NCCP to cover upland species and habitats.

A secondary benefit would be an increased opportunity for federal and state funding for implementation. Though NCCPs traditionally are more competitive and likely to receive land acquisition funding, federal funding is never guaranteed. If received, this funding can ease the applicants' cost of implementation. The No Surprises assurances available under an NCCP provide a strong and durable guarantee from the state that the requirements of the plan would not change if environmental conditions change in the future.

Finally, one of the primary intents of an NCCP is to provide comprehensive landscape-scale conservation across a region. Within the Upper SAR HCP study area there has been considerable interest in coordinated regional natural resource protection and conservation planning (e.g., USFWS Santa Ana sucker recovery planning, San Bernardino County regional conservation planning feasibility studies, SAWPA One Water One Watershed 2.0). A regional planning effort such as an NCCP (even if only a "river only" NCCP) can provide the impetus and the structure for facilitating much broader regional planning and conservation implementation above and beyond that needed for endangered species permitting. Therefore, it is worth considering how much additional regional value would be realized from a NCCP in the upper Santa Ana River watershed.

Next Steps

We will continue discussions with CDFW and USFWS regarding the costs, benefits, and feasibility on an NCCP for the Upper SAR watershed. We will address comments from the HCP Team to this memo and integrate that information with the guidance produced from in-depth discussion with the wildlife agencies. A recommendation regarding development of an NCCP will be developed prior to the next full HCP Team meeting (planned for October 28, 2014) so that a decision can be made at that point by the HCP Team.