22, 2019, starting at 8 a.m. Pacific Daylight Time and will end when business for the day has been completed.

ADDRESSES: The meeting will be held at the Sheraton Portland Airport, Mt. Adams Room, 8235 NE Airport Way, Portland, OR 97220; telephone: (503) 281–2500.

Council address: Pacific Fishery Management Council, 7700 NE Ambassador Place, Suite 101, Portland, OR 97220–1384.

FOR FURTHER INFORMATION CONTACT: Dr. Jim Seger, Pacific Council; telephone: (503) 820–2416.

SUPPLEMENTARY INFORMATION: At its meeting, the SaMTAAC will continue to develop alternatives that address obstacles to achieving the goals and objectives of the groundfish trawl catch share plan related to under-attainment of non-sablefish shorebased trawl allocations and unharvested sablefish quota pounds south of 36° N latitude. The SaMTAAC's work on alternatives will be presented at the June 2019 Pacific Council meeting.

Although non-emergency issues not contained in the meeting agenda may be discussed, those issues may not be the subject of formal action during this meeting. Action will be restricted to those issues specifically listed in this document and any issues arising after publication of this document that require emergency action under section 305(c) of the Magnuson-Stevens Fishery Conservation and Management Act, provided the public has been notified of the intent to take final action to address the emergency.

Special Accommodations

The meetings are physically accessible to people with disabilities. Requests for sign language interpretation or other auxiliary aids should be directed to Mr. Kris Kleinschmidt (*kris.kleinschmidt@noaa.gov;* (503) 820–2411) at least 10 days prior to the meeting date.

Dated: April 24, 2019.

Tracey L. Thompson,

Acting Deputy Director, Office of Sustainable Fisheries, National Marine Fisheries Service.

[FR Doc. 2019–08664 Filed 4–29–19; 8:45 am]

BILLING CODE 3510–22–P

DEPARTMENT OF COMMERCE

National Oceanic and Atmospheric Administration

RIN 0648–XF282

Endangered and Threatened Species; Listing and Recovery Priority Guidelines

AGENCY: National Marine Fisheries Service (NMFS), National Oceanic and Atmospheric Administration (NOAA), Commerce.

ACTION: Notice of final guidelines.

SUMMARY: We, NMFS, announce final revisions to the Recovery Plan Preparation and Implementation Priorities and the Recovery Plans sections of the 1990 Listing and Recovery Priority Guidelines. The revised guidelines prioritize limited agency resources to advance the recovery of threatened and endangered species by focusing on the immediacy of the species' overall extinction risk; the extent of information regarding major threats; the extent to which major threats are primarily under U.S. authority, jurisdiction, or influence; and the certainty that management or protective actions can be implemented successfully. We did not revise the Listing, Reclassification, and Delisting Priorities section of the 1990 Listing and Recovery Priority Guidelines. We determined those guidelines, which are repeated herein (with minor editorial and format changes for consistency), are sufficient to prioritize listing actions.

DATES: These guidelines are effective on May 30, 2019.

ADDRESSES: These final guidelines are available on the internet at *https://www.federalregister.gov/* at Docket Number NOAA–NMFS–2017–0020 and at *https://www.fisheries.noaa.gov/national/endangered-species-conservation/endangered-species-act-guidance-policies-and-regulations.*

FOR FURTHER INFORMATION CONTACT: Angela Somma, Endangered Species Conservation Division, Office of Protected Resources, National Marine Fisheries Service, 1315 East-West Highway, Silver Spring, MD 20910, 301–427–8403.

SUPPLEMENTARY INFORMATION:

Background

Section 4(f) of the Endangered Species Act (ESA) (16 U.S.C. 1533(f)) requires the Secretary (as delegated to NMFS) to develop recovery plans for all species listed pursuant to the ESA, unless he/she finds that such a plan will not promote the conservation of the species. ESA section 3(16) (16 U.S.C. 1532(16)) defines a species to include any subspecies of fish or wildlife or plants, and any distinct population segment (DPS) [1] of any species of vertebrate fish or wildlife which interbreeds when mature. ESA section 4(h) (16 U.S.C. 1533(h)) requires NMFS to establish a system for developing and implementing, on a priority basis, recovery plans under ESA section 4(f). The priority system applies to recovery plan preparation and implementation for species listed as endangered or threatened under the ESA unless we find that such a plan will not promote the conservation of the species. We finalized guidance to prioritize recovery plan development and implementation on June 15, 1990 (55 FR 24296). Through our application of the 1990 guidelines, we determined that the Recovery Plan Preparation and Implementation Priorities and Recovery Plans sections of the guidelines (see parts B and C, 55 FR 24296; June 15, 1990) contain vague descriptions and lack sufficient detail regarding factors that should be considered when evaluating threats and recovery potential. For these reasons, we proposed revisions to the guidelines (82 FR 24944; May 31, 2017). Following review of public comments received on the proposed revision and additional internal review, we have revised the 1990 guidelines, as detailed herein.

Changes From the Proposed Guidelines

The final guidelines differ from our proposed guidelines (82 FR 24944; May 31, 2017) in three substantive respects:

First, we added two ''uncertain'' population trend categories for assigning the severity of the species' demographic risk: (a) Uncertain–likely decreasing, which is assigned a HIGH and MODERATE demographic risk rank for endangered and threatened species, respectively; and (b) uncertain–likely stable or increasing, which is assigned a MODERATE and LOW demographic risk rank for endangered and threatened species, respectively. See our response to comment 12 for details.

Second, in the proposed guidelines, the recovery priority numbers ranged from 1 to 24. In the final guidelines, we simplify the numbering scheme to assign the same priority number to several combinations of the evaluation criteria based on total weights given to each criterion, resulting in priority

[1] In the policy recognizing DPSs (61 FR 4722, February 7, 1996), NMFS determined that evolutionarily significant units for Pacific salmonids (56 FR 58612, November 20, 1991) represent DPSs.

numbers that range from 1 to 11. See our response to comment 28 for details.

Third, we changed the broad application of the conflict criterion to a case-by-case determination indicated by a 'C' for conflict in Table 4 (columns 5 and 6). See our response to comment 7 for details.

We also made a number of non-substantive and editorial changes to the proposed guidelines, based on comments received and internal review, as summarized in the remainder of this section.

We added a sentence in the background section to clarify that ''. . . the priority system applies to recovery plans for species listed as endangered or threatened under the ESA unless we find that such a plan will not promote the conservation of the species.'' See our response to comment 19 for details.

We changed the title of ''Step 1. Identify a Demographic Risk Category'' to ''Step 1. Identify a Demographic Risk Rank'' to more accurately describe the action in that step.

We split the Decreasing/Unknown trend in Table 1 (82 FR 24946; Table 3 herein) into two trends to clarify each should be considered separately.

We changed the title of Table 2 (82 FR 24848; Table 4, herein) to ''Recovery Priority Plan Preparation and Implementation'' to reflect the title of Part B: Recovery Plan Preparation and Implementation Priorities.

To the Recovery Potential Component 1 (Major Threats Well Understood), we added to the description of the HIGH category the sentence: ''Identification and knowledge of a species' response to any *one* major threat would fit into this category.'' The addition is intended to clarify that not all major threats must be well understood to qualify for this category. We also added to the description of the HIGH category the sentence: ''This can apply also to transnational or foreign species where major threats occur beyond U.S. waters or the high seas, but U.S. markets that contribute substantially to those major threats have been identified and the species' responses to those threats are well understood.'' The additional sentence illustrates application of the component to plans for transnational and foreign species. See our response to comment 19 for details. Finally, we added a sentence to the description of the LOW TO MODERATE category: ''If no major impacts exist, natural and man-made threats that have or are believed to have less than a major impact on the species' ability to persist also belong to this category'' to clarify that if no major threats exist, then this category would apply. We added this sentence to the LOW TO MODERATE categories for Recovery Potential Components 2 and 3 because it applies to all components.

To Recovery Potential Component 2 (U.S. Jurisdiction, Authority, or Influence Exists for Management or Protective Actions to Address Major Threats), we added to the description of the HIGH category the sentence: ''This may also apply to transnational or foreign species whose major threats include U.S. markets that represent a substantial source of demand for the species, and the United States may be able to influence the abatement of such demand.'' The additional sentence illustrates application of the component to plans for transnational and foreign species. See our response to comment 19 for details.

To Recovery Potential Component 3 (Certainty that Management or Protective Actions will be Effective), we added language to the description of the HIGH category to specify that demonstrated success may include categories of actions that have proven effective for other species, but may require further testing for the targeted species (*e.g.,* fishing gear modifications, methods to overcome or modify barriers to fish passage). See our response to comment 26 for details.

To Step 4: Assign Recovery Action Priority, we changed the title to ''Assign Recovery Plan Action Priority'' to indicate that actions within a recovery plan may be broader than those actions taken to achieve recovery. We added ''Recovery'' to priority numbers 1, 2, and 3 to clarify these actions are taken to achieve recovery. We added 'research' to the description for recovery action number 3 to clarify that research actions can also be in this category. We added the sentence: ''In assigning sub-priorities within a category, recovery actions that benefit multiple species and/or are likely to yield faster results that are sustainable should be given the highest priority, *e.g.,* Priority 1a versus Priority 1c.'' The additional sentence clarifies that recovery actions that may benefit multiple species should be given priority over others that are within the same recovery priority category. See our response to comments 34 and 35 for details. Finally, we deleted Table 3 (82 FR 24949) because the narrative for assigning recovery plan action priorities was more informative than the table.

To the Process for Applying Part B: Recovery Plan Preparation and Implementation Priorities, we added the following text to clarify how to prioritize when multiple species are being considered together in the recovery planning process: ''The lead NMFS Region or Headquarters will prioritize species within their jurisdiction according to the following factors. Where a recovery plan covers multiple species, the highest ranked species should dictate the priority for recovery plan preparation and implementation. For example, if a recovery plan covers species A assigned a recovery priority number 1 and species B assigned a recovery priority number 8, species A would dictate the recovery plan preparation priority. Implementation of recovery actions within the plan would also be prioritized for species A where recovery actions are assigned the same priority numbers (*e.g.,* recovery actions assigned priority number 1 for species A would be given a priority over recovery actions assigned priority number 1 for species B).''

Under *Definitions,* we made the following changes:

1. We deleted the definitions for ''threatened species,'' ''endangered species,'' and ''foreseeable future.'' See our response to comment 37 for details;

2. We changed the definition of ''depensation'' to: ''A decline in productivity in a population as the abundance declines that can result in increased extinction risk due to factors such as the uncertainty that mates will be able to find one another, randomly skewed sex ratios, changes to predator behavior to shifting prey abundance, or scaling effects of random variation among individuals.'' See our response to comment 39 for details;

3. We added a definition of ''productivity'' from the NMFS' 2017 Guidance on Responding to Petitions and Conducting Status Reviews under the Endangered Species Act: ''The population growth rate, over the entire life cycle. Factors that affect population growth rate provide information on how well a population is ''performing.'' These parameters, and related trends in abundance, reflect conditions that drive a population's dynamics and thus determine its abundance. Changes in environmental conditions, including ecological interactions, can influence a population's intrinsic productivity, the environment's capacity to support a population, or both. Such changes may result from random environmental variation over a wide range of temporal scales (environmental stochasticity). A population growth rate that is unstable or declining over a long period of time indicates poor resiliency to future environmental change.'' See our response to comment 42 for details.

