KNOWLEDGE-BASED SURVEY FOR IDENTIFYING BEST PRACTICE PRINCIPLES FOR ENVIRONMENTAL ASSESSMENTS

FINAL REPORT

CEQ Pilot Study

Prepared by

National Association of Environmental Professionals

Steering Committee

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EXECUTIVE SUMMARY

This report summarizes the results of a Council on Environmental Quality (CEQ) Pilot Study. The Study was initiated in late fall, 2011, and completed in November, 2012. The focus was on the development of Best Practice Principles (BPPs) which could be utilized in the planning and preparation of Environmental Assessments (EAs). By a very large margin, EAs represent the most commonly used National Environmental Policy Act (NEPA) compliance document. The CEQ NEPA regulations, which went into effect on July 30, 1979, identified EAs as a compliance document; however, Environmental Impact Statements (EISs) and their preparation received primary attention. The absence of specific guidance for EAs has created controversy and promoted numerous court cases focused on plaintiff claims of inadequate EAs, and the needs for the preparation of EISs. While court decisions have supported the concept of EAs and the appropriate use of Findings of No Significant Impact (FONSIs), the need for more specific guidance on EAs has been widely recognized. Accordingly, the National Association of Environmental Professionals (NAEP) proposed that a knowledge-based survey of NEPA practitioners be conducted to identify BPPs for EAs. These results could be used by CEQ in the development of specific EA guidance.

This report includes six sections and seven appendices. A 23-question electronic survey was used to elicit EA knowledge based on actual professional experience with these NEPA compliance documents. Section 1 is the introduction and general background of the report. Section 2 describes the design and dissemination of the questionnaire. Section 3 provides a summary of the analyses, with Appendix E including complete information related to each question. Section 4 summarizes a systematic selection process for identifying BPP topics; the process was structured around the survey findings. As a result, 15 Priority 1 BPP topics and nine Priority 2 topics were identified. Priority 1 denotes of first importance and central to the improvement of EA practice. Priority 2 denotes relevant topics which already are addressed within the CEQ's NEPA regulations, with only minor adjustments being needed to make them applicable to EAs. Background information and a proposed BPP for each of the 15 Priority 1 topics is included in Section 5. The specific wording for the 15 BPPs is reflective of concepts and ideas which could be used. Finally, a brief strategy as to how to address the nine Priority 2 topics is also in Section 5. Section 6 discusses implementation of BPPs.

The 15 Priority 1 BPPs include three levels of EAs, description of purpose and need, description of proposed action and alternatives, description of study areas and resources, comparative impacts on resources, topical outlines, page limits, cumulative effects assessment and management, regulatory/coordination/consultation/compliance, significance determinations, mitigation measures and monitoring, climate change, adaptive management, scientific writing and communication, and public involvement and response to comments.

Key facts, findings, and observations from the survey are as follows:

- In order to conduct this Pilot Study, NAEP formed a steering committee comprised of six persons. The committee itself has over 125 person-years of experience. The membership is on the cover page of this Report.

- Questionnaires were sent to 1061 persons (811 NAEP members and 250 government NEPA practitioners). Responses to the survey were voluntary and not mandatory. A total of 318 persons (30.0%) participated in the survey. On a relative basis, this is a high response rate and reflects the high interest level and importance of this subject.

- The 318 participants were diverse in their professional areas of expertise, and they were associated with both consulting firms and federal agencies. The average length of professional experience was about 16 years, thus the respondees represented approximately 5,000 person-years of experience.

- The questionnaire includes a mixture of questions and associated requests for comments. A total of 1,555 comments were received; again, this is reflective of the importance of this Pilot Study.

- While there are thousands of EAs prepared annually across federal government agencies, they vary in length and content. Such variations are reflective of missions and actions of specific agencies.

- Questions 22 and 23 relate to implementing BPPs for EAs. This information could be used by CEQ and Federal agencies in adopting specific guidance for EAs.

- The questionnaire identified three levels of EAs, and the respondees generally supported this concept. However, opposition to the term “Super EA”, which was used in several questions, was noted. Accordingly, the term “Enhanced EA” is used herein as a substitute for “Super EA”. Further, Enhanced EAs should not be considered as EISs. Although lengthy, they are assumed to have sufficient mitigation measures to reduce impacts below the significance threshold.

- Section 5 gives primary attention to 15 Priority 1 BPPs. For each of the 15, background information from the questionnaire survey and other sources is summarized, and key features of the specific BPP are delineated. As would be anticipated, the attention to each of the 15 varies from about 2-3 pages up to 10-12 pages.

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SECTION 1
INTRODUCTION

This Council on Environmental Quality (CEQ) Pilot Project is focused on the delineation of Best Practice Principles (BPPs) which can be used in the preparation of environmental assessments (EAs). Across all Federal agencies, the number of EAs prepared annually (more than 50,000) far exceeds the number of annual environmental impact statements – EISs (about 500). Further, the most frequent NEPA-related plaintiff challenge is related to the need for preparing EISs rather than EAs for numerous actions. The CEQ's NEPA regulations did not include process-related information for preparing EAs; hence practitioners have never had adequate guidance relative to practical issues. For example, the 2003 NEPA Task Force recommended that new EA guidance should explain the appropriate analysis of alternatives, including the no action alternative; when mitigation measures must be considered; appropriate public involvement; and suitable use of an EA standardized analysis format. Unfortunately such guidance was never prepared. Accordingly, the hypothesis of this Pilot Project is that the assimilation of practitioner knowledge related to effective BPPs for EAs will provide the basis for improvements in EA compliance documents and reduce litigative risk. The anticipated BPPs would be potentially applicable across all Federal agencies that prepare EAs. This Pilot Project was proposed by the National Association of Environmental Professionals (NAEP), with the primary work being done by a six-person Steering Committee. This report addresses the findings of this Pilot Project.

GENERAL BACKGROUND

The CEQ's National Environmental Policy Act (NEPA) regulations with an effective date of July 30, 1979, were primarily focused on the preparation of Environmental Impact Statements (EISs). However, specific definitions were included for three newer terms – Environmental Assessments (EAs) – Sec. 1508.9, cumulative impacts (effects) – Sec. 1508.7 and program (or programmatic) impact statements – Sec. 1508.18. While the definitions were helpful, no process-related information for addressing these three topics was provided. Of specific relevance herein is the definition for an EA. Specifically, it is defined in Section 1508.9(a) as "a concise public document for which a Federal agency is responsible that serves to: (1) briefly provide sufficient evidence and analysis for determining whether to prepare an EIS or a finding of no significant impact (FONSI); (2) aid an agency's compliance with the Act when no EIS is necessary; and (3) facilitate preparation of a statement when one is necessary. Regarding the contents of an EA, Section 1508.9(b) indicates that a EA " …shall include brief discussions of the need for the proposal, of alternatives as required by section 102(2)(E) of the National Environmental Policy Act (NEPA), of the environmental impacts of the proposed action and alternatives, and a listing of agencies and persons consulted" (Council on Environmental Quality, 1986). As can be seen by this definition, no information is included on specific topics to be addressed nor scientific procedures or principles to be utilized.

A key definition related to EAs is the term significant impact. Section 1508.27 defines this term in relation to the context and intensity of anticipated impacts. Further, other laws and/or regulatory procedures may also address significance. Such definitions and requirements can be used to systematically address the subject of impact significance for proposed actions. If significance does not exist, then a FONSI can be prepared. Its definition is addressed in Section 1508.13 as follows … "FONSI means a document by a Federal agency briefly presenting the reasons why an action, not otherwise excluded (categorical exclusion as per Sec. 1508.4), will not have a significant effect on the human environment and for which an EIS therefore will not be prepared. It shall include the EA or a summary of it and shall note any other environmental documents related to it (Sec. 1501.7(a)(5)). If the assessment is included, the finding need not repeat any of the discussion in the assessment but may incorporate it by reference" (Council on Environmental Quality, 1986).

