General Format for Section 7 Biological Assessments

developed by NMFS Alaska Region, April 2009

DISCLAIMER

A biological assessment may be a document prepared for the sole purpose of interagency consultation, or it may be a document or documents prepared for other purposes (e.g., an environmental assessment or environmental impact statement) containing the information required to initiate consultation. The Federal agency is required to provide NMFS with a specific guide or statement as to the location of the relevant consultation information, as described in § 402.14, in any alternative document submitted in lieu of a biological assessment.

The following is a suggested format for biological assessments for ESA Section 7 consultations. The regulations pertaining to the contents of a biological assessment under Section 7 of the ESA are provided in 50 CFR §402.12(f). The regulations pertaining to Section 7 of the ESA (50 CFR §402) can be found on our website at http://AlaskaFisheries.noaa.gov/ProtectedResources/ESA.

Cover Page

Name of project, location (city, county, etc.) and date.

Table of Contents

All pages must be numbered.

I. Executive Summary

- 1. Provide a brief summary of the project (2 or 3 sentences).
- 2. In tabular format, identify the species, critical habitat, essential fish habitat, status, and effects determinations. If "no effect", include a brief paragraph for each species (these will not be addressed again). For example:

SPECIES/DPS	LISTING STATUS	DETERMINATION
Six-flippered dolphin	Endangered	Not likely to adversely affect
Six-flippered dolphin critical habitat	Designated	Not likely to adversely affect
Four-eyed polka dot seal	Threatened	Likely to adversely affect
Giant pygmy sea lion	Threatened	No effect

II. Project Description (be very detailed)

- 1. LOCATION: Describe construction boundary and define onshore and offshore areas (e.g. county; tidal/littoral zones; state or federal waters; nearshore/offshore areas; river mouths or deltas; distance from shore; fishery management plan boundaries, etc.). Include GPS coordinates if available. Include vicinity map and site photographs (all maps and photographs must be first generation copies, legible and at a scale to be meaningful to the description of the activity).
- 2. DEFINITION OF ACTION AREA: The "action area" includes all areas affected directly or indirectly by the Federal action and not merely the immediate area involved in the action. The action area is usually larger than the project footprint and extends out to a point where no measurable effects from the project occur. Identify the range of impacts such as physical habitat alterations, changes in water quality/quantity, reduced air quality, increased noise disturbance, etc. Include all off-site use areas (e.g., sources for fill materials, dredging dump sites, mitigation sites, stockpiling areas) and locations. A map is helpful, overlaying the all-inclusive action area with species and habitat occurrences.



3. PROPOSED ACTION:

- a. Describe the anticipated steps involved in the action in expected or logical order and include diagrams that are useful. The intent of the proposed action section is to describe both what will be built and how it will be constructed, operated and maintained. For example: 1. Remove old bridge by...2. Construct new dock by...3. In-water equipment will be.... Include description of actions for the entire action area (including interrelated and interdependent actions, for example building a road to access a remote location where a dock will be built). Describe criteria for off-site use areas which minimize potential effects. If the contractor proposes an alternative construction method other than that described in the BA, concurrence from NMFS is required.
- b. Identify Best Management Practices, Fishery Management Plans, and other conservation measures (e.g., specific work windows; techniques to reduce marine noise; marine mammal avoidance practices) designed to minimize effects.
- c. If previously agreed upon project designs or limitations (a.k.a. sideboards) for programmatic consults are used for ancillary project components, either detail here or in an appendix.
- d. Describe mitigation that is reasonably certain to occur, and monitoring and reporting plans.

III. Description of the Species and their Habitats

Identify each species and each critical habitat separately. In the example above, there would be three species descriptions and one critical habitat description. Each description should contain the following information:

- 1. descriptions of the species and general habitat requirements this should be information relevant to the action (i.e., don't discuss eye color of the species unless the proposed action may affect their eye color)
- 2. on site survey results including survey protocols, when and where conducted, by whom, etc.
- 3. information obtained from consultations with species experts, as necessary, such as ADF&G
- 4. information obtained from literature reviews
- 5. relationship of habitat in the project area to local populations
- 6. map of the project area at an appropriate scale to show important biological features, such as habitat for sensitive species, wetlands, or unique assemblages
- 7. photographs keyed to locations labeled on the project map (#6 above)
- 8. address designated or proposed critical habitat as separate listed entities; list the primary constituent elements (PCE) identified by NMFS in determining critical habitat, and address the status of each PCE in the action area these can be introduced in table format and elaborated in subsequent text. For example:

Six-flippered dolphin PCEs	a) PCE is present and "healthy" in the action area	b) PCE is present but at risk within the action area	c) PCE requirement cannot be met in the action area
High water quality to support growth and development			high contaminant levels have been documented in
development 2. Passage conditions allow for migrations, resting, and foraging	several unobstructed pathways in and out of the action area exist		the water
Sufficient quantity of prey species needed for foraging success		abundance of identified prey has declined over past 5 years	

IV. Environmental Baseline

Describe the past and present impacts of all human actions (Federal, State, private, etc.) on the species or critical habitat in the action area (include a separate baseline for each species and critical habitat listed in Executive Summary). Describe existing habitat conditions and species trends in detail. The baseline takes into account the anticipated impacts of all proposed Federal projects in the action area that have already undergone formal or early section 7 consultation, and the impact of State or private actions which are contemporaneous with the consultation in process

V. Effect of the Action

This should be the bulk of BA and should reasonably support the effects determinations. Include a discussion of direct and indirect effects relative to all species/critical habitats listed above, together with the effects of other activities that are interrelated or interdependent with the action. Also include all measures reasonably certain to occur that will reduce these effects, and an explanation of how the measures will reduce the effects to the species/critical habitat. Be sure to examine all phases of the proposed activity (e.g., construction, operation, maintenance, dismantlement) and how the requirements for feeding, shelter and reproduction of the species/critical habitat may be affected by each particular phase of the action. A matrix is a useful method for outlining all actions, their possible effects, and their impacts on the species/critical habitat.

- 1. DIRECT EFFECTS Those immediate effects caused by the proposed action and occurring concurrently with the proposed action (e.g., loss of habitat for human use; increased noise during construction). Provide the rationale for each determination.
- 2. INDIRECT EFFECTS Those effects for which the proposed action is an essential cause and which will result from the proposed action *later in time*, but which are still reasonably certain to occur (e.g., increased vessel traffic due to a new dock; increased erosion leading to loss of habitat). If an effect will occur whether or not the action takes place, the action is not an essential cause of the indirect effect.
- 3. CUMULATIVE EFFECTS Those effects of future State, city/county, or private activities that are reasonably certain to occur within the action area. Cumulative effects do not include future Federal activities that are physically located within the action area of the particular Federal action under consultation.

VI. Determination of Effect

Include a clear statement of effect (no effect; not likely to adversely affect; likely to adversely affect) for each species. Example: "We conclude that the Smith Road Bridge Project may affect, but will not likely adversely affect the six-flippered dolphin because...." For complex projects, it may be beneficial to make a determination of effect for each major step of the project, as identified in Section II. 3. Proposed Action (e.g., 1. Removal of the old bridge [insert effect determination]; 2. Construction of new dock [insert effect determination]; etc.). Provide a summary clearly explaining the reasoning leading to the definitive statement of "may affect, but not likely to adversely affect" (or whatever your determination may be).

- Not Likely to Adversely Affect the proposed action may affect the listed species or critical habitat but the effects will be insignificant, discountable, or completely beneficial.
- **Likely to Adversely Affect** the proposed action may negatively and significantly affect the listed species or critical habitat; this includes "take" of an individual of the listed species.

VII. References and Personal Communications Cited

Example of citations used in text:

The passive transport of males has also been observed by Leslie Delphin (Anchorage Nature Center, Pers. Comm. ADFG 2008) near Kamikee, Alaska. Such a mating system would maintain genetic diversity in the population only as long as it remains connected (Smith 2001).

Example of Literature Cited:

Smith, B. S. 2001. Genetic subdivision and speciation in the six-flippered dolphin, *Fakeus dolphinus*. Marine Oddities Journal 4:29-35.

Example of Personal Communications (must be documented): Leslie Delphin, Research Biologist, Anchorage Nature Center 2468 Evenflippered Drive, Anchorage, AK 99500 October 25, 2008 - telephone communication (or email/site visit/etc.)

<u>Checklist for General Format for Section 7 Biological Assessments</u> for NMFS Alaska Region

Project:	Reviewer	Date
Cover Page: Name of proj	ect, project and key numbers, location (city, co	ounty)
Table of Contents (all page	es must be numbered)	
I. Executive Summary1. Brief summary of project2. Species Table with effect		
b. measures designed toc. previously agreed upor	•	
1. Descriptions of the species 2. On-site survey results 3. Information from consulta 4. Information obtained from 5. Relationship of habitat in 6. Map of the species habita 7. Photographs keyed to loc	n literature reviews the project area to local populations	
IV. Environmental BaselineDetailed descriptions		
V. Effects of the Action1. Direct Effects2. Indirect Effects3. Cumulative Effects		
VI. Determination of EffectA clear statement of effect f	for each species and critical habitat	
VII. References and personal o	communication cited	