Summary of Comments and Responses

The notice announcing the proposed revision (82 FR 24944; May 31, 2017) requested public comment through June 30, 2017. We received several requests to extend the public comment period, which we extended through August 28, 2017 (82 FR 29841; June 30, 2017). We received 10 comment letters from the public, tribes, states, nongovernmental organizations, and one federal agency. Comments included support for the revision to the guidelines, minor clarifying edits, and substantive comments. We considered all substantive information and comments provided during the comment period, and where appropriate, incorporated them directly into these final guidelines or addressed them below. Comments received were grouped by topic or applicable section of the proposed guidelines. Comments and our responses are presented below. Comments not relevant to the guidelines are not discussed.

General to the Proposed Guidelines

Comment (1): Several commenters felt that the subjective nature of the proposed guidelines would hinder NMFS' ability to be more effective at recovery planning and implementation. One commenter acknowledged the subjective nature of the priority guidelines and recommended that NMFS regional offices seek concurrence with NMFS Headquarters on priority determinations to ensure consistency of application.

Response: We acknowledge that the revised priority guidelines are subjective, as are the 1990 guidelines. Professional knowledge and judgement must be used, in part, when making decisions about resource priorities for recovery plan development and implementation. In the revised guidelines, we clarify terms and provide greater detail to guide decision-makers. We disagree with the comment that NMFS regional offices should seek NMFS Headquarters concurrence on priority determinations because it places an unnecessary administrative burden on staff. However, NMFS Headquarters is always available to consult, upon request, with a regional office on issues such as prioritization of high-profile species. And NMFS Headquarters does review the priority determinations every 2 years as part of the report to Congress (ESA section 4(f)(3)) on NMFS' efforts to develop and implement recovery plans and the status of listed species. As part of that review process, we examine how the priority numbers are assigned and address any apparent inconsistencies in priority numbers across species.

Comment (2): One commenter felt NMFS should take a broader approach beyond prioritizing the order in which recovery planning is conducted for certain species. The commenter felt the broader approach should focus on delisting the species and rely on states, local governments, or other entities who are willing to fund or conduct activities that will promote recovery. The commenter stated that NMFS must recognize the important role these non-federal partners have in achieving recovery of listed species and prioritize the recovery planning for species where there are such partners who will contribute to the effort.

Response: We agree that a broad approach to recovery is necessary. NMFS recognizes the important role of partnerships in achieving recovery, and we have developed other guidance and policies that embody the concept of partnerships. For example, the cornerstone of the Interim Endangered and Threatened Species Recovery Planning Guidance (NMFS and FWS 2010) focuses on how to build partnerships. We also recognize that a recovery plan must be implemented to achieve results. Communication, coordination, and collaboration with a wide variety of potential stakeholders is essential to the acceptance and implementation of recovery plans. State agencies, because of their legal authorities and their close working relationships with local governments and landowners, are in a unique position to assist the NMFS and U.S. Fish and Wildlife Service (Services) in recovering listed species.

Comment (3): One commenter recommended that NMFS expand the guidelines to explain whether and, if so, how the priority for developing and implementing a recovery plan to conserve multiple species or ecosystem-based plans would be different than if plans were developed and implemented separately for those species.

Response: NMFS does not intend to prioritize development and implementation of multi-species or ecosystem recovery plans over single-species plans. Single-species plans may often result in benefits to more than one listed species (*e.g.,* sea turtles) either directly or through improved ecosystem functions. A single-species recovery plan does not necessarily equate to fewer benefits compared to a multi-species or ecosystem plan. The guidelines specify where a recovery plan covers multiple species, the highest ranked species should dictate the priority for recovery plan preparation and implementation. However, we agree that when prioritizing individual recovery actions within a plan, direct and indirect benefits to other species should be considered (see our response to comment 34).

Comment (4): One commenter stated that the proposed priority guidelines would result in assigning a lower recovery priority number to species whose demographic risk category improves. The commenter felt this prioritization system was contrary to the goal of delisting a species.

Response: We acknowledge that the priority guidelines, which place the greatest weight on a species' demographic risk, could potentially result in lower priority numbers as a species' risk condition improves over time. An improved demographic condition is likely the result of implementing effective management or protective actions that address the threats affecting such condition. In such a case, all three components of the species' Recovery Potential might be assigned a HIGH category. Thus, a species that goes from a HIGH to a LOW demographic risk could still be assigned a relatively high number on the recovery priority scale (see Table 2 in 82 FR 24948; Table 4, herein). We concluded that the balance between the demographic risk and the three recovery potential components allows for sustaining a focused recovery program to achieve delisting.

Comment (5): One commenter requested that NMFS explore including the evolutionary significance of the species (*i.e.,* monotypic genus, species, subspecies, distinct population segment (DPS)) when setting recovery priorities in order to preserve genetic diversity. The commenter noted that without consideration of taxonomic hierarchy, the guidelines might bias priorities toward DPSs or subspecies, which generally occupy more restricted ranges than full species and, as a result, might face threats that are more localized and easier to identify or remedy.

Response: Assigning a lower priority to a subspecies or DPS may not result in saving as much genetic diversity as possible, as the commenter proposes. For example, when a DPS is listed, the Services must determine its importance to the taxon to which it belongs, in order to address Congressional guidance that the authority to list DPSs be used ''. . . sparingly'' while encouraging the conservation of genetic diversity (61 FR 4722; February 2, 1996). Further, NMFS policy (56 FR 58612; November 20, 1991) requires that a population must represent an important component of

the evolutionary legacy of a species in order to be considered an Evolutionarily Significant Unit, which is equivalent to a DPS (61 FR 4722; February 2, 1996). Therefore, the importance of conserving genetic diversity is clearly a driver in determining whether to list a DPS or not; if a DPS is listed, it follows that it is listed, in part, because it will conserve genetic diversity of the biological species.

We acknowledge that the three components of the recovery potential criteria may result in prioritizing recovery plan development and implementation for listed entities with a restricted range over those with broader ranges encompassing multiple geopolitical boundaries. However, we stress that the guidelines provide for prioritizing far-ranging species. For example, Recovery Potential Component 2 considers international mechanisms (*e.g.,* treaties, conventions, and agreements) and allows a HIGH category for transnational species that spend only a portion of their life cycle in U.S. waters, but whose major threats can be addressed by U.S. actions during that portion of their life cycle. We were unable to identify alternatives to the Recovery Potential Components that would provide more balance for those species with broader or global ranges without making prioritizing one species over another more difficult and less transparent regarding which attributes were being considered as more important.

Comment (6): One commenter felt that life histories of species might affect their priority ranking under the proposed criteria. For example, a so-called r-selected species might be able to recover quickly once threats to its survival have been removed. On the other hand, K-selected species, such as marine mammals, that have lower reproductive potential but higher survival, may take decades or even centuries to recover. The commenter felt that recovery options for some marine mammal species might be limited.

Response: We disagree that the priority guidelines bias toward certain life history traits. In assigning a demographic risk, the severity of the condition for productivity, spatial distribution, diversity, and abundance is considered. We acknowledge that a species' life history trait may make it more vulnerable to a particular demographic risk but the threats and the species' response to those threats may vary greatly across taxa. In assigning recovery potential, the time it takes for a species to respond to a major threat is not a factor.

Comment (7): One commenter supported considering the conflict criterion to be met for all listed species under NMFS jurisdiction, as was proposed. However, several commenters were concerned by what they described as NMFS eliminating the conflict criterion in the proposed priority guidelines. They recommended that NMFS retain and expand the conflict criterion to consider variations in the scope (global, regional, or local), nature (direct or indirect), and degree of potential conflicts between listed species and economic-related activities. One commenter recommended that, where appropriate, NMFS should ensure that it clearly identifies and explains the magnitude of risk or conflict with economic activity and identifies recovery measures that facilitate species conservation while ensuring that economic activities can continue.

Response: To clarify, NMFS did not propose to eliminate the conflict criterion. The ESA specifically calls for considering the role of construction, other development projects, and other forms of economic activity in setting recovery priorities. Rather, we proposed to *apply* the criterion to all species based on the current and likely future condition that all listed species under our jurisdiction are either directly or indirectly in conflict to some degree with an economic activity (82 FR 24945). We are unaware of any ESA-listed species under our authority that is not considered, either directly or indirectly, to be in conflict to some degree with an economic activity. However, we agree with the commenters that the application of conflict is better applied on a case-by-case basis. We added a 'C' for conflict in Table 4. This is consistent with FWS' Endangered and Threatened Species Listing and Recovery Priority Guidelines (48 FR 43098; September 21, 1983). We considered including variations in the scope (global, regional, or local), nature (direct or indirect), and degree of potential conflicts between listed species and economic-related activities, but rejected it because we were unable to determine how to incorporate these variations across all taxa given that a species' exposure and response to the same economic activity can vary greatly.

Part B: Recovery Plan Preparation and Implementation Priorities: Step 1. Identify a Demographic Risk Category

Comment (8): One commenter felt that the inclusion of a demographic risk assessment would not meaningfully improve the recovery planning process. The commenter stated that a listed species would presumably exhibit one of these demographic risk conditions, either presently or in the foreseeable future, by nature of it being listed. To the extent that these risk conditions already are captured by the species' listing status, the commenter stated they do not further inform the priority ranking process or allow for ranking distinctions within the endangered or threatened classifications.

Response: We determined that the demographic risk category was an important element to consider when prioritizing recovery plan development and implementation. While a status review provides the best available science on a species' extinction risk at the time of listing, the available scientific information may evolve rapidly post-listing. We also recognize that not all listed endangered or threatened species exhibit similar demographic conditions and trends. The inclusion of the demographic risk category allows identification of the worst-case scenario for each demographic factor: Productivity, spatial distribution, diversity, and abundance. This approach allows us to focus attention on those species exhibiting the most severe demographic conditions (*e.g.,* small, fragmented populations).

Comment (9): One commenter mistakenly thought an endangered species could be assigned a LOW category for demographic risk. The commenter felt that such assignment might create a misunderstanding given the ESA definition of an endangered species. The commenter recommended some other categorization scheme such as ''extremely critical, critical, and stable or increasing.''

Response: The priority guidelines only allow a LOW category for demographic risk to be assigned to a threatened species and not an endangered species (82 FR 24926). An endangered species may be assigned a MODERATE category if it does not meet any of the adverse risk conditions for the demographic risk categories and its population trend is stable, increasing, or uncertain—likely stable or increasing (Table 3, herein). The uncertain population trend is a new category added to the final guidelines. See our response to comment 12 for details.

Comment (10): One commenter was concerned about the proposed inclusion of the term ''substantially'' when considering mixed population trends in assigning a demographic risk category. The commenter characterized the term as ''substantially increase the listed entity's extinction risk'' and claimed the language to be vague and subject to

arbitrary interpretation that could lead to inappropriately excluding declining populations from consideration, for example, due to political pressures or higher costs of recovery for those populations.

Response: To clarify, the priority guideline language for mixed populations is if key populations are declining such that their continued decline would contribute substantially to the listed entity achieving the adverse risk conditions described in Table 1 (82 FR 24946). The priority guidelines are not an extinction risk analysis, as that analysis was conducted to support the decision to list the species. Rather, the priority guidelines are meant to guide the decision-maker in assigning a demographic risk category in the event that a listed entity exhibits mixed trends among key populations. The test is whether key populations' decline would lead the listed entity to being at or below depensation; limited or fragmented in spatial distribution to a level that renders the listed entity vulnerable to catastrophe; low in genetic and phenotypic diversity to a degree that the listed entity is severely limited in adaptive potential; or exhibiting only one, or a few, small population(s) or subpopulations. We recognize that the term ''substantially'' can be subjective, but the adverse risk conditions described in Table 1 (82 FR 24296; Table 3 herein) are founded on conservation biology principles (for example, see McElhany *et al.* 2000). We find the term ''substantially'' (*i.e.,* considerably or to a large extent) adequately describes the relative contribution of key populations to the listed entity's ability to avoid the adverse risk conditions described in Table 1 (82 FR 24296; Table 3 herein).

Comment (11): Several commenters recommended that a HIGH demographic risk rank be assigned to a threatened species to prevent it from becoming endangered. One commenter felt that we should prioritize first on recovery potential and second on demographic risk. As proposed, the commenter pointed out that, if a threatened species scores high on all recovery potential components, the highest recovery priority it can achieve is Recovery Priority number 4. The commenter stated that this outcome seems inconsistent with the goal of the guideline revision to ''better prioritize limited agency resources to advance the recovery of threatened and endangered species.'' The commenter felt it prudent to invest limited resources toward recovery planning for species that would benefit, regardless of their listed status.

Response: We based the proposed guideline revision on the underlying principle that endangered species are a higher priority than threatened species because of the immediacy of the extinction risk, with endangered species being presently in danger of extinction. We determined that this approach was rational and appropriate because it focuses limited resources on species with a high extinction risk. We also do not agree that limiting a threatened species to a MODERATE demographic risk rank would increase its extinction risk. A threatened species with a HIGH recovery potential in all three components could potentially be assigned a Recovery Priority number 4 (out of 24) in the proposed and a number 3 in the final guidelines (out of 11; see our response to comment 28), which would allow limited agency resources to address those species whose demographic risk may not be high, but whose recovery potential is high. In addition, with regard to prioritizing recovery plan implementation, the endangered or threatened category may be applied to a species currently not listed as such if NMFS has recommended a reclassification through a 5-year review or proposed rule (see footnote to Table 1 in 82 FR 24296; Table 3 herein).

Comment (12): One commenter felt that an unknown population trend should not default to the highest prioritization. The commenter recommended that an unknown population trend be categorized as MODERATE and LOW for endangered and threatened species, respectively.

Response: An unknown population abundance trend was grouped with the decreasing trend as a caution to conserve the species in light of the lack of data. Unknown is defined as when a species has fewer than 3 data points over a 10-year period or all available data years to estimate trends. However, we recognize that there may be species for which some data are available to indicate the direction of the trend, but the data are uncertain. Uncertain is when the species has 3 or more data points over a 10-year period or all available data years, but there is great uncertainty over data quality to estimate trends. To differentiate these cases from truly unknown trend cases, we added two ''uncertain'' categories: (a) Uncertain—likely decreasing, which is assigned a HIGH and MODERATE for endangered and threatened species, respectively; and (b) uncertain—likely stable or increasing, which is assigned demographic risk ranks of MODERATE and LOW for endangered and threatened species, respectively.

Comment (13): One commenter recommended NMFS use generations rather than a set number of years in determining the population trend. Another commenter recommended NMFS include an assessment of whether a fluctuation in population is temporary (and may self-correct) or is indicative of a long-term trend, and prioritize species accordingly.

Response: In order to use generations to determine population trend, we would need to have sufficient data to determine the generation time for each taxa or each species. We recognize that our species vary widely in generation length. To the extent possible, we analyze the data for each species taking into account their unique life history, including generation time. The population trend measure is intended to indicate more of a medium-to long-term trend, and not temporary fluctuations in population. We have added a trend category of 'UNCERTAIN' to indicate when there is great uncertainty over data quality to estimate trends.

Comment (14): One commenter recommended that NMFS develop a definition for the term ''measurably'' as used in the population trend to describe either higher or lower numbers between assessments, or that a more precise term (statistically significant) should be used.

Response: The term ''statistically significant'' would be too limiting for the purposes of the priority guidelines. In many cases, we do not have adequate data on population trends to determine statistical significance. Rather, the common term ''measurably'' indicates that the data points across the years are noticeably different and can be measured, without the need for a formal definition. We concluded that this term was adequate for the purposes of assessing a population trend in Step 1.

Part B: Recovery Plan Preparation and Implementation Priorities: Step 2. Identify Categories of Recovery Potential: Recovery Potential Component 1: Major Threats Well Understood

Comment (15): Several commenters felt that cases where only minimal data was needed to fill knowledge gaps on major threats should not be given priority over cases where data needs are substantial. They stressed this approach may contribute to putting some species in a negative feedback loop that hinders recovery. One commenter felt that assigning a lower priority to cases where major threats are not well understood was inconsistent with the recovery action priorities, which recognize research as an important component to achieving recovery. They recommended

that a HIGH category be assigned to species for which research is needed to fill knowledge gaps about major threats or effectiveness of management or protective actions (Recovery Potential Component 3: Certainty that Management or Protective Actions will be Effective).

Response: The priority guidelines are meant to prioritize recovery plan development and implementation. The priority guidelines logically place a higher priority on those species where sufficient information regarding major threats exists, because in order to identify effective management or protective actions we need to understand the threats that affect the species' ability to persist. Once a recovery plan is developed, the implementation of research actions to address knowledge gaps potentially can be given a recovery action priority 1 to identify those actions that must be taken to prevent extinction. We do not view this as an inconsistency between the Recovery Potential criteria and the Recovery Action criteria. Rather, through recovery plan implementation, the recovery priority guidelines are meant to encourage collection of data and evaluate progress. As more information is gathered about threats and effectiveness of management and protective actions, the species moves up the priority scale by improving the recovery potential.

Comment (16): One commenter agreed with the HIGH category for species with minimal data gaps, but recommended the HIGH category also include situations where missing data can be secured with reasonable effort.

Response: We concluded that incorporation of situations where missing data can be secured with ''reasonable effort'' was difficult to define and evaluate given that multiple variables (*e.g.,* funding, partners, and research methods) could contribute to whether such effort was reasonable.

Comment (17): One commenter felt that NMFS' proposal to make a ranking distinction based on whether the natural or man-made threat has been identified and whether the species' responses to these threats are well understood was inappropriate. The commenter stated this determination is already made by NMFS as part of the decision on whether to list the species. The commenter felt that if NMFS lacks the requisite data on identifiable threats or the species' response to those threats in the recovery potential context, the species should not have been listed as a threshold matter.

Response: The assessment described in the proposed priority guidelines is not equivalent to the risk assessment conducted to develop a listing determination. The priority guidelines are based on whether threats that have a *major* impact on a species' ability to persist have been identified, and whether the species' response to those particular threats is well understood. This allows us to focus, as a priority, on those threats that are known to have a major impact on the species. In making a listing determination, the species' vulnerability, exposure, and biological response to *all* threats are considered. A listing assessment thus considers the entire suite of threats, including any cumulative effects from multiple threats, and is not based on identification or consideration of just the major or the most serious threats. In addition, a listing decision is based on whether the species meets the definition of an ''endangered species'' or a ''threatened species.'' In making a listing determination, we are required to rely on the best available scientific and commercial data. The available data may not allow us to distinguish or even identify which particular threat or threats pose the greatest risk to the species, nor are we required to do so in order to make a listing determination. The question is whether the species is in danger of extinction or is likely to become in danger of extinction within the foreseeable future throughout all or a significant portion of its range. For prioritizing recovery plan development and implementation, we can, however, generally rely on the listing assessment to identify the major threats to the particular species.

Part B: Recovery Plan Preparation and Implementation Priorities: Step 2. Identify Categories of Recovery Potential: Recovery Potential Component 2: U.S. Jurisdiction, Authority, or Influence Exists To Address Major Threats

Comment (18): One commenter felt that Recovery Potential Component 2 should be combined with Recovery Potential Component 3 (Certainty that Management or Protective Actions will be Effective) because they are sufficiently related, and this combination would simplify the guidelines.

Response: We agree that, as a general matter, U.S. jurisdiction, authority, or influence may affect the certainty that actions will be effective. However, there may be novel or experimental actions that are less certain to be effective, regardless of jurisdiction. Prioritizing recovery efforts based on effectiveness of actions both beyond and within U.S. jurisdiction is an important aspect to achieving recovery. We concluded that the two components are sufficiently distinct and should be considered separately.

Comment (19): Several commenters requested clarification on exactly what Recovery Potential Component 2 addresses; *i.e.,* is it to identify situations when a plan for a foreign species should be prepared, to set priorities for transnational species that occur within areas subject to the jurisdiction of both the United States and other countries, to set priorities for species that occur on the high seas, or some combination of these?

Response: The priority guidelines address only those species for which a recovery plan will be or has been developed, not making a determination that development of a recovery plan would not promote the conservation of the species. We added language to the Background section on the scope of the priority scheme to clarify this point. We consider many factors in our finding that a recovery plan would not promote the conservation of the species. For example, there may be instances where effective international agreements, conventions, or treaties do not exist, or the United States does not or cannot participate in partnerships that would promote the conservation of transnational species, and the other range countries or international organizations are not interested in engaging in joint recovery efforts. Thus, in this instance, the species would not have a recovery plan developed and these guidelines would not apply. We added language to Recovery Potential 2 and Recovery Potential 1 (Major Threats are Well Understood) to include considerations applicable to transnational and foreign species where a recovery plan has been or will be developed.

Comment (20): One commenter requested examples of where a LOW TO MODERATE category would be applied under Recovery Potential Component 2, for developing a recovery plan for foreign species.

Response: The purpose of this criterion is to prioritize based on the United States' ability to take management and protective actions to address major threats. Examples of species that occur only partly within U.S. jurisdiction include sea turtles, large whales, and some anadromous fish. It is not possible to provide a definite example of a LOW TO MODERATE categorization because that evaluation must be conducted during the prioritization process based on all information available at the time. Nonetheless, we can provide an

illustration of how the process could work. Olive ridley sea turtles (*Lepidocheyls olivacea*) range throughout temperate regions worldwide, and these turtles face threats within U.S. waters, on the high seas, and in foreign countries. NMFS would evaluate the degree to which the United States has jurisdiction, authority, or influence to address impacts of major threats to these turtles. A LOW TO MODERATE category could be assigned if threats within U.S. waters are minor, and major threats that are under the jurisdiction of foreign nations cannot be effectively addressed through any international mechanism to which the United States is a party or can otherwise influence.

Comment (21): Several commenters requested clarification on the difference between ''jurisdiction,'' ''authority,'' and ''influence.'' One commenter felt that it was unclear what the United States can or might be able to influence, with respect to extra-jurisdictional species. To the extent possible, the commenter requested additional guidance concerning these terms. For example, is the term ''influence'' intended to apply exclusively to the U.S. Government, or would it also apply to influence exerted by U.S. businesses or non-governmental organizations?

Response: In the second criterion for assessing recovery potential, we use the term ''authority'' in terms of legal authority, with a meaning very similar to ''jurisdiction.'' But because ''jurisdiction'' is a more technical term and can be used more narrowly, such as when describing the scope of judicial power, we included both terms to convey our intent to consider the full reach of U.S. governmental powers or control to implement management or protective actions. Our inclusion of the term ''influence'' is different. There we are describing the extent to which the United States may indirectly facilitate management or protective actions being put in place. For example, through its contacts with foreign governments that could further conservation of the species, the United States may at times be able to persuade those governments to adopt conservation practices affecting species on the high seas, even if the U.S. Government has no direct power over the species or its habitat.

Comment (22): One commenter was concerned that Recovery Potential Component 2 was limited to considering only existing international mechanisms as proposed. The commenter claimed that the limitation was contrary to section 8 of the ESA, which directs the Secretary, along with the Secretary of State, to encourage foreign countries to provide for the conservation of listed species and to enter into bilateral or multilateral agreements to provide for such conservation. The commenter requested that NMFS include consideration of additional potential agreements or other mechanisms that the United States could enter into and that would be effective in abating the risk to the species.

Response: We acknowledge that ESA section 8(b) calls for the Secretary, through the Secretary of State to, among other things, encourage entering into bilateral or multilateral agreements with foreign countries to provide for species conservation. However, it would be too speculative to base recovery priorities on the possibility of future agreements where the countries involved along with provisions and processes for addressing threats have yet to be developed. The priority guidelines do not implicate our responsibilities under ESA section 8—rather, the priority guidelines assist in prioritizing efforts where they will be more effective at recovering species. Through our efforts under ESA section 8(b), should additional agreements be identified and entered into, then those would be considered under this component.

Comment (23): Several commenters were concerned that the proposed language regarding how to assess climate threats might allow NMFS to de-prioritize species impacted by climate change unless local management actions can help the species. The commenters requested the climate threats language be clarified so that species for which climate change is a major threat are classified as high priority because the United States has the ability to decrease local as well as global climate change impacts through U.S. greenhouse gas mitigation and climate adaption actions.

Response: Where climate change impacts are a major threat and actions to abate the threat are global, the priority guidelines assume that the global management or protective actions are not primarily under U.S. authority, jurisdiction, or influence to abate major threats through existing international mechanisms (*e.g.,* treaties, conventions, and agreements). We conclude this assumption is logical because of the scale and complexity of addressing global climate change. We consider U.S. activities undertaken to address greenhouse gas mitigation and climate adaption to be management or protective actions that would help offset global climate change impacts.

Comment (24): One commenter felt that the guidelines' language regarding how to assess climate threats implies that NMFS will place the needs of the species secondary to actions that offset climate change impacts. The commenter declared that given the large uncertainties associated with climate change, this climate priority factor is simply inconsistent with the better logic of focusing recovery on known, manageable threats where recovery actions are more effective.

Response: We disagree that the guidelines' language regarding how to assess climate threats de-prioritizes focus of recovery on known, manageable threats where recovery actions may be more effective. The language acknowledges that the United States may have jurisdiction, authority, or influence to address local threats that offset climate impacts despite a lack of jurisdiction, authority, or influence to address the impacts of climate change globally. For example, the recovery plan for elkhorn coral (*Acropora palmata*) and staghorn coral (*A. cervicornis*) identifies reduction of atmospheric carbon dioxide concentrations as a high priority recovery strategy (NMFS 2015). However, the recovery plan calls for simultaneous local threat reductions and mitigation strategies, including reduced chronic or localized mortality sources (predation, anthropogenic physical damage, acute sedimentation, nutrients, and contaminants). The language in the guidelines will allow NMFS to consider these locally known and manageable threats when assigning a HIGH or LOW TO MODERATE category. By prioritizing species for which the United States can abate local threats to offset global impacts of climate change, we are better able to advance recovery for these vulnerable species.

Comment (25): One commenter recommended the priority guidelines be expanded to include a temporal component for addressing climate change and similar threats, such that recovery actions that may take a long time to bear fruit, but that nevertheless are important to species recovery, are given high priority regardless of whether they are directed at endangered or threatened species.

Response: We disagree that a temporal component to address climate change and similar threats is necessary to prioritize recovery plan development and implementation appropriately. The priority guidelines allow for an assessment of major threats regardless of timing. The recovery potential criteria are the extent to which major threats are understood; whether the United States has jurisdiction, authority, or influence to address major threats; and the relative certainty that management or protective actions to address major threats will be

effective. Management or protective actions assessed under these criteria could yield results across different periods and will likely vary greatly depending on the action and the species. We determined that an assessment of the recovery potential based on the timing of a species' response to abatement of a particular major threat should be done on a case-by-case basis.

Part B: Recovery Plan Preparation and Implementation Priorities: Step 2. Identify Categories of Recovery Potential: Recovery Potential Component 3: Certainty That Management or Protective Actions Will Be Effective

Comment (26): Several commenters were concerned that species requiring novel or experimental protective actions will be scored too low under the proposed recovery plan priorities. One commenter cited additional gear research for reducing entanglement-related mortality for North Atlantic right whales and fish passage across dams as novel or experimental.

Response: In developing the criteria, we identified certain attributes that should place a species higher on the priority list. Management and protective actions that are less certain to achieve recovery goals are a lower priority over actions that are known to be effective because the costs (*e.g.,* funding, staff, and monitoring) incurred may not realize the same benefits as those actions that are known to be effective at achieving recovery goals. However, the priority guidelines do not relieve NMFS of the responsibility to undertake recovery efforts, which may include experimental actions, for listed species. Rather, the priority guidelines help target limited resources in an efficient manner so that recovery goals can be met. Once a plan has been developed, the priority guidelines allow NMFS to prioritize research actions to fill knowledge gaps and identify management actions necessary to prevent extinction, thereby improving the certainty that a management or protective action will be effective. We added language to the description of the HIGH category for Recovery Potential Component 3 to explain that demonstrated success may include categories of actions that have proven effective for other species, but may require further testing for the targeted species (*e.g.,* fishing gear modifications, methods to overcome or modify barriers to fish passage).

Comment (27): One commenter recommended that NMFS add ''economically feasible'' and ''capable of timely implementation'' to the criterion for effectiveness of management or protective actions. The commenter also recommended that NMFS add a recovery potential component that assigns priority based on the degree of certainty associated with the implementation of management or protective actions (*e.g.,* existing partners willing to take action). The commenter felt that while technical feasibility is an important consideration, without a corresponding assessment of economic feasibility and timeliness and certainty of implementation, there is no way to fully assess the certainty of whether a particular action will be effective.

Response: We considered whether to include economic feasibility when developing the criterion, but rejected it because the ESA calls for giving priority for recovery plan development to those species that are most likely to benefit from a plan, (which includes because they are in conflict with economic activity such as construction and other development projects), not based on broader economic considerations. In addition, inclusion of economic feasibility in the prioritization would introduce a factor not considered in the listing decision and may move us further away from the recovery goal to delist the species. We also considered inclusion of timeliness and degree of certainty of implementation, but rejected it because of the uncertainty in being able to evaluate timeliness and implementation, which are influenced by many factors (*e.g.,* ready partners, funding, and opportunity).

Part B: Recovery Plan Preparation and Implementation Priorities: Step 3. Assign Recovery Priority Number for Plan Preparation and Implementation

Comment (28): One commenter recommended that the assessment framework be simplified to capture the severity of the demographic risk within the context of the potential and immediacy of conservation measures for the species.

Response: The priority guidelines provide a balance between consideration of the severity of the species' demographic risk and the species' potential for recovery. The assessment of recovery potential encompasses evaluation of whether major threats are well understood; abatement of major threats is under U.S. jurisdiction, authority, or influence; and there is certainty that management and protective actions will be effective. As such, this assessment inherently considers whether conservation measures would be effective for recovering the species. However, we do agree that the recovery priority numbering scheme described in the proposed guidance can be simplified. To develop the proposed table of recovery priority numbers, we used a spreadsheet to assign numerical weights to the criteria in descending order of importance: (1) Demographic risk, (2) extent to which major threats are understood, (3) whether management or protective actions are under U.S. jurisdiction, authority, or ability to influence the abatement of major threats, and (4) certainty that management or protective actions will be effective. The values assigned for the numerical weights reflected the relative order of importance, with a higher numerical weight assigned to the demographic risk and so forth in descending order based on the stated order of importance (82 FR 24947). Summing the total of those numerical weights for each combination of criteria rankings resulted in a number of ties, depending on the combination of HIGH, MODERATE, LOW, or LOW TO MODERATE categories assigned to the criteria. To break the ties, we sorted the tied rows based on the rankings of the individual criteria in the same descending order of importance. For example, in the proposed guidelines, a HIGH demographic risk in combination with a HIGH for two of the three recovery potential components was assigned Recovery Priority Number 3; whereas a MODERATE demographic risk in combination with a HIGH for all three recovery potential components was assigned Recovery Priority Number 4. In this particular example, the criteria combination with a HIGH demographic risk was assigned a higher priority number than the combination with a MODERATE demographic risk given that this criterion was considered of greatest relative importance. In essence, we weighted the criteria twice to ensure the recovery priority numbers were unique for any one combination of rankings assigned to the criteria. Upon further evaluation, we determined that a simpler and more transparent prioritization scheme would be to assign the same priority number to rows with any combination of ranked criteria having the same total weights. Thus for the above example, the final guidelines assign Recovery Priority Number 3 to both rows (see Table 4 herein). We concluded that this approach, which results in a more limited, but sufficient, range of recovery priority numbers, best reflects the stated order of importance of the criteria and still meets the objective of the revised guidelines.

Part B: Recovery Plan Preparation and Implementation Priorities: Step 4. Assign Recovery Action Priority

Comment (29): One commenter felt that the priority assignments for recovery actions would not lead to better species conservation outcomes. The commenter felt that the following language in the proposed revision to the guidelines was indicative of key problems currently undermining salmon recovery: ''. . . some lower priority actions may be implemented before Priority 1 actions, for example because a partner is interested in implementing a lower priority action, because a Priority 1 action is not currently possible (*e.g.,* there is a lack of political support for the action), or because implementation of the Priority 1 action may take many years'' (82 FR 24949; May 31, 2017). The commenter cited a report prepared for NMFS in 2011 on the implementation of the Puget Sound Chinook Recovery Plan (*http://www.westcoast.fisheries.noaa.gov/publications/recovery_planning/salmon_steelhead/domains/puget_sound/chinook/implement-rpt.pdf*), which found socio-political factors obstructed progress on several high-priority recovery actions related to habitat. The commenter pointed out that the report recommended several remedial actions to address the lack of progress, including defining the level of critical habitat required to ensure the recovery of Chinook salmon and other listed species and assessing the effectiveness of protective regulations. The commenter claimed that NMFS had yet to carry forth on these recommendations. The commenter recommended that NMFS review existing critiques and assess implementation of individual recovery plans to improve effectiveness of the recovery program.

Response: We undergo a review of listed species every 5 years. As part of the review, we evaluate progress made toward achieving the recovery criteria identified in the recovery plans and recommend, where appropriate, any changes that may be necessary to improve recovery progress. However, ESA section 4(h) requires an overarching priority system to develop and implement recovery plans, and we feel the revised guidelines improve our ability to identify those priorities. The priority guidelines identify criteria for assigning priorities to recovery actions and specify that priority 1 actions should be implemented first. However, the guidelines acknowledge that lower recovery actions may be implemented in advance of priority number 1 recovery actions if opportunities arise that allow successful implementation of such actions. We conclude that flexibility in applying the guidelines increases the likelihood of recovery actions being implemented.

In regard to the commenter's concern about the 2011 report on the implementation of the Puget Sound Chinook Recovery Plan, we acknowledge the pace could be improved to implement recovery actions, protect tribal treaty rights, and honor our tribal trust responsibilities. In response to release of the report, NMFS initiated habitat status and trends monitoring to quantify the extent and condition of salmon habitat in Puget Sound, inform our 5-year species status reviews, set habitat protection priorities, and guide regional and local protection strategies for salmon recovery. NMFS continues to work with tribes and our recovery partners in the region to educate the public about the importance of habitat protection for salmon recovery and cultivate socio-political support for implementing the diverse range of habitat actions necessary to achieve recovery. We work closely with state and local agencies and recovery partners to identify and support implementation of priority actions and protection measures that expedite habitat conservation and salmon recovery. NMFS will continue to review and refine our staff and resource investments to support both recovery actions in the 2007 Puget Sound Salmon Recovery Plan and recommendations in the 2011 implementation status report.

Comment (30): One commenter disagreed that threatened species should generally not be assigned priority 1 actions because, ''even though the timeline to extinction may be longer for threatened species, there are often important recovery actions that should be taken to prevent extinction of threatened species and that merit a Priority 1 ranking.''

Response: We agree there may be important recovery actions for threatened species, but in any priority ranking system a distinction must be made between the priority numbers assigned. Threatened species are likely to *become* in danger of extinction within the foreseeable future, in contrast to endangered species, which are *presently* in danger of extinction. Due to the greater risk of extinction, we determined that recovery actions that must be taken to prevent extinction of endangered species with a HIGH demographic risk rank are a higher priority than other recovery actions. We note that the priority guidelines allow some flexibility in assigning recovery action priorities. The use of Priority 1 recovery actions in a recovery plan for a species with a MODERATE demographic risk rank is allowed, but must be done judiciously and thoughtfully (82 FR 24948).

Comment (31): One commenter generally agreed that recovery actions for an endangered species should be a priority over those for a threatened species. However, the commenter recommended that the priority guidelines include flexibility that encourages early recovery actions be taken for threatened species when it makes sense from an economic or other perspective.

Response: The guidelines provide for the flexibility needed to allow for timely implementation of recovery actions for threatened species. As stated in the guidelines, this system recognizes the need to work toward the recovery of all listed species, not simply those facing the highest magnitude of threat (82 FR 24949). In general, NMFS intends Priority 1 actions be taken first, but we recognize that some lower priority actions may be implemented before Priority 1 actions, for example because a partner is interested in implementing a lower priority action. Periodic review of, and updates to, recovery plans and tracking of recovery efforts are also important elements of a successful recovery program. As research and monitoring results become available, priorities for implementing recovery actions, including those for threatened species, may change.

Comment (32): One commenter recommended that NMFS give a higher priority to Priority 0 Actions, which are all other actions that are not required for ESA recovery but that would advance broader goals beyond delisting. The commenter felt that achieving broad-sense conservation goals first might result in eliminating the need to take recovery actions identified for delisting. The commenter stated that in addition to ESA delisting, recovery plans should recognize other federal authorities, such as essential fish habitat under the Magnuson-Stevens Fishery Conservation and Management Act, which may advance recovery of the species. Another commenter felt that NMFS should prioritize actions that provide benefits not only to particular species, but also to other areas such as property protection, human health, water supply, and economic opportunity.

Response: We agree that recovery plans, where appropriate, may identify species' goals beyond delisting. We have done this for salmon recovery plans. For example, the Snake River Spring-

Summer Chinook and Steelhead recovery plan identifies actions to delist the species, but then outlines efforts beyond the minimum steps necessary to delist the species to provide for other legislative mandates or social, economic, and ecological values (NMFS 2017). This is why we have categorized and highlighted these types of actions in the priority guidelines. However, we assigned these actions a numerical value of 0 and identified them as ''other actions'' to separate them from those actions that are necessary to delist the species. In addition, section 4(f) of the ESA makes clear that the purpose of recovery plans is to provide for the conservation (and survival) of listed species. Recovery actions are the actions necessary to achieve the plan's goal for the conservation and survival of the species. Conservation is defined in the ESA as the use of all methods and procedures which are necessary to bring any endangered or threatened species to the point at which the measures provided by the ESA are no longer necessary (*i.e.,* delisting). Section 4(h) of the ESA requires the establishment of a priority system for developing and implementing recovery plans under section 4(f). Thus, we have appropriately focused the guidelines on prioritizing recovery actions based on delisting the species.

Comment (33): One commenter disagreed with the addition of Priority Action numbers 4 and 0, because such actions are not directly related to downlisting or delisting and are not needed for ESA recovery.

Response: Recovery plans can provide an opportunity to outline other goals beyond their primary purpose to delist species (see our response to comment 32). Priority Action number 0 (other actions) is identified in the guidelines because actions that achieve broader goals beyond delisting can be important to individuals who value and enjoy the substantial cultural, social, and economic benefits that are derived from having healthy and diverse ecosystems. NMFS often works closely with local planning groups, particularly for recovery of Pacific salmonids. Generally, these local recovery planning groups want to participate in broad-sense conservation goals. NMFS believes that while the recovery plan's primary goal is to ensure the survival of and delist the species, it is important to achieve ESA recovery in a manner that is consistent with other federal legal obligations, mitigation goals, and other broad-sense goals that provide social, cultural, or economic values. Priority Action number 4 is included because ESA section 4(g) requires NMFS to work with affected states to monitor species for no less than 5 years post delisting. Actions related to post-delisting monitoring required under ESA section 4(g) are considered a component of sustaining a delisted status.

Comment (34): One commenter felt the guidelines should prioritize actions that address multiple listed species. Prioritizing recovery actions that benefit multiple species and populations can help direct limited funds toward actions that will meet recovery goals more efficiently.

Response: We disagree that addressing multiple listed species should be a criterion in assigning a recovery action priority number, because these assignments are based on the extent to which an action is necessary to delist a species, not multiple species. However, we agree that where a recovery action would benefit multiple species, it should be given a higher priority within a category as a sub-prioritization process. We added text to the guidelines' discussion on sub-prioritization of recovery actions within a category to consider whether there may be benefits to more than one species.

Comment (35): One commenter recommended prioritization of recovery actions that yield faster results and are sustainable and substantial relative to other actions.

Response: We agree that within a recovery plan and recovery action priorities, recovery actions that yield faster results and are sustainable and substantial should be given priority over other actions. We added text to the guidelines' discussion on sub-prioritization of recovery actions within a category to clarify this point.

Comment (36): One commenter suggested that NMFS not strictly adhere to recovery action implementation based on priority number. The commenter stated that, in some cases, implementation of the highest priority actions might be necessary to prevent extinction and, in other cases, there may be lower priority actions that would achieve the recovery and delisting of species. These actions should not be de-emphasized simply because the species is threatened or has a lower demographic risk. The commenter felt that NMFS should encourage the implementation of recovery actions that will achieve recovery goals irrespective of species status or action priority.

Response: We agree that the goal is to implement all recovery actions as necessary. However, ESA section 4(h) requires the establishment of a priority system for developing and implementing recovery plans. Any priority system must identify criteria upon which to prioritize one action/approach over another. The objective of the revised priority guidelines is to implement a policy to prioritize limited agency resources to advance the recovery of threatened and endangered species (*i.e.,* delist). We concluded that to best achieve recovery goals, efforts should go first to those species that are more immediately in danger of extinction, where the information regarding major threats is well-understood, and where management and protective actions can be implemented successfully. This prioritization approach does not relieve NMFS of undertaking management and protective actions to delist the species, but rather helps identify which species and actions to focus on first. The recovery action priority ranking, together with the species recovery priority number, will be used to set priorities for funding and implementation of individual recovery actions while recognizing the goal to recover all listed species.

Definitions

Comment (37): One commenter felt the terms ''endangered species,'' ''foreseeable future,'' and ''threatened species,'' which were included in the proposed guidelines, have broader ESA application and are either defined or referenced in the ESA. The commenter stated it was inappropriate for NMFS to modify these long-standing ESA definitions through the proposed guidelines. The commenter felt that NMFS should engage with the U.S. Fish and Wildlife Service to propose the changes with an appropriate explanation in a separate notice and comment rulemaking to amend the joint regulations on listing at 50 CFR 424.02. Finally, the commenter recommended if the definition for foreseeable future is retained it should be modified to extend only as far as NMFS can make ''reliable predictions'' about the future.

Response: The definitions for threatened species and endangered species are nearly identical to the definitions presented in section 3 of the ESA. The additional text to clarify the distinction between threatened and endangered species is taken directly from NMFS guidance (NMFS, May 26, 2016). This clarifying text states that the Services interpret an endangered species to be one that is presently at risk of extinction and a threatened species to be one that is not presently at risk of extinction, but is likely to become so in the foreseeable future. The key statutory difference between a threatened and endangered species is the timing of

when a species is or is likely to become in danger of extinction, either presently (endangered) or in the foreseeable future (threatened). However, we agree with the commenter that definitions for threatened species, endangered species, and foreseeable future are not necessary for the purposes of the priority guidelines. Thus, in response to this comment, we have omitted them from the final recovery priority guidelines.

Comment (38): One commenter recommended that NMFS define ''key population'' or explain how it differs from the population as a whole.

Response: We disagree that ''key population'' needs to be defined when considering mixed population trends. However, we added clarifying language regarding how to apply the condition of a mixed population trend to determine the demographic risk category.

Comment (39): Several commenters recommended that the term ''depensation'' be further defined. One commenter recommended: ''Depensation—a factor associated with demographic risks—is the decline in productivity in a population (*e.g.,* smolts per spawner) as the abundance declines and can result from the uncertainty of finding a mate in a sparse population and/or increased predation rates at low abundance.''

Response: We changed the definition for depensation to: ''A decline in productivity in a population as the abundance declines that can result in increased extinction risk due to factors such as the uncertainty that mates will be able to find one another, randomly skewed sex ratios, changes to predator behavior due to shifting prey abundance, or scaling effects of random variation among individuals.''

Comment (40): One commenter requested clarification regarding the meaning of the demographic risk category of ''diversity.'' Specifically, is it meant to refer only to genetic diversity or is it intended to encompass other types of diversity, such as sex and age diversity or behavioral diversity within the population?

Response: As specified in the proposed priority guidelines, the risk condition of concern for diversity is ''low genetic and phenotypic diversity severely limiting adaptive potential.'' Thus, it encompasses genetic diversity and the expression of those genes as influenced by the environment, which could include sex or age structure or behavioral diversity where it is linked to the underlying genetic makeup.

Comment (41): One commenter requested additional clarification on the distinction between ''major'' and ''non-major'' threats and how major threats will be identified and considered during the recovery planning process.

Response: Major threats may be identified through the extinction risk analysis for a listing determination or through the threats assessment in the recovery planning process. In making a listing determination, we are required to rely on the best available scientific and commercial data. The available data may not allow us to distinguish which particular threat or threats pose the greatest risk to the species, nor are we required to do so in order to make a listing determination. However, depending on the available data, we may qualitatively compare threats relative to their contribution to the species' extinction risk (NMFS 2017 Guidance on Responding to Petitions and Conducting Status Reviews under the Endangered Species Act). For prioritizing recovery plan development and implementation, we can generally rely on the listing assessment to identify the major threats to the particular species. Where the listing determination has not identified the major threats, we rely on an assessment of threats during the recovery planning process. The definition of ''major threat'' reflects factors we consider in determining major threats.

Comment (42): One commenter recommended that the guidelines define ''productivity'' since it is a key factor in assessing a species' demographic risk.

Response: We added the definition of productivity from the NMFS 2017 Guidance on Responding to Petitions and Conducting Status Reviews under the Endangered Species Act as follows: ''Productivity is the population growth rate, over the entire life cycle, and factors that affect population growth rate provide information on how well a population is 'performing.' These parameters, and related trends in abundance, reflect conditions that drive a population's dynamics and thus determine its abundance. Changes in environmental conditions, including ecological interactions, can influence a population's intrinsic productivity, the environment's capacity to support a population, or both. Such changes may result from random environmental variation over a wide range of temporal scales (environmental stochasticity). A population growth rate that is unstable or declining over a long period of time indicates poor resiliency to future environmental change.''

Listing and Recovery Priority Guidelines

Part A: Listing, Reclassification, and Delisting Priorities

1. Listing and Reclassification from Threatened to Endangered

In considering species to be listed or reclassified from threatened to endangered, two criteria will be evaluated to establish four priority categories as shown in Table 1.

TABLE 1—PRIORITIES FOR LISTING OR RECLASSIFICATION FROM THREATENED TO ENDANGERED

Magnitude of threat	Immediacy of threat	Priority
High	Imminent	1
	Non-imminent	2
Low to Moderate	Imminent	3
	Non-imminent	4

The first criterion, magnitude of threat, gives a higher listing priority to species facing the greatest threats to their continued existence. Species facing threats of low to moderate magnitude will be given a lower priority. The second criterion, immediacy of threat, gives a higher listing priority to species facing actual threats than to those species facing threats to which they are intrinsically vulnerable, but which are not currently active.

2. Delisting and Reclassification from Endangered to Threatened

NMFS currently reviews listed species at least every 5 years in accordance with ESA section 4(c)(2) to determine whether any listed species qualify for reclassification or removal from the list. When a species warrants reclassification or delisting, priority for developing regulations will be assigned according to the guidelines in Table 2. Two criteria will be evaluated to establish six priority categories.

TABLE 2—PRIORITIES FOR DELISTING AND RECLASSIFICATION FROM ENDANGERED TO THREATENED

Management impact	Petition status	Priority
High	Petitioned Action	1
	Unpetitioned Action	2
Moderate	Petitioned Action	3
	Unpetitioned Action	4
Low	Petitioned Action	5
	Unpetitioned Action	6

The priorities established in Table 2 are not intended to direct or mandate decisions regarding a species' reclassification or removal from the list. This priority system is intended only to set priorities for developing rules for species that no longer satisfy the listing criteria for their particular designation under the ESA. The decision regarding whether a species will be retained on the list, and in which category, will be based on the factors contained in ESA section 4(a)(1) and 50 CFR 424.11.

The first consideration of the system outlined in Table 2 accounts for the management impact of a species' inclusion on the list. Management impact is the extent of protective actions, including restrictions on human activities, which must be taken to protect and recover a listed species. If the current listing is no longer accurate, continuing protective management actions could divert resources from species more in need of conservation and recovery efforts, or impose an unnecessary restriction on the public. Because the ESA mandates timely response to petitions, the system also considers whether NMFS has been petitioned to remove a species from the list or to reclassify a species from endangered to threatened. Higher priority will be given to petitioned actions than to unpetitioned actions that are classified at the same level of management impact.

There is no direct relationship between the systems outlined in Tables 1 and 2. Although the same statutory criteria apply in making listing and delisting determinations, the considerations for setting listing and delisting priorities are quite different. Candidate species facing immediate critical threats will be given a higher priority for listing than species being considered for delisting. Likewise, a delisting proposal for a recovered species that would eliminate unwarranted utilization of limited resources may, in appropriate instances, take precedence over listing proposals for species not facing immediate, critical threats.

Part B: Recovery Plan Preparation and Implementation Priorities

The objective of Part B of these guidelines is to implement a policy to prioritize limited agency resources to advance the recovery of threatened and endangered species. The guidelines are based on the immediacy and severity of the species' extinction risk; extent of information available regarding major threats; degree to which the United States has jurisdiction, authority, or influence over major threats; and certainty that management or protective actions can be implemented successfully. To achieve this objective, we identified the following general principles for prioritizing recovery plan development and implementation:

- Endangered species are a higher priority than threatened species;
- Species with more severe demographic risks are a higher priority because they are at greater risk of extinction;
- Species for which major threats are well understood are a higher priority because in such cases effective recovery criteria and recovery actions are more likely to be identified for that species;
- Species for which major threats are primarily under U.S. authority, or the United States can influence the abatement of such threats through international mechanisms (*e.g.,* treaties, conventions, and agreements), are a higher priority because we have ability to address those threats; and
- Species for which there exist possible management or protective actions that are not novel or experimental, are technically feasible, and have been successful at removing, reducing, or mitigating effects of major threats are a higher priority, because these actions are more likely to be effective at advancing recovery.

The process to prioritize recovery planning and implementation consists of four steps:

1. Identify a demographic risk rank based on the listing status and species' condition in terms of its productivity, spatial distribution, diversity, abundance, and trends (Table 3);
2. Identify categories for three components of recovery potential;
3. Based on results of steps 1 and 2, assign a recovery priority for recovery plan development and implementation (Table 4); and
4. Assign priority rankings to actions within the recovery plan.

This prioritization process reflects a logical sequence for recovery plan development and implementation for a species: First, identify the species' risk; second, develop the recovery plan; and third, implement the recovery actions on a priority basis and monitor and evaluate progress. As new information is obtained through the monitoring and evaluation process, recovery plans will be updated or revised as needed.

Step 1. Identify a Demographic Risk Rank

As a first step, we categorize the severity of an ESA-listed species' extinction risk based on its status and on the productivity, spatial distribution, diversity, abundance, and, if needed, population trend of the species. We assess the species' demographic risk based on information on past threats that have contributed to the species' current status and the biological response of the species to present and future threats. The severity of a species' demographic risk, relative to all species under our jurisdiction, will help inform how we prioritize resources toward recovery plan development and implementation.

We first consider each of the first four indicators in the Demographic Risk Category—productivity, spatial distribution, diversity, and abundance (Table 3; column 1)—and the associated risk condition described in column 2 (Table 3) separately for endangered and threatened species. The risk condition is met when the listed entity (*i.e.,* species, subspecies, or Distinct Population Segment) is considered at risk for that category. For example, populations or subpopulations within a listed entity may vary in terms of their productivity. Some may be at or below depensation, while others are stable and healthy. In those cases, we consider which population(s) contribute most substantially to the overall viability of the listed entity. If certain populations

or subpopulations are at or below depensation and their loss would substantially increase the listed entity's extinction risk, then the risk condition applies.

If an endangered species meets *any* of the first four risk conditions in column 2 (Table 3), then the species is considered a HIGH demographic risk, regardless of its population trend. If an endangered species *does not meet any* of the first four risk conditions in column 2 (Table 3), then population trend information will be used to categorize the demographic risk—*e.g.,* HIGH if the population trend is declining or unknown, or uncertain but likely declining; MODERATE if the trend is stable, increasing, or uncertain but likely stable or increasing, or MODERATE or HIGH if the trend is mixed. For a mixed population trend, a HIGH rating should be assigned if key populations are declining such that their continued decline would contribute substantially to the listed entity being any one or more of the following: At or below depensation, limited or fragmented in spatial distribution, low in genetic and phenotypic diversity, or declining to only one, or a few, small population(s) or subpopulations (see Table 3 Risk Condition); otherwise a MODERATE rating should be assigned for mixed population trends.

If a threatened species meets *any* of the first four risk conditions in column 2 (Table 3), the species is assigned a MODERATE demographic risk, regardless of its population trend. If a threatened species *does not meet any* of the first four risk conditions in column 2 (Table 3), its population trend is used to assign the demographic risk—*e.g.,* MODERATE if the trend is declining or unknown, or uncertain but likely decreasing; LOW if the trend is stable, or increasing, or uncertain but likely stable or increasing, or, LOW or MODERATE if the trend is mixed. For a mixed population trend, a MODERATE rating should be assigned if key populations are declining such that their continued decline would contribute substantially to the listed entity being any one or more of the following: At or below depensation, limited or fragmented in spatial distribution, low in genetic and phenotypic diversity, or declining to only one, or a few, small population(s) or subpopulations (see Table 3 Risk Condition); otherwise a LOW rating should be assigned for mixed population trends.

NMFS reports ESA listed species population trends biennially to Congress pursuant to ESA section 4(f)(3). To ensure consistency between that report and setting priorities for recovery planning and implementation, we will apply the following general guidelines:

Use a minimum of three or more abundance estimates for key population(s) over a 10-year period or, depending on taxa, all available data years (≤ 3 data points) for trend estimation.

1. *Increasing:* The species (includes consideration of all population units that make up the species ''as-listed'') shows measurably higher numbers from assessment to assessment.

2. *Stable:* The species shows no measurable increase or decrease over the period of time between assessments.

3. *Decreasing:* The species shows measurably lower numbers from assessment to assessment.

4. *Mixed:* Mixed is a designation reserved for species with multiple populations or portions of the range that have markedly different population trends, and species are considered mixed if there are at least 3 data points and the criteria for increasing, decreasing, or stable are not met.

5. *Uncertain:* The species has 3 or more data points over a 10-year period or all available data years, but there is great uncertainty over data quality to estimate trends.

a. *Uncertain—likely stable or increasing:* Major threats generally have been abated and the abundance is sufficiently high that the first four risk conditions in column 2 (Table 3) have not been met and no new major threats have been identified since listing.

b. *Uncertain—likely decreasing:* Major threats remain or have been only partially abated or the abundance is sufficiently low that the first four risk conditions in column 2 (Table 3) cannot be ruled out.

6. *Unknown:* The species has fewer than 3 data points over a 10-year period or all available data years to estimate trends.

TABLE 3—SEVERITY OF SPECIES' DEMOGRAPHIC RISK

Demographic risk category	Risk condition	Demographic risk rank [1]	
		Endangered	Threatened
Productivity	At or below depensation	If any one of these risk conditions is met, the ranking is HIGH. If not, use the Trend information below to determine rank.	If any one of these risk conditions is met, the ranking is MODERATE. If not, use the Trend information below to determine rank.
Spatial distribution	Limited/fragmented spatial distribution; vulnerable to catastrophe.		
Diversity	Low genetic and phenotypic diversity severely limiting adaptive potential.		
Abundance	One, or a few, small population(s) or subpopulations.		
Trends	Decreasing trend	HIGH	MODERATE
	Unknown trend	HIGH	MODERATE
	Uncertain trend, likely decreasing	HIGH	MODERATE
	Uncertain trend, likely stable or increasing.	MODERATE	LOW
	Stable trend	MODERATE	LOW
	Increasing trend	MODERATE	LOW

TABLE 3—SEVERITY OF SPECIES' DEMOGRAPHIC RISK—Continued

	Mixed trend	HIGH	MODERATE	MODERATE	LOW

[1] For those species with recovery plans, the endangered or threatened category may be applied to a species currently not listed as such if NMFS has recommended a reclassification through a 5-year review or proposed rule.

Step 2. Identify Categories of Recovery Potential

In Step 2, we evaluate a species' recovery potential. We have defined recovery potential to include three components: (1) Whether the origin of major threats is known and the species' response to those major threats is well understood; (2) whether the United States has jurisdiction, authority, or influence to implement management or protective actions to address major threats; and (3) the certainty that management or protective actions will be effective. Each of the three components is considered to be HIGH or LOW TO MODERATE based on the following descriptions:

Recovery Potential Component 1: Major Threats Well Understood

- *HIGH:* Natural and man-made threats that have a major impact on the species' ability to persist have been identified, and the species' responses to those threats are well understood. This also applies to transnational species that spend only a portion of their life cycle in U.S. waters, but major threats have been identified and the species' responses to those threats are well understood. This can apply also to transnational or foreign species where major threats occur beyond U.S. waters or the high seas, but U.S. markets that contribute substantially to those major threats have been identified and the species' responses to those threats are well understood. Data needs to fill knowledge gaps on threats that have an impact on the species' ability to persist are minimal. Identification and knowledge of a species' response to any *one* major threat would fit the species into this category.
- *LOW TO MODERATE:* Natural and man-made threats that have or are believed to have a major impact on the species' ability to persist may not have been identified and/or the species' responses to those major threats are not well understood. Data needs to fill knowledge gaps on major threats that have or are believed to have an impact on the species' ability to persist are substantial. If no major impacts exist, natural and man-made threats that have or are believed to have less than a major impact on the species' ability to persist also belong to this category.

Recovery Potential Component 2: U.S. Jurisdiction, Authority, or Influence Exists for Management or Protective Actions To Address Major Threats

- *HIGH:* Management or protective actions to address major threats are primarily under U.S. jurisdiction or authority, or the United States can influence the abatement of major threats through existing international mechanisms (*e.g.,* treaties, conventions, and agreements). This also applies to transnational species that spend only a portion of their life cycle in U.S. waters, but major threats can be addressed by U.S. actions. This may also apply to transnational or foreign species whose major threats include U.S. markets that represent a substantial source of demand for the species, and the United States may be able to influence the abatement of such demand. Where climate change impacts are a major threat and necessary actions to abate the threat are global in nature, management or protective actions under U.S. authority to address a threat that would help offset the impacts of climate change would fall into this category.
- *LOW TO MODERATE:* Management or protective actions to address major threats are mainly beyond U.S. jurisdiction, authority, or ability to influence those major threats. If no major impacts exist, natural and man-made threats that have or are believed to have less than a major impact on the species' ability to persist also belong to this category.

Recovery Potential Component 3: Certainty That Management or Protective Actions Will Be Effective

- *HIGH:* Management or protective actions are technically feasible; have been successful at removing, reducing, or mitigating effects of major threats; and do not use novel or experimental techniques. These actions can include categories of actions that have proven effective for other species, but that may require further testing for the targeted species (*e.g.,* fishing gear modifications, methods to overcome or modify barriers to fish passage). Where climate change impacts are a major threat and actions to abate the threat are global and are not under U.S. jurisdiction, authority, or influence through existing international mechanisms (*e.g.,* treaties, conventions, and agreements), management or protective actions under U.S. authority that effectively address a threat to help offset the impacts of climate change would fall into this category. Demonstrated success may be incremental on a small scale or with a few individuals. For species with current recovery plans, high certainty of effectiveness may be determined on the basis of individual recovery actions. If multiple recovery actions are needed to address a major threat that impedes recovery, not all need to fit the criterion of high certainty of effectiveness. If there are multiple major threats, only one major threat needs to meet the high level of certainty for the species to be assigned this category.
- *LOW TO MODERATE:* Management or protective actions, if known, may be novel or experimental, may not be technically feasible, and have less certainty of removing, reducing, or mitigating effects of major threats. If no major impacts exist, natural and man-made threats that have or are believed to have less than a major impact on the species' ability to persist also belong to this category.

Step 3. Assign Recovery Priority Number for Recovery Plan Preparation and Implementation

In Step 3, we combine the results of the Demographic Risk Rank (Step 1) and Recovery Potential (Step 2) to assign Recovery Priority numbers, which will be used to prioritize resources for recovery plan development and implementation. We assign the greatest weight to demographic risk (Table 4; column 1), because species with more severe demographic risks are at greater risk of extinction. Although demographic risk is the most important factor to consider in assigning a Recovery Priority number, the species' recovery potential is also an important factor. For example, a species with a HIGH demographic risk and a LOW TO MODERATE recovery potential for all three components (major threats understood, management actions exist under U.S. authority or influence to abate major threats, and certainty that actions will be effective) will be a lower priority than a species with a MODERATE or LOW demographic risk and a HIGH recovery potential.

For Recovery Potential (Table 4; Columns 2, 3, and 4), we assign the weights as follows:

1. The greatest weight is given to when major threats are well understood. In order to identify effective management or protective actions, we need to understand the threats that impact the species' ability to persist;

2. The second greatest weight is given to management or protective actions under U.S. jurisdiction, authority, or ability to influence the abatement of major threats. We acknowledge that management or protective actions beyond U.S. jurisdiction, authority, or influence exist and may greatly affect recovery progress for transnational species that spend a portion of their life history within U.S. waters. However, for the purposes of prioritizing, we assign a greater weight to those species and recovery plans for which recovery actions are or are expected to be mainly under U.S. jurisdiction, authority, or influence, because this is where we have the greatest opportunity to implement recovery actions; and

3. The lowest weight is given to the certainty that management or protective actions will be effective, because the likelihood of effectiveness depends, in part, on whether sufficient knowledge of threats to develop actions exists, and the United States has the jurisdiction, authority, or ability to influence implementation of such actions

Once a recovery priority number is identified, species that are, or may be, in conflict with construction or other development projects or other forms of economic activity are assigned a 'C' (Table 4; column 5) and are given a higher priority over those species that are not in conflict (Table 4; column 6).

TABLE 4—RECOVERY PRIORITY FOR RECOVERY PLAN PREPARATION AND IMPLEMENTATION

Demographic risk [a]	Recovery potential			Recovery priority	
	Major threats are well understood	U.S. jurisdiction, authority, or influence exists for management or protective actions to address major threats	Certainty that management or protective actions will be effective	Conflict	No conflict
HIGH	High	High	High	1C	1
HIGH	High	High	Low to Moderate	2C	2
HIGH	High	Low to Moderate	High	3C	3
MODERATE	High	High	High	3C	3
HIGH	Low to Moderate	High	High	4C	4
HIGH	High	Low to Moderate	Low to Moderate	4C	4
MODERATE	High	High	Low to Moderate	4C	4
LOW	High	High	High	5C	5
HIGH	Low to Moderate	High	Low to Moderate	5C	5
MODERATE	High	Low to Moderate	High	5C	5
LOW	High	High	Low to Moderate	6C	6
HIGH	Low to Moderate	Low to Moderate	High	6C	6
MODERATE	Low to Moderate	High	High	6C	6
MODERATE	High	Low to Moderate	Low to Moderate	6C	6
LOW	High	Low to Moderate	High	7C	7
HIGH	Low to Moderate	Low to Moderate	Low to Moderate	7C	7
MODERATE	Low to Moderate	High	Low to Moderate	7C	7
LOW	Low to Moderate	High	High	8C	8
LOW	High	Low to Moderate	Low to Moderate	8C	8
MODERATE	Low to Moderate	Low to Moderate	High	8C	8
LOW	Low to Moderate	High	Low to Moderate	9C	9
MODERATE	Low to Moderate	Low to Moderate	Low to Moderate	9C	9
LOW	Low to Moderate	Low to Moderate	High	10C	10
LOW	Low to Moderate	Low to Moderate	Low to Moderate	11C	11

[a] Demographic Risk Rank was determined in Table 3. HIGH or MODERATE may be an endangered species and MODERATE or LOW may be a threatened species (see Table 3).

Step 4. Assign Recovery Plan Action Priority

In Step 4, we prioritize actions contained in a recovery plan. NMFS will assign action priorities from 0 to 4 based on the criteria described below. Assigning priorities does not imply that some recovery actions are not important; rather it simply means that they may be deferred while higher priority recovery actions are being implemented. All actions will be assigned priorities based on the following:

Priority 1 Recovery Actions: These are the recovery actions that must be taken to remove, reduce, or mitigate major threats and *prevent extinction* and often require urgent implementation. Because threatened species by definition are likely *to become* an endangered species within the foreseeable future and are *presently not* in danger of extinction, Priority 1 should be given primarily to recovery actions for species ranked as HIGH demographic risk in Table 3. The use of Priority 1 recovery actions in a recovery plan for a species with MODERATE demographic risk should be done judiciously and thoughtfully. Even the highest priority actions within a particular plan will not be assigned a Priority 1 ranking unless they are actions necessary to prevent a species from becoming extinct or are research actions needed to fill knowledge gaps and identify management actions necessary to prevent extinction. Therefore, some plans will not have any Priority 1 actions. At the same time, we also need to be careful not to assign a lower priority than is warranted, simply because an action is but one component of a larger effort that must be undertaken. For instance, there is often confusion as to whether a research action can be assigned a Priority of 1 since it, in and of itself, will not prevent extinction. However, the outcome of a research project may provide critical information necessary to initiate a protective action to prevent extinction (*e.g.,* applying the results of a genetics study to a captive propagation program for a seriously declining species) and would warrant Priority 1 status.

Priority 2 Recovery Actions: These are recovery actions to remove, reduce, or mitigate major threats and prevent continued population decline or research needed to fill knowledge gaps, but their implementation is less urgent than Priority 1 actions.

Priority 3 Recovery Actions: These are all recovery actions that should be taken to remove, reduce, or mitigate any remaining, non-major threats and ensure the species can maintain an increasing or stable population to achieve delisting criteria, including research needed to fill knowledge gaps and monitoring to demonstrate achievement of demographic criteria.

Priority 4 Post-Delisting Actions: These are actions that are not linked to downlisting or delisting criteria and are not needed for ESA recovery, but are needed to facilitate post-delisting monitoring under ESA section 4(g), such as the development of a post-delisting monitoring plan that provides monitoring design (*e.g.,* sampling error estimates). Some of these actions may carry out post-delisting monitoring.

Priority 0 Other Actions: These are actions that are not needed for ESA recovery or post-delisting monitoring but that would advance broader goals beyond delisting. Other actions include, for example, other legislative mandates or social, economic, and ecological values. These actions are given a zero priority number because they do not fall within the priorities for delisting the species, yet the numeric value allows tracking these types of actions in the NMFS Recovery Action Mapping Tool Database [*http://www.westcoast.fisheries.noaa.gov/protected_species/salmon_steelhead/recovery_planning_and_implementation/recovery_action_mapping_tool.html*].

Most actions will likely be Priority 2 or 3, because the majority of actions will likely contribute to preventing further declines of the species, but may not prevent extinction.

This system recognizes the need to work toward the recovery of all listed species, not simply those facing the highest magnitude of threat. In general, NMFS intends that Priority 1 actions will be addressed before Priority 2 actions and Priority 2 actions before Priority 3 actions, etc. We also recognize, however, that some lower priority actions may be implemented before Priority 1 actions because, for example, a partner is interested in implementing a lower priority action, or a Priority 1 action is not currently possible (*e.g.,* there is lack of political support for the action), or implementation of the Priority 1 action may take many years.

For some species, such as those with complicated recovery programs involving multiple listed species and many actions, it may be useful to assign sub-priorities within these categories (*e.g.,* Priority 2a, Priority 2b, Priority 2c). In assigning sub-priorities within a category, recovery actions that benefit multiple species and/or are likely to yield faster results that are sustainable should be given the highest priority, *e.g.,* Priority 1a versus Priority 1c. If sub-priorities are assigned, a description of and criteria for each sub-priority should be provided in the recovery plan.

Process for Applying Part B: Recovery Plan Preparation and Implementation Priorities

The lead NMFS Region or Headquarters will identify a species' Recovery Priority number (Table 4) by assessing the species' Demographic Risk Rank (Step 1; Table 3) and Recovery Potential (Step 2) and apply it to the Recovery Priority (Step 3; Table 4). Where multiple NMFS Regions are involved, the lead Region or Headquarters office will coordinate with all NMFS regions involved to reach consensus on the Demographic Risk Rank, Recovery Potential, and Recovery Priority. Application of these guidelines to assess recovery priority relative to all species within our jurisdiction will be done on a biennial basis as part of the report to Congress (ESA section 4(f)(3)) and through the 5-year review process (ESA section 4(c)(2)).

In applying Part B: Recovery Plan Preparation and Implementation Priorities, the lead NMFS Region or Headquarters will prioritize species within their jurisdiction. Where a recovery plan covers multiple species, the highest ranked species should dictate the priority for recovery plan preparation and implementation. For example, if a recovery plan covers species A (assigned a recovery priority number 1) and species B (assigned a recovery priority number 8), species A would dictate the recovery plan preparation priority. Implementation of recovery actions within the plan would also be prioritized for species A where recovery actions are assigned the same priority numbers (*e.g.,* recovery actions assigned priority number 1 for species A would be given a priority over recovery actions assigned priority number 1 for species B).

We anticipate the recovery prioritization to be a dynamic process—as more information is made available through research and monitoring about demographic risk, limiting factors, and threats, the species could move up or down the priority scale depending on whether the new information reveals there are management or protective actions that can be implemented and be effective at recovering the species.

Recovery Action Priority Numbers will be assigned to each recovery action when the recovery plan is developed, revised, or updated. These revised guidelines will apply only to plans that are developed, revised, or updated after the finalization of these guidelines. As the results of research or monitoring of recovery implementation become available, the Recovery Action Priority Numbers can be modified through plan updates or revisions to address changing priorities based on this new information.

Part C: Recovery Plans

NMFS believes that periodic review of and updates to recovery plans and tracking recovery efforts are important elements of a successful recovery program. As we develop recovery plans for each species, specific recovery actions are identified and prioritized according to the criteria discussed above. This prioritization process recognizes that recovery plans should be viewed as living documents, and that research and monitoring, planning, and implementation describe a cycle of adaptive implementation of recovery actions for ESA-listed species. Even after recovery planning is complete and the plan is being implemented, key information gaps and uncertainties should constantly be evaluated. Research and monitoring results should inform recovery plan changes and refine strategies to implement recovery actions. The recovery action priority ranking, together with the species recovery priority, will be used to set priorities for funding and implementation of individual recovery actions. Although the guidelines provide a framework for prioritizing the timing of recovery plan development and implementation, NMFS will work closely with partners to develop recovery plans and implement recovery actions for all species, unless a recovery plan would not promote the conservation of the species.

Definitions

For purposes of this guidance only, the below terms have the following meanings:

Demographic Risk: Characteristics of a population (productivity, spatial distribution, diversity, abundance, and population trend) that are indicators of the species' ability to persist.

Depensation: A decline in productivity in a population as the abundance declines that can result in increased extinction risk due to factors such as the uncertainty that mates will be able to find one another, randomly skewed sex ratios, changes in predator behavior to shifting prey abundance, or scaling effects of random variation among individuals.

Major Threat: A threat whose scope, immediacy, and intensity results in a response by the species that prevents the improvement of its status to the point that such species may not be reclassified or delisted based on the factors set out in section 4(a)(1) of the ESA. Conversely, non-major threats are those threats whose scope, immediacy, and intensity results in a response by the species but singularly or cumulatively do not prevent the improvement of its status to the point that such species may be reclassified or delisted based on the factors set out in section 4(a)(1) of the ESA.

Productivity: The population growth rate, over the entire life cycle. Factors that affect population growth rate provide information on how well a population is ''performing.'' These parameters, and related trends in abundance, reflect conditions that drive a population's dynamics and thus determine its abundance. Changes in environmental conditions, including ecological interactions, can influence a population's intrinsic productivity, the environment's capacity to support a population, or both. Such changes may result from random environmental variation over a wide range of temporal scales (environmental stochasticity). A population growth rate that is unstable or declining over a long period of time indicates poor resiliency to future environmental change.

Technically Feasible: The scientific, engineering, and operational aspects of management or protective actions that are capable of being implemented.

References

A complete list of all references cited herein is available upon request (see **FOR FURTHER INFORMATION CONTACT**).

Withdrawal From the 1994 Interagency Cooperative Policy on Recovery Plan Participation and Implementation Under the Endangered Species Act

With this notice, we also are announcing NMFS' withdrawal from the 1994 Interagency Cooperative Policy on Recovery Plan Participation and Implementation Under the Endangered Species Act. On July 1, 1994, NMFS and the Fish and Wildlife Service (FWS) published notice of six joint policy statements on various issues involving implementation of the ESA (59 FR 34270). One of these, the Interagency Cooperative Policy on Recovery Plan Participation and Implementation Under the Endangered Species Act, established the policy that NMFS and FWS would develop recovery plans within 2½ years after final listing. That timeframe was expanded upon in NMFS' Interim Endangered and Threatened Species Recovery Planning Guidance (Interim Recovery Planning Guidance) (updated version 1.4, July 2018; available at: *https://www.fisheries.noaa.gov/national/endangered-species-conservation/endangered-species-act-guidance-policies-and-regulations*), which was adopted by FWS on August 26, 2010. The Interim Recovery Planning Guidance restated the 2½ year deadline to complete final recovery plans and added a deadline of 1½ years for completion of draft recovery plans.

As explained in the revised recovery priority guidelines announced in this notice, we must prioritize limited agency resources to advance the recovery of threatened and endangered species. These limited agency resources have meant that it is not always possible to complete recovery plans within 2½ years after final listing of the species as endangered or threatened. NMFS will complete recovery plans within a reasonable amount of time, but must do so on a priority basis within the limits of available resources, which may require more than 2½ years.

Therefore NMFS is withdrawing from the Interagency Cooperative Policy on Recovery Plan Participation and Implementation Under the Endangered Species Act. The remainder of that policy has been expanded and updated for the most part through the Interim Recovery Planning Guidance, and NMFS will continue to follow that guidance. However, where section 1.5.1 of the Interim Recovery Planning Guidance also contains deadlines for completing draft and final recovery plans, we will no longer follow that portion of the guidance. The remainder of the Interim Recovery Planning Guidance continues to be applicable to our recovery planning and implementation efforts.

Authority: 16 U.S.C. 1531 *et seq.*

Dated: April 24, 2019.

Samuel D. Rauch, III,

Deputy Assistant Administrator for Regulatory Programs, National Marine Fisheries Service.

[FR Doc. 2019–08656 Filed 4–29–19; 8:45 am]

BILLING CODE 3510–22–P

DEPARTMENT OF COMMERCE

National Oceanic and Atmospheric Administration

RIN 0648–XG949

Takes of Marine Mammals Incidental to Specified Activities; Taking Marine Mammals Incidental to National Wildlife Refuge Complex Research, Monitoring, and Maintenance Activities in Massachusetts

AGENCY: National Marine Fisheries Service (NMFS), National Oceanic and Atmospheric Administration (NOAA), Commerce.

ACTION: Notice; proposed issuance of an Incidental Harassment Authorization; request for comments.

SUMMARY: NMFS has received a request from the Eastern Massachusetts (MA) National Wildlife Refuge (NWR) Complex, U.S. Fish and Wildlife Service (USFWS), for authorization to take marine mammals incidental to conducting biological research, monitoring, and maintenance at the Eastern MA NWR Complex (Complex). The USFWS's activities are similar to activities previously analyzed and for which take was authorized by NMFS. Pursuant to the Marine Mammal Protection Act (MMPA), NMFS is requesting comments on its proposal to issue an incidental harassment authorization (IHA) to incidentally take marine mammals during the specified activities. NMFS is also requesting comments on a possible one-year renewal that could be issued under certain circumstances and if all requirements are met, as described in *Request for Public Comments* at the end of this notice. NMFS will consider public comments prior to making any final decision on the issuance of the requested MMPA authorizations and agency responses will be summarized in the final notice of our decision.

DATES: Comments and information must be received no later than May 30, 2019.

ADDRESSES: Comments should be addressed to Jolie Harrison, Chief, Permits and Conservation Division, Office of Protected Resources, National Marine Fisheries Service. Physical comments should be sent to 1315 East-West Highway, Silver Spring, MD 20910 and electronic comments should be sent to *ITP.Fowler@noaa.gov.*

Instructions: NMFS is not responsible for comments sent by any other method, to any other address or individual, or received after the end of the comment period. Comments received electronically, including all