In the event that an EA indicates "impact significance" will occur from a project, then consideration could be given to developing effective mitigation measures or programs to reduce the impacts to non-significant levels. Depending on the location and types of impacts, the following five types of mitigation measures might be considered (Sec. 1508.20): "(1) avoiding the impact altogether by not taking a certain action or parts of an action; (2) minimizing impacts by limiting the degree or magnitude of the action and its implementation; (3) rectifying the impact by repairing, rehabilitating, or restoring the affected environment; (4) reducing or eliminating the impact over time by preservation and maintenance operations during the life of the action; and/or (5) compensating for the impact by replacing or providing substitute resources or environments" (Council on Environmental Quality, 1986).

AGENCY SURVEY FROM 1993

Based upon the issuance of the 1979 NEPA regulations by CEQ, numerous process-related and pragmatic questions arose relative to EAs as NEPA compliance documents over the period up to the early 1990s. To evaluate EA practices used by multiple agencies, in 1993 CEQ conducted a survey of such practices in 52 Federal agencies (Blaug, 1993). Numerous issues were explored and agency responses were tabulated, including information on preparers of EAs (agencies or contractors), the lengths of EAs, relationships to the need for preparing EISs, incorporation of public participation in the EA process, the addition of mitigation within project design, and suggestions for improving the EA process. Several observations related to the need for CEQ to issue both general and topically-specific guidance on the preparation of EAs. The following key conclusions resulted from this early-1990s survey (Blaug, 1993): (1) agencies rarely use an EA to determine whether an EIS is necessary; (2) agencies prepare EAs that are frequently quite lengthy and costly; and (3) agencies appear to rely heavily on mitigation measures to justify EAs and decisions on FONSIs. These three conclusions are still relevant within the practice of preparing EAs in the United States. Further, general and topically-specific guidance for EAs is still needed. One approach for generating such guidance is to identify and summarize the collective knowledge and experience of NEPA practitioners.

BACKGROUND ON DEVELOPMENT OF BPPs

Best Practice Principles (BPPs), which could also be designated as Good Practice Principles (GPPs), infer that practitioner knowledge and experience is utilized to delineate key principles related to the preparation of practical guidance for specific topics. From a broad perspective, BPPs could be delineated for the design, construction, operation, and maintenance of specific types of projects. Such BPPs could be focused on achieving underlying objectives related to economics; environmental protection, impacts mitigation and management, and sustainability of resources; and sensitivity to social impacts and concerns in study areas. Further, BPPs could also be applicable to larger-scale planning studies and comprehensive programs.

As referred to in this Pilot Study report, BPPs have been proposed for the preparation of EAs and related FONSIs; EAs and FONSIs are two types of NEPA compliance documents. The BPPs were developed via the use of a knowledge-based electronic survey involving 318 NEPA professionals. The participants were comprised of 240 members of the NAEP and 78 non-members. The non-members included NEPA professionals from multiple federal agencies.

The BPPs for EAs (and FONSIs) consist of concisely written, topically-focused principles related to how to address necessary topics in NEPA compliant EAs (and FONSIs). Examples of necessary topics addressed herein include description of purpose and need; alternatives; study area and resources, and comparative impacts on resources; regulatory compliance; significance determinations; mitigation measures and monitoring; cumulative effects; adaptive management, etc.

Initial planning for the Pilot Study consisted of reviewing CEQ regulations and related guidance, considering agency-specific EA information and guidance, review of select case law on specific topics, and examination of approaches used by the International Association for Impact Assessment (IAIA). Appendix A herein includes summaries of CEQ-based EA-related guidance from 1981 and 1986, 2003, 2011, and 2012. Several topics from these summaries were addressed in the electronic survey.

Additional sources of background information for EAs were found in agency-specific NEPA guidance, handbooks, and related topical reports. Examples of such agencies include the Department of Energy, Federal Highway Administration, National Marine Fisheries Service, Nuclear Regulatory Commission, Departments of the Army and Navy, and Bureau of Land Management. These documents typically include generic information on EAs and specific information on substantive topics within them. Finally, the continuing “lessons learned” generated by DOE also contribute to improvements in the preparation of their EAs; in addition, such lessons can be applied by many other agencies.

Systematic reviews of court decisions on specific topics can also provide a basis for delineating BPPs. For example, Atkinson, et al., (2006) examined 32 cases related to incomplete or unavailable information, Smith (2007) reviewed 37 cases related to

alternatives analysis, and Steinmann (2001) provided a review of practices related to alternatives and proposed recommendations for improving the practice. Another example relates to principles and guidelines developed for addressing social impact assessment (SIA) in NEPA compliance documents. In this case, a committee of academicians, consultants, and federal agency professionals participated in this effort, and their 2003 results are still applicable as BPPs for SIA (The Interorganizational Committee on Principles and Guidelines for Social Impact Assessment, 2003). Finally, the comprehensive case law review by Mandelker (2012) has detailed information on key litigation related to EAs.

The IAIA, a professional organization of about 2,000 members from almost 100 countries, has often developed topical BPPs which are being utilized on a worldwide basis. One reason for attention to BPPs is associated with supporting impact study needs in countries with limited legislation, regulations, and guidance, and institutional structures. Such sharing of cross-cutting practices in many countries can provide international benefits. Further, impact study practices in numerous countries have been formulated based upon NEPA and the CEQ regulations.

The “BPPs development model” used by IAIA has typically consisted of having one to several subject matter experts prepare a draft of topical BPPs. The draft is then reviewed by a small group of IAIA members with professional knowledge and practical experience in the topical area. The resultant proposed BPPs are then subjected to topically-specific Workshops at annual meetings and IAIA-wide review and confirmation at an annual meeting. Collectively, the initial subject matter experts have been from government agencies, professional associations, private industry, consulting firms, and academia.

In the period from 1999 to 2012, 10 sets of BPPs have been promulgated by IAIA. The topics addressed include BPPs related to environmental impact assessment (Senecal, et al., January, 1999), strategic environmental assessment (Verheem, et al., 2002), social impact assessment (Vanclay, March, 2003, and May, 2003), biodiversity (Biodiversity and Ecology Section, 2003), public participation (Andre, et al., 2006), health impact assessment (Quigley, et al, 2006), EIA follow-up (Morrison-Saunders, et al., 2007), publishing primary biodiversity data (Cadman, et al., 2011), climate change and impact assessment (Byer, et al., 2012), and respecting indigenous peoples and traditional knowledge (Croal, et al., 2012).

STRUCTURE OF REPORT

This Report contains six sections, a list of selected references, and seven related appendices. This initial section introduces the need for this pilot study and briefly describes its features. Appendix A summarizes EA-related information contained in four CEQ guidance documents or reports. They include frequently asked EA questions from 1981 and 1986 (Council on Environmental Quality, 1981 and 1986); Chapter 6 on EAs in the NEPA Task Force Report (Council on Environmental Quality, 2003); guidance on mitigation, monitoring and the use of mitigated FONSIs (Council on Environmental

Quality, January 14, 2011); and guidance on preparing efficient and timely environmental reviews under NEPA (Council on Environmental Quality, 2012). An overall observation regarding the Appendix A information is that CEQ has already addressed the preparation of EAs in several documents, thus providing useful foundations for the development of BPPs for EAs.

Section 2 describes the design of the survey instrument (questionnaire), its beta-testing, and its distribution to 1061 persons. The conceptual design included five questions related to respondees and their professional experience, one question focused on current inadequacies in EAs, one question on features of adequate EAs, 14 questions on specific substantive topics, and two final questions related to barriers or positive actions for implementing BPPs. The 14 substantive questions were based on several informational sources, including Appendix A herein and feedback from the NAEP advisory committee for the pilot study. Further, Appendix B, which contains a summary of key case law for EAs, was also reviewed for substantive topics to be probed within the questionnaire. Moreover, and in order to provide a context, Appendix C summarizes fundamental principles associated with other uses of environmental assessments. Finally, Appendix D includes a copy of the 23-question survey form. This questionnaire was distributed to 811 members of NAEP and 250 Federal employees from numerous agencies who are engaged in NEPA compliance work.

Section 3 contains a description and summary analysis of the survey results. Detailed information on categorical or quantitative responses to questions 1 through 6, and 8 through 21 is included, along with summaries of provided comments for questions 6 through 12, 14, 16, 18, and 20 through 23. Further, question-specific observations on the responses to all 23 questions, and “bottom-line” statements for the responses to all 23 questions is included in Appendix E.

Section 4 addresses the utilized process for selecting BPP topics to be addressed. The section begins with several assumptions and is then followed by a discussion of a systematic, step-wise process for selecting the BPP topics. The selection process yielded 15 Priority 1 (of first importance) proposed BPPs, and nine other Priority 2 (of second importance) potential BPPs which could be primarily supported by current information in the CEQ’s NEPA regulations. Specific questionnaire information for each of the 15 Priority 1 BPPs, along with possible wording for each BPP, is included in Section 5. Appendix F includes supplemental information on scientific writing, which is one of the 15 BPPs. Because of the extensive use of summary tables in this report, Table 1 includes a list of the titles of each table utilized in Sections 2 through 5. Supporting information related to whether any of the 15 BPPs are addressed in the existing NEPA regulations of six Federal agencies is included in Appendix G. The six agencies include the Departments of the Army, Agriculture (Forest Service), Energy, Transportation (Federal Highway Administration), Interior, and Bureau of Land Management within Interior.

Table 1: Summary Tables Utilized in This Report

Section 2: Questionnaire Design and Dissemination

- Table 2: Diversity of Question-Related Topics, Types of Questions, and Requested Comments

Section 3: Analysis of Survey Results

- Table 3: Summary of Questionnaire Topics, Respondees, and Comments
- Table 4: Categories and Numbers of Comments for Questions 6 and 7
- Table 5: Categories and Number of Comments for Topical Issues (Questions 8, 10-12, 14, and 20-21)
- Table 6: Categories and Number of Comments Related to Implementing BPPs (Questions 22-23)
- Table 7: Summary of Bottom-Line Conclusions for Substantive Questionnaire Topics

Section 4: Selection Process for BPPs

- Table 8: Delineating the Initial List of Potential Topics for BPPs
- Table 9: Potential BPP topics from Question 7, and Supporting Information from Question 6
- Table 10: Combined Potential BPP Topics from Questions 7 and 6, and from Questions 8-21
- Table 11: 15 Selected Topics for Priority 1 Attention as BPPs in EAs
- Table 12: Nine Selected Topics for Priority 2 Attention as BPPs in EAs

Section 5: Proposed Best Practice Principles

- Table 13: Decision Matrix for BPPs
- Table 14: Target Page Limits for Three Levels of EAs
- Table 15: Public Participation for Three Levels of EAs

Section 6 briefly highlights several positive actions which CEQ could consider within an implementation plan for the issuance of draft and final guidance on BPPs for EAs. This section is primarily based on comments received relative to Questions 22 (barriers to implementation) and 23 (positive actions for CEQ and agency consideration in implementing such BPPs).

Cited references for this overall report are in the Selected References section following Section 6.

SECTION 2
QUESTIONNAIRE DESIGN AND DISSEMINATION

This section describes the planning and general features of 23 questions included in the survey instrument for this Pilot Study. Further, beta-testing of the draft questionnaire is also addressed, and summary information is included on questionnaire distribution and the use of Survey Monkey to compile the results of the survey.

STEERING COMMITTEE FOR THE PILOT STUDY

A Steering Committee of NAEP members was utilized to provide guidance in the design process for the questionnaire, and in subsequent review of the assembled survey findings. The Steering Committee included:

- Larry Canter, Ph.D., Professor Emeritus, University of Oklahoma, and Principal, Canter Associates, Inc., Horseshoe Bay, TX.

- David Keys, MS in Environmental Policy, Regional NEPA Coordinator, National Marine Fisheries Service, St. Petersburg, FL.

- Robin Senner, Ph.D., Environmental Consultant, Seattle, WA.

- P.E. Hudson, J.D., Counsel and Environmental Planning Training Director, Office of Counsel, Naval Civil Engineer Corps Officers School, Port Heuneme, CA. Any views expressed are Ms. Hudson's personal views and not necessarily those of the Department of Defense, Navy, or Federal Government.

- Paul Looney, President, NAEP, Senior Project Manager, Volkert and Associates, Inc., Mobile, AL.

- Ron Deverman, Immediate Past President, NAEP, and Associate Vice President and Environmental Planning Manager, HNTB, Chicago, IL.

- Rita Holder, Attorney, Professional Law Corporation, Walnut Creek, CA. (note: served on Steering Committee from January, 2012, to March, 2012).

QUESTIONNAIRE DESIGN PROCESS

The design process was initiated by considering the use of 20 to 25 questions comprised of a variety of styles and requested inputs. More specifically, groups of questions related to respondee experience in NEPA compliance documentation, current inadequacies and adequacies in EAs, selected topical features for inclusion in EAs, and potential implementation of BPPs for EAs were considered. The NEPA-related professional experience of the Steering Committee members (about 150 person-years) aided these discussions. Further, information contained in Appendices A (CEQ Guidance on EAs) and B (Summary of Select Case Law Relevant to Environmental

Assessments) was utilized in the delineation of inadequacies and adequacies in EAs and the identification of topical features which should become the focus of delineated BPPs.

Several drafts of the survey questionnaire were developed and reviewed by Committee members. In addition, the final draft of the survey questionnaire was subjected to beta-testing. The testing group included five persons from the Steering Committee (Canter, Keys, Senner, Looney, and Deverman) and four other NAEP members who volunteered to be members of the test group. These four persons included:

- Theresa Fortner, Senior Environmental Planner, Logan Simpson Design, Inc., Tucson, Arizona.

- Walker Heap, III, Biologist, U.S. Army, Fort Drum, New York.

- Budd Titlow, Wetlands Scientist, Wildlife Biologist, Ecology and Environment, Inc., Tallahassee, Florida.

- Hibba Wahbeh, Biologist, Planning Division, U.S. Army Corps of Engineers, New York District, New York, New York.

Following the beta-testing, several minor editorial changes were made to the survey questionnaire.

FINAL SURVEY QUESTIONNAIRE

Appendix D herein includes the formatted final questionnaire containing 23 questions. The structure is as follows:

- Questions 1 through 5 are related to information on the professional experience of the respondees.

- Questions 6 and 7 are focused on the situational context for EAs; for example, Question 6 is related to known inadequacies of EAs, while Question 7 asks for respondee inputs on features of adequate EAs.

- Questions 8 through 21 (a total of 14 questions) highlight specific substantive topics which might need to be supported by BPPs.

- Questions 22 and 23 probe barriers to implementing BPPs (Question 22) and positive actions which could be used by CEQ and Federal agencies in implementing resultant BPPs (Question 23).

The survey questionnaire was also planned to include a variety of types of questions and routine requests for respondee comments related to the focus of specific

questions. Table 2 summarizes the diversity of question-related topics, types of questions, and requested comments. As can be seen, a total of 23 topics were addressed. Specific types of questions were used on 20 of the 23 topics. The questions include yes or no responses, agree or disagree responses, and various categories of answers. In addition, comments by respondees were requested for 14 questions (Questions 3 through 8, 10 through 12, 14, and 20 through 23). It was assumed and then verified that the variety within the questionnaire survey would be conducive to encouraging respondee participation.

DISSEMINATION OF SURVEY QUESTIONNAIRE

The Steering Committee identified two groups of selected recipients of the survey questionnaire. The first group included the professional membership of NAEP, and the second was a CEQ group comprised of agency NEPA liaisons and other NEPA collaborators and compliance professionals. The NAEP membership included 811 professionals and the CEQ group included 250 professionals. Accordingly, the survey questionnaire was sent to 1061 persons on February 28, 2012, and responses were received over a 22-day period ending on March 21, 2012. Both groups were provided with a preliminary notification of their receipt of the survey questionnaire.

Tim Bower, Managing Director of NAEP, disseminated the questionnaire. Further, via the use of Survey Monkey software, he provided summary results to the Steering Committee.

Table 2: Diversity of Question-Related Topics, Types of Questions, and Requested Comments

Question	Topic	Type of Question	Comments Requested
1	NAEP Membership	Yes or No	NA*
2	Years of Experience	Time Categories	NA
3	Primary EA Responsibility	Responsibility Categories	Yes
4	Professional Expertise	Professional Area of Expertise	Yes
5	Area of Employment	Area of Employment	Yes
6	Inadequacies in EAs	Inadequacy Categories	Yes
7	Features of Adequate EAs	NA	Yes
8	Three Levels of EAs	Yes or No	Yes
9	Alternatives for Three Levels of EAs	Number of Alternatives	NA
10	Pertinent Issues and Impacts	Yes or No	Yes
11	Topical Outlines for EAs	Agree or Disagree	Yes
12	Page Limits for Three Levels of EAs	Yes or No	Yes
13	Impact Significance Determinations	Low, Medium, or High Importance	NA
14	Composite Report of Laws and Criteria	Yes or No	NA
15	Incomplete and Unavailable Information for EAs	Yes or No	NA
16	Use of Section 1502.22	Yes or No	NA
17	Public and Agency Scoping for Three Levels of EAs	Yes or No	NA
18	Public Reviews of Three Levels of EAs	Yes or No	NA
19	CEAM for Three Levels of EAs	Agree or Disagree	NA
20	Climate Change and Three Levels of EAs	Yes or No	Yes
21	Supplemental EAs	Yes or No	Yes
22	Barriers to Implementation of BPPs	NA	Yes
23	Positive Actions for Implementing BPPs	NA	Yes

*NA = not applicable

SECTION 3
ANALYSIS OF SURVEY RESULTS

Section 3 provides overview comments related to the results of the survey questionnaire. Detailed information for each of the 23 questions is included in Appendix E. The first sub-section herein includes analytical information and observations on the 23 topical questions, number of respondees for each, and categories of comments and total comments. Subsequent sub-sections are related to the characteristics and professional experience of the respondees, inadequacies in EAs and features of adequate EAs, 14 topical issues for consideration in developing BPPs for EAs, and barriers to and positive actions for implementing BPPs.

OBSERVATIONS ON THE QUESTIONNAIRE TOPICS, RESPONDEES, AND COMMENTS

Table 3 lists the topics addressed in the questionnaire survey, the number of respondees to each topic (question), and the comments received. (Note that the two columns on the left are the same as in Table 2). Questions 1 through 5 relate to respondee experience with EAs, while Questions 6 and 7 address inadequacies and adequacies within EAs. The largest topical grouping encompasses the 14 topics in Questions 8 through 21. Finally, Questions 22 (barriers to implementation) and 23 (positive actions for implementing BPPs) contain information related to implementing BPPs for EAs.

A total of 318 persons participated in the survey (30.0% of the 1061 persons who received the survey). The third column in Table 3 indicates that the number of respondees for the four topical groupings declined across the groupings. For example, an average of 305 persons completed Questions 1 through 5 (305 persons denote 95.9% of the total respondees). Questions 6 and 7 were addressed by an average of 275 persons (86.5% of the total respondees). The 14 topical issues in Questions 8 through 21 had an average of 234 respondees (73.6% of the total respondees). Finally, the futuristic Questions 22 and 23 were answered by 148 persons (46.5% of the total respondees). The declining percentages across the questionnaire survey is typical for surveys with larger numbers of questions.

It is important to note that completion of this survey questionnaire was voluntary for persons in both the NAEP group and CEQ group of participants. Further, both groups had a participation rate of about 30.0% (the NAEP group – 240 of 811, or 29.6%; and the CEQ group – 76 of 250, or 30.4%).

Another interesting observation is that 1555 total comments were received on Questions 6 and 7 (593 comments), on the 14 topical issues in Questions 8, 10-12, 14, and 20-21 (565 comments), and the implementation issues in Questions 22 and 23 (397 comments). As shown in Table 3, numerous categories of comments were identified for each pertinent question; for example, the range was from 3 to 24 categories.

Table 3: Summary of Questionnaire Topics, Respondees, and Comments

Question	Topic	Number of Respondees	Categories of Comments	Total Comments
1	NAEP Membership	316	NA*	NA
2	Years of Experience	315	NA	NA
3	Primary EA Responsibility	290	2	34 (list)
4	Professional Expertise	300	1	45 (list)
5	Area of Employment	305	1	20 (list)
6	Inadequacies in EAs	281	8	34
7	Features of Adequate EAs	269	24	559
8	Three Levels of EAs	238	5	84
9	Alternatives for Three Levels of EAs	224	NA	NA
10	Pertinent Issues and Impacts	242	5	70
11	Topical Outlines for EAs	231	5	77
12	Page Limits for Three Levels of EAs	240	3	101
13	Impact Significance Determinations	235	NA	NA
14	Composite Report of Laws and Criteria	242	4	82
15	Incomplete and Unavailable Information for EAs	242	NA	NA
16	Use of Section 1502.22	205	NA	NA
17	Public and Agency Scoping for Three Levels of EAs	237	NA	NA
18	Public Reviews of Three Levels of EAs	239	NA	NA
19	CEAM for Three Levels of EAs	233	NA	NA
20	Climate Change and Three Levels of EAs	236	4	110
21	Supplemental EAs	236	3	41
22	Barriers to Implementation of BPPs	190	8	302
23	Positive Actions for Implementing BPPs	106	9	95

*NA = not applicable

Tables 4 through 6 list the categories and associated titles, and the number of comments in each category for Questions 6 and 7; 8, 10-12, 14, and 20-21; and 22-23, respectively. Each of the 1555 comments are listed in Appendix E, by category, for each of the above questions. As can be noted from the review of comments in Appendix E, multiple comments of the same type were often made within responses to specific questions. Each of these comments was reviewed during the selection process for topical BPPs; and the process itself is described in Section 4.

The general structure of Appendix E is based on the 23 questions and requested responses and comments associated therewith. For example, the general structure for information provided on each of the 23 questions included the following items, as appropriate:

- Statement of the question (or request for information)
- Summary of responses to the question
- Categorization of received comments into appropriate groupings, and inclusion of each comment in a bulleted listing by group
- Observations on responses (a brief summary of the provided information)
- A brief “bottom line” statement regarding the potential usefulness of the received information

CHARACTERISTICS AND PROFESSIONAL EXPERIENCE OF THE RESPONDEES

Since the knowledge-based questionnaire survey was designed to solicit EA-related information from experienced professionals, Questions 1 through 5 highlighted information on the participating respondees relative to NAEP membership (Question 1), years of professional experience (Question 2), primary EA responsibility (Question 3), professional expertise (Question 4), and area of employment (Question 5).

Regarding membership in NAEP, 240 of the 318 respondees (75.5%) indicated that they were members. A large majority of the 240 members were associated with consulting firms that provide EA or EIS preparation services. The bottom line was that the overall response rate of 30.0% (318 out of 1061) to Question 1 indicated a high interest by the respondees in the survey and their perceived need for producing EAs that are more systematically prepared and consistent in their topical contents.

Question 2 requested information on the years of experience in planning, preparing, and/or reviewing EAs. A total of 40% of the respondees had greater than 20

Table 4: Categories and Number of Comments for Questions 6 and 7

Question	Topic	Categories of Comments	Titles of Categories (No. of Comments)
6	Inadequacies in EAs	8	• Inadequate Explanation of Need for Action (2) • Inadequate Description of Proposed Action (4) • Inadequate Consideration of Alternatives (7) • Incomplete Impact Analysis (2) • Inadequate Cumulative Impact Analysis (4) • Incomplete Coordination with Other Agencies (5) • Minimal to No Scientific-Based Writing (2) • Other Inadequacy Concerns (7)
			Total Comments = 34
7	Features of Adequate EAs	24	• Leadership and Membership of EA Preparation Team (3) • Planning of EA (11) • Executive Summary (7) • Description of Purpose and Need (46) • Description of Proposed Action/Activity and Alternatives (60) • Scoping Process (14) • Description of Study Area and Resources (16) • Use of Traditional Knowledge (1) • Description of Impact Prediction Methodologies (2) • Comparative Impacts on Resources (107) • Cumulative Effects Assessment and Management (16) • Scientific Foundation for Study and Subject Matter Experts (17) • Regulatory/Coordination/Consultation/ Compliance (30) • Systematic Determinations of Significance of Impacts (28) • Identification of Mitigation Measures and Related Monitoring (35) • Preparation of FONSI (10)

			• Use of Adaptive Management (3) • Referencing of Source Materials (4) • Application of Principles of Scientific Writing and Communication (73) • Public Involvement (39) • Consistency with CEQ, Preparer Agency, and Other Regulations or Guidelines (10) • Response to Review Comments on Draft EAs (2) • Preparation of Administrative Record (1) • Examples of Inadequacies in EAs (24)
			Total Comments = 559

Table 5: Categories and Number of Comments for Topical Issues (Questions 8, 10-12, 14, and 20-21)

Question	Topic	Categories of Comments	Titles of Categories (No. of Comments)
8	Three Levels of EAs	5	• Support for 3 Levels of EAs (5) • Conditional Support for 3 Levels of EAs (16) • Concerns Regarding 3 Levels of EAs (9) • Concerns Regarding Super EAs (23) • Other Comments (31)
			Total Comments = 84
10	Pertinent Issues and Impacts	5	• Concur With Statements (15) • Qualified Support for Statements (31) • Concerns Related to Statements (5) • Other Comments (8) • Follow-on Comments to Question 9 (11)
			Total Comments = 70
11	Topical Outlines for EAs	5	• Support the Postulates (5) • Conditional Support of the Postulates (26) • Concerns Regarding the Postulates (7) • Other Comments (24) • Comments on Super EAs (15)
			Total Comments = 77
12	Page Limits for Three Levels of EAs	3	• Identified Ranges of Page Limits (40) • Concerns Regarding Ranges of Page Limits (28) • Other Related Comments (33)
			Total Comments = 101
14	Composite Report of Laws and Criteria	4	• Concur with Composite Report (12) • Qualified Support for Composite Report (34) • Concerns Related to Composite Report (10) • Other Comments (26)
			Total Comments = 82
20	Climate Change and Three levels of EAs	4	• Support for Climate Change Analysis in EAs (19) • Qualified Support for Climate Change Analysis in EAs (55) • Concerns Related to Climate Change Analysis in EAs (19)

			• Other Comments (17)
			Total Comments = 110
21	Supplemental EAs	3	• Favorable Comments Regarding Supplemental EAs (24) • Opposition Comments Regarding Supplemental EAs (4) • Other Related Questions and Observations (13)
			Total Comments = 41

Table 6: Categories and Number of Comments Related to Implementing BPPs (Questions 22-23)

Question	Topic	Categories of Comments	Titles of Categories (No. of Comments)
22	Barriers to Implementation of BPPs	8	• Institutional Barriers and Concerns (200) • Development and Agreements on BPPs (19) • Legal Ramifications and Lawsuits (13) • Political Influence and Concerns (14) • No Need for BPPs (1) • Comments on Super EAs (8) • Federal-State Relationships (2) • Other Comments (45)
			Total Comments = 302
23	Positive Actions for Implementing BPPs	9	• Suggestions on Above Bullets (4) • Suggestions on CEQ Activities (29) • Suggestions on Agency Activities (20) • Suggestions on Training (10) • Suggestions on Information Dissemination (5) • Suggestions Related to NEPA Attorneys (2) • Other Suggestions (18) • Comments on Super EAs (3) • Critiques of BPPs Study (4)
			Total Comments = 95

years experience, while the cumulative total of greater than 10 years' experience was 70.4%. Further, by considering the midpoint between the four experience ranges (1.5, 6.5, 15, and 25 years) and multiplying them by the response counts yielded approximately 5000 person-years of collective experience. Accordingly, the bottom line was that the responses to Question 2 demonstrate that the respondees were indeed experienced in the preparation, coordination, and review of EAs. As noted earlier, this survey was focused on eliciting professional knowledge and judgment from practitioners, and the responses reflect that experienced professionals were major participants in the survey.

Question 3 was focused on primary areas of responsibility regarding the use of EAs as NEPA compliance documents. The bottom line was that the answers to Question 3 demonstrate that the respondees have extensive experience in planning, preparing, and reviewing EAs generated by a diversity of agencies. Their experience will provide a foundation for the delineation of BPPs.

Topical areas of professional expertise were probed by Question 4. The six most frequently identified professional areas include environmental scientist (25.2%), planner (15.1%), biologist (13.3%), generalist (8.4%), and policy analyst and water resources specialist (7.8% each). Accordingly, the bottom line was that the respondees represented a diversity of professional backgrounds and experience. This diversity is supportive of the use of interdisciplinary approaches in preparing, coordinating, and reviewing EAs.

The area of employment was examined by Question 5. Out of 305 respondees, consulting firms were represented by 47.2% of the individuals (144 out of 305), while Federal agencies employed 39.3% (120 out of 305). Over 20 other areas were also identified. Accordingly, the bottom line was that the respondees represented a diversity of employers involved in NEPA compliance work encompassing EAs. This diversity supports the target audience which was sought; that is, utilize knowledge and experience of professionals from both government and the private sector.

INADEQUACIES IN EAs AND FEATURES OF ADEQUATE EAs

Question 6 was focused on prioritizing nine postulated inadequacies which need to be addressed in EAs. The resultant prioritization order was as follows:

- No clear delineation of impact significance (most important inadequacy)
- Absence of "hard look" regarding specific types of impacts
- Concerns regarding the implementation of impact mitigation measures
- Minimal information on the scientific basis for stated impacts
- Concerns regarding the effectiveness of impact mitigation measures

- Omission of or inadequate agency coordination related to the Endangered Species Act

- Inadequate coordination relative to cultural resources laws, e.g., National Historic Preservation Act

- Absence of public participation for large-scale EAs

- Poor writing and editing (least important inadequacy, but still needs attention)

Additional respondee comments identified several other inadequacies, including Explanation of Need for Action, Description of Proposed Action, Consideration of Alternatives, and Cumulative Impact Analysis. The bottom line of Question 6, which was focused on inadequacies in EAs, yielded results could be used to identify needs for BPPs.

Further, Question 7 asked the respondees for examples of features in adequate EAs. In composite, the 559 features listed in Question 7 encompass the above-listed inadequacies and could serve as topics to be considered for BPPs. The 535 features were grouped into 23 specific topical categories as follows. The number of comments per category are listed in parentheses.

- Leadership and Membership of EA Preparation Team (3)

- Planning of EA (11)

- Executive Summary (7)

- Description of Purpose and Need (46)

- Description of Proposed Action/Activity and Alternatives (60)

- Scoping Process (14)

- Description of Study Area and Resources (16)

- Use of Traditional Knowledge (1)

- Description of Impact Prediction Methodologies (2)

- Comparative Impacts on Resources (107)

- Cumulative Effects Assessment and Management (16)

- Scientific Foundation for Study and Subject Matter Experts (17)

- Regulatory Coordination/Consultation/Compliance (30)
- Systematic Determinations of Significance of Impacts (28)
- Identification of Mitigation Measures and Related Monitoring (35)
- Preparation of FONSI (10)
- Use of Adaptive Management (3)
- Referencing of Source Materials (4)
- Application of Principles of Scientific Writing and Communication (73)
- Public Involvement (39)
- Consistency with CEQ, Preparer Agency, and Other Regulations or Guidelines (10)
- Response to Review Comments on Draft EAs (2)
- Preparation of Administrative Record (1)

The bottom line is that numerous comments were received on Question 7, and they could be used as the basis for prioritizing and delineating BPPs for up to 23 topical categories. Careful review of each of the 23 categories of comments would provide a useful foundation for the selection of pertinent BPPs. The selection process is described in Section 4.

POTENTIAL TOPICAL ISSUES FOR BPPs

As noted in Section 2 on the design of the survey questionnaire, 14 potential topical issues were addressed within Questions 8 through 21. Question 8 introduced the concept of three levels of EAs. The general concept was based upon two levels of EAs as described in the Modernizing NEPA Implementation report (Council on Environmental Quality, 2003). These two levels were referred to as “small EAs” and “large EAs”. According to the CEQ report, small EAs typically range from 10 to 30 pages in length; are developed by one author; require from 2 weeks to 2 months to complete; and cost between $5,000 and $20,000. Large EAs typically range from 50 to more than 200 pages in length; are developed by an interdisciplinary team; require from 9 to 18 months to complete; and cost between $50,000 and $200,000. Further, mitigated FONSIs are usually associated with large EAs.

The three levels denoted in Question 8 include “small-scale EAs” (analogous to small EAs noted above), “mitigated FONSI EAs” (analogous to large EAs noted above), and “Super EAs” which are even more lengthy documents that include mitigation

measures. Some practitioners perceive that Super EAs are really EISs by another name.

A total of 238 respondees provided input on Question 8. The concept of three levels of EAs was agreed to by 88.2% of the respondees. A total of 21 comments either directly supported the three levels (5 comments) or conditionally supported them (16 comments). Nine additional comments raised concerns about the three levels, particularly with regard to the term Super EAs. Further, 23 additional comments generally voiced disagreements with the concept of Super EAs. Further, some statements were included in relation to using Super EAs as a means to avoid public involvement and participation. Finally, 31 other comments were provided on a range of concerns relative to levels of EAs.

The bottom line related to Question 8 is that two levels of EAs are already recognized and have been utilized for over 25 years – small scale (or traditional) EAs and mitigated FONSI EAs (also referred to as large EAs). The term Super EAs is more recent (within the last 5 to 10 years) and potentially problematic in the development of BPPs. Additional consideration is needed relative to the content of Super EAs , their associated public participation, if any, and the presumed requirements for mitigation of multiple impacts. Accordingly, two options are available; first, remove the terminology noted as “Super EAs”, and return to the two levels – small EAs and large EAs – as noted by CEQ (Council on Environmental Quality, 2003). The second option would be to use the term “Enhanced EA” in lieu of “Super EA”. For purposes herein, the second option will be utilized. This option would support the 88.2% of the respondees who agreed with the three levels in Question 8. For purposes herein, Enhanced EAs can be defined as ranging from more than 200 pages in length up to 300 to 400 pages; are developed by an expanded interdisciplinary team; require from 15 to 24 months to complete; include multiple mitigation measures; and cost in excess of $200,000. (The term Enhanced EA should be substituted for Super EA throughout this report).

Questions 9 through 21 address specific substantive topics for consideration in relation to the development of BPPs for EAs. Table 7 contains the bottom-line conclusions for the 13 questions (topics). Detailed information on the responses to each question, and requested comments for Questions 10-12, 14, and 20-21 is contained in Appendix E. The tabular information and comments for each question was reviewed during the selection process for BPPs; as noted earlier, this process is described in Section 4 herein.

BARRIERS TO AND POSITIVE ACTIONS FOR IMPLEMENTING BPPs

Question 22 in the survey questionnaire asked that respondees identify barriers to the implementation of BPPs for EAs. A total of 302 barriers were identified by 190 respondees. Table 6 indicates that eight categories of comments were identified. The category entitled Institutional Barriers and Concerns included 200 of the 302 identified barriers. The bottom line from Question 22 was that the large number of barriers should be considered by CEQ and Federal agencies if there is a decision made to provide

Table 7: Summary of Bottom-line Conclusions for Substantive Questionnaire Topics

Question	Topic	Bottom-Line Findings
9	Alternatives for Three Levels of EAs	The responses to Question 9 provided general support to the concept that more complicated EAs should incorporate more alternatives which are subjected to comparative analyses.
10	Pertinent Issues and Impacts	Strong support was noted on the need for selecting pertinent issues and impacts for study in EAs, and also for documenting the selection process and outcomes.
11	Topical Outlines for EAs	While support was expressed for the appropriate use of outlines from both Sections 1502.10 and 1508.9(b), further consideration of appropriate topical outlines for EAs should be considered. Any generated topical outlines should be sufficiently flexible so that modifications could be made on an as-needed basis.
12	Page Limits for Three Levels of EAs	The “ranges of page limits” topic is important; however, the first priority for BPPs should be focused on the substantive contents of EAs, including the clear delineation and rationale for concluding “no significant impacts”.
13	Impact Significance Determinations	Preparers of EAs should document the use of Section 1508.27 as a means to conclude a Finding of No Significant Impacts. Reviewers of EAs should note the usage or non-usage of Section 1508.27, and recommend/require, as needed, its incorporation.
14	Composite Report of Laws and Criteria	A composite report of laws and impact significance criteria, which should be periodically updated, would be useful for preparers and reviewers of EAs and EISs.

15	Incomplete and Unavailable Information for EAs	The four-step process described in Section 1502.22 provides a structured approach for identifying and documenting how an agency should address incomplete and unavailable information at the EIS level. As appropriate, the process can, and should be, used at the EA level. Further, the responses to Question 16 (a follow-on question for those 210 persons who checked no in Question 15), indicate favorable response to the application of the four-step process when considering the level of EA.
16	Use of Section 1502.22	The four-step Section 1502.22 process for addressing incomplete and unavailable information could be useful in preparing EAs wherein such information could be problematic and necessary for informed decision-making.
17	Public and Agency Scoping for Three Levels of EAs	Public and agency scoping should be considered for all three levels of EAs, with potential greater needs associated with the mitigated FONSI EAs and enhanced EAs. Section 1501.7 of the CEQ's NEPA regulations contains useful information on planning scoping activities and documentation of the findings. No unique scoping activities, nor analyses are envisioned for EAs.
18	Public Reviews of Three Levels of EAs	Public reviews and responses to comments should be considered for all three levels of EAs, with anticipated greater needs associated with mitigated FONSI EAs and enhanced EAs. Part 1503 of CEQ's NEPA regulations describe how to invite comments (1503.1) and respond to comments (1503.4). Further, Section 1502.19 addresses the circulation of EISs. Since the focus herein is on EAs; it should be noted that the above Part and Section could also be applied to EAs.

19	CEAM for Three Levels of EAs	The high agreement percentages for CEAM inclusion within the three levels of EAs reflect the importance of including such appropriate considerations in all EAs. Further, plaintiff claims in numerous EA cases involving Federal courts have focused on inadequate considerations of cumulative effects. Plaintiffs may use these inadequacies as one item of evidence supporting the need for EISs. Accordingly, a BPP for addressing CEAM in EAs would be useful. Supporting information for this BPP could be extracted from CEQ's 1997 guidance entitled "Considering Cumulative Effects Under the National Environmental Policy Act".
20	Climate Change and Three Levels of EAs	Support for climate change analysis, as appropriate, for all three levels of EAs was noted. The concepts in the CEQ's February 18, 2010, draft guidance on climate change analysis, primarily for EISs, could be extended for use in EAs. The issuance of final guidance on climate change analysis could also inform its relevance to EAs.
21	Supplemental EAs	Support exists for appropriate supplementation of EAs. The principles and considerations for supplementation of EISs is in Section 1502.9(c), and they could be extrapolated and used as the basis for supplementing EAs.

guidance and BPPs for the preparation of EAs. Because of similar concerns in multiple comments, careful review of the listed barriers and issues could yield a reduced list of items for more detailed consideration.

Question 23 began by identifying three positive actions which could be utilized by CEQ and Federal agencies to implement proposed BPPs. These actions were: (1) include BPPs in contractual scopes of work for the preparation of EAs; (2) Federal agencies and/or consulting firms should develop training courses to further explain anticipated BPPs and their application; and (3) conduct special studies of case law or other subjects that could be used to support BPPs for EAs.

Regarding Question 23, 106 respondees provided 95 additional comments related to positive implementation actions. Table 6 indicates the nine categories of comments were identified. Two categories were comprised of 49 comments -- 29 were related to Suggestions on CEQ Activities, and 20 were focused on Suggestions on Agency Activities. The bottom line for Question 23 concluded that if CEQ and Federal agencies decide to proceed with the development of BPPs and guidance for EAs, reviews of these suggestions could be useful in developing an appropriate implementation plan.

SECTION 4
SELECTION PROCESS FOR BPPs

Section 4 contains information on a systematic selection process for topical BPPs for EAs. The process is based on four fundamental assumptions described in the first sub-section herein. The second sub-section contains a description of the step-wise selection process, and its application. The results relative to two priority categories of identified BPPs are briefly noted in the second sub-section.

FUNDAMENTAL ASSUMPTIONS RELATED TO THE SELECTION PROCESS

After evaluating the results from the survey questionnaire, and realizing that a robust set of information was provided by the respondees, it was determined that the results could be systematically utilized to identify specific topics for BPPs. Accordingly, four key assumptions related to the selection process were identified; they include:

- Assumption 1 – Responses to the survey questionnaire were conducive to identifying summary tabular or quantitative information, and/or lists of provided comments which were categorized by pertinent groupings for specific questions. Appendix E herein contains the complete resultant displays of findings for each of the 23 included questions. Further, both types of information are relevant within a systematic selection process for topics needing BPPs.

- Assumption 2 – The most extensive information related to respondee experience on good practices in preparing EAs is found in Question 7 (Appendix E). Table 4 in Section 3 indicates that 24 categories of comments were delineated for 559 comments on Question 7; however, it should be noted that the final category for Question 7 contained 24 comments on examples of inadequacies; however, these were not included herein since Question 6 was focused on a systematic analysis of inadequacies. Accordingly, the Question 6 prioritized findings were also considered to be instructive for the selection process. Finally, the findings related to 14 specific topics addressed in Questions 8 through 21 will also be valuable in the selection of BPP topics for EAs. Usage of Assumption 2 is described in the next sub-section herein.

- Assumption 3 – The questionnaire responses generated more than 30 potential BPP topics. This list can be reduced by matching some of these topics with information which is already addressed within the CEQ's NEPA regulations. Further, the information in the NEPA regulations may be related solely to EISs, thus it would be necessary to clearly state the rationale for the assumption that it could apply to BPPs for EAs.

- Assumption 4 – Topics for BPPs for EAs can be divided into two listings as follows: Priority 1 topics encompass those subjects which need a specific BPP statement for EA guidance; and Priority 2 topics can embrace written information

based upon the CEQ's NEPA regulations which could be used as defacto BPPs for EAs.

SYSTEMATIC STEP-WISE SELECTION PROCESS FOR BPP TOPICS FOR EAs

The following steps comprised the selection process:

- Step 1 – Because the adequacies comments for Question 7 were extensive (535), it was necessary to divide them into topical categories of supportive information; a total of adequacies 23 categories were delineated (see Table 4). Careful consideration of the 23 categories of positive features, along with the number of comments included within each category, led to the realization that several of the 23 categories could be combined. To illustrate this process, the two left columns in Table 8 can be examined. The left column contains an initial list of 18 potential BPPs from Question 7. The second column from the left lists five other potential BPP topics from Question 7 which could be combined with the listed topic to its left.

- Step 2 – The third column from the left in Table 8 identifies pertinent topical information within specified sections of the CEQ's NEPA regulations, or other useful sources of information, for addressing either the initial listed item, or the combined item, or both. Accordingly, the right column of Table 8 contains an initial tentative list of 11 Priority 1 topical categories, and 7 Priority 2 topical categories.

- Step 3 – Information and feedback on prioritization related to nine initially listed inadequacies within EAs was the subject of Question 6. Summary information on these prioritized inadequacies and respondee comments is in Table 9. The left column of Table 9 includes the entire list of 18 potential topics derived from the responses to Question 7 (see Table 8). The center column of Table 9 includes the "prioritized" nine inadequacies from Question 6 in Appendix D. Each of the nine inadequacies are matched with one or more of the combined line of 18 potential BPP topics from Table 8. Finally, seven topical categories of comments on inadequacies in EAs (from Question 6 and Table 4) are matched with one or more topics in the left two columns.

- Step 4 – Table 10 compares the 18 potential BPPs from the left column of Table 9 with the tentative BPP priorities listed in Table 8. In addition, six new topics from several other questions were added. The right-most column specifies the final BPP priorities for EAs.

- Step 5 – Prepare lists of the Priority 1 and 2 groupings for 24 total issues. Table 11 delineates the 15 selected Priority 1 topics for BPPs for EAs; and Table 12 does similarly for the 9 topical selections for Priority 2. Section 5 herein summarizes the supporting information and BPP statements for the 15 Priority 1

Table 8: Delineating the Initial List of Potential Topics for BPPs

Initial List of Categories of Comments From Question 7	Combining Topics From Initial List	Use CEQ's NEPA Regulations or Other Sources	Tentative BPP Priority
• Leadership and Membership of EA Preparation Team (3)*	Combine with Planning of EA (11)	Utilize other sources such as textbooks, journal articles, and agency guidance	2
• Executive Summary (7)		Utilize principles in Section 1502.12 (Summary)	2
• Description of Purpose and Need (46)			1
• Description of Proposed Action/Activity and Alternatives (60)			1
• Scoping Process (14)		Utilize principles in Section 1501.7 (Scoping)	2
• Description of Study Area and Resources (16)	Combine with Use of Traditional Knowledge (1)		1
• Comparative Impacts on Resources (107)	Combine with Description of Impact Prediction Methodologies (2)		1
• Cumulative Effects Assessment and Management (16)			1
• Scientific Foundation for Study and Subject Matter Experts (17)		Utilize Section 1502.24 (Methodology and Scientific Accuracy)	2
• Regulatory/Coordination/ Consultation/Compliance (30)	Combine with Consistency with CEQ, Preparer Agency, and Other Regulations or Guidelines (10)		1

• Systematic Determinations of Significance of Impacts (28)		Utilize Section 1508.27 (Significantly)	1
• Identification of Mitigation Measures and Related Monitoring (35)			1
• Preparation of FONSI (10)		Utilize Section 1508.13 (FONSI)	2
• Use of Adaptive Management (3)			1
• Application of Principles of Scientific Writing and Communication (73)	Combine with Referencing of Source Materials (4)		1
• Public Involvement (39)		Utilize Section 1506.6 (Public Involvement)	1
• Response to Review Comments on Draft EAs (2)		Utilize Section 1503.4 (Response to Comments)	2
• Preparation of Administrative Record (1)		Utilize Dept. of Justice or agency-specific guidance on preparing Administrative Record	2

*Denotes number of comments provided from Question 7

Table 9: Potential BPP Topics from Question 7, and Supporting Information from Question 6

Combined List of Potential Topics for BPPs (from Question 7 and Table 8)	**Prioritized EA Inadequacies (from Question 6 in Appendix D)**	**7 Topical Categories of Comments on Inadequacies in EAs (from Question 6 and Table 4)**
• Leadership and Membership of EA Preparation Team (3)* and Planning of EA (11)		
• Executive Summary (7)		
• Description of Purpose and Need (46)		Inadequate Explanation of Need for Action (2)***
• Description of Proposed Action/Activity and Alternatives (60)		Inadequate Description of Proposed Action (4) and Consideration of Alternatives (7)
• Scoping Process (14)		
• Description of Study Area and Resources (16), and Use of Traditional Knowledge (1)		
• Comparative Impacts on Resources (107), and Description of Impact Prediction Methodologies (2)	Absence of "hard look" regarding specific types of impacts (1.66)**	Incomplete Impact Analysis (2)
• Cumulative Effects Assessment and Management (16)		Inadequate Cumulative Impact Analysis (4)
• Scientific Foundation for Study and Subject Matter Experts (17)	Minimal information on the scientific basis for stated impacts (1.77)	
• Regulatory/Coordination/ Consultation/Compliance (30), and Consistency with CEQ, Preparer Agency, and Other	Omission of or inadequate agency coordination for the ESA (1.86) and NHPA (1.88)	Incomplete Coordination with Other Agencies (5)

Regulations or Guidelines (10)		
• Systematic Determinations of Significance of Impacts (28)	No clear delineation of impact significance (1.52)	
• Identification of Mitigation Measures and Related Monitoring (35)	Concerns regarding the implementation of impact mitigation measures (1.73), and concerns regarding the effectiveness of impact mitigation measures (1.79)	
• Preparation of FONSI (10)		
• Use of Adaptive Management (3)		
• Application of Principles of Scientific Writing and Communication (73), and Referencing of Source Materials (4)	Poor writing and editing (1.95)	Minimal to No Scientific-based Writing (2)
• Public Involvement (39)	Absence of public participation for large-scale EAs (Super EAs) (1.90)	
• Response to Review Comments on Draft EAs (2)		
• Preparation of Administrative Record (1)		

*Denotes number of comments provided from Question 7
**Denotes rating averages by respondees to Question 6 (the lowest rating average was 1.52 -- this denoted the most important inadequacy; the highest rating average was 1.95 -- this denoted the least most important inadequacy; however, it should not be ignored)
***Denotes number of comments provided by Question 6

Table 10: Combined Potential BPP Topics from Questions 7 and 6, and from Questions 8-21

Combined List of Potential Topics for BPPs (from Questions 7 and 6 and Listed in Table 9)	Tentative BPP Priority from Table 8	Topical Questions Related to Potential Topics for BPPs	Final BPP Priority
• Leadership and Membership of EA Preparation Team (3)* and Planning of EA (11)	2		2
• Executive Summary (7)	2	Q7 and Q6, and Section 1502.12	2
• Description of Purpose and Need (46)	1	Q7 and Q6	1
• Description of Proposed Action/Activity and Alternatives (60)	1	Q7, Q6, and Q9 (Three Levels of Analysis)	1
• Scoping Process (14)	2	Q7, Q6, Q17, and Section 1501.7	2
• Description of Study Area and Resources (16), and Use of Traditional Knowledge (1)	1	Q7 and Q6	1
• Comparative Impacts on Resources (107), and Description of Impact Prediction Methodologies (2)	1	Q7, Q6, and Q10	1
• Cumulative Effects Assessment and Management (16)	1	Q7, Q6, and Q19	1
• Scientific Foundation for Study and Subject Matter Experts (17)	2	Q7, Q6, and Section 1502.24	2
• Regulatory/Coordination/ Consultation/Compliance (30), and Consistency with CEQ, Preparer Agency, and Other Regulations or Guidelines (10)	1	Q7, Q6, and Q14	1

• Systematic Determinations of Significance of Impacts (28)	1	Q7, Q6, and Q13	1
• Identification of Mitigation Measures and Related Monitoring (35)	1	Q7, Q6	1
• Preparation of FONSI (10)	2	Q7, Q6, and Section 1508.13	2
• Use of Adaptive Management (3)	1	Q7, Q6, and recent guidance by agencies	1
• Application of Principles of Scientific Writing and Communication (73), and Referencing of Source Materials (4)	1	Q7, Q6	1
• Public Involvement (39)	1	Q7, Q6, Q18, and Section 1506.6	1
• Response to Review Comments on Draft EAs (2)	2	Q7, Q6	2
• Preparation of Administrative Record (1)	2	Other sources of information	2
From Questions 8, 11, 12, 15, 16, 20, and 21			
• Three Levels of Analysis	NA	Q8	1
• Topical Outlines in EAs	NA	Q11	1
• Page Limits for Three Levels of EAs	NA	Q12	1
• Incomplete and Unavailable Information	NA	Q15, Q16, and Section 1502.22	2
• Climate Change and Three Levels of Impacts	NA	Q20 and draft guidance	1
• Supplemental EAs	NA	Q21 and Section 1502.9	2

*Denotes number of comments provided from Question 7

Table 11: 15 Selected Topics for Priority 1 Attention as BPPs in EAs

(Priority 1 means that one to several paragraphs will be prepared on each listed BPP)

BPP No.	BPP Topic and Supporting Questions from Questionnaire
1	Three Levels of Analysis (Q8)*
2	Description of Purpose and Need (Q7 and Q6)
3	Description of Proposed Action/ Activity and Alternatives (Q7 and Q6); and Alternatives for Three Levels of Analysis (Q9)
4	Description of Study Area and Resources (Q7 and Q6)
5	Comparative Impacts on Resources (Q7 and Q6); and Pertinent Issues and Impacts (Q10)
6	Topical Outlines in EAs (Q11)
7	Page Limits for Three Levels of EAs (Q12)
8	Cumulative Effects Assessment and Management (Q7 and Q6); CEAM for Three Levels of EAs (Q19)
9	Regulatory/Coordination/ Consultation/Compliance (Q7 and Q6)
10	Systematic Determinations of Significance of Impacts (Q7 and Q6); and Impact Significance Determinations (Q13)
11	Identification of Mitigation Measures and Monitoring (Q7 and Q6)
12	Climate Change and Three Levels of Impacts (Q20)
13	Use of Adaptive Management (Q7 and Q6)
14	Application of Principles of Scientific Writing and Communication (Q7 and Q6)
15	Public Involvement, Response to Review Comments on Draft EAs (Q7 and Q6), and Public Reviews of Three Levels of EAs (Q18) (Section 1506.6 and 1503.4)

*Refers to question number in the Questionnaire survey form; could include response statistics, comments, or both.

Table 12: Nine Selected Topics for Priority 2 Attention as BPPs in EAs

(Priority 2 means that referrals to CEQ's NEPA Regulations or other information sources will be used as the basis for the BPPs)

BPP No.	BPP Topic and Supporting Questions from Questionnaire
16	Leadership and Membership of EA Preparation Team, and Planning of EA (Q7 and Q6*) – Utilize pertinent available sources of information
17	Executive Summary (Q7 and Q6) – Section 1502.12
18	Scoping Process (Q7 and Q6); and Public and Agency Scoping for Three Levels of EAs (Q17) – Section 1501.7
19	Scientific Foundation for Study and Subject Matter Experts (Q7 and Q6) – Section 1502.24
20	Composite Report of Laws and Criteria (Q14) – Utilize pertinent available sources of information
21	Preparation of FONSI (Q7 and Q6) – Section 1508.13
22	Incomplete and Unavailable Information for EAs (Q15 and Q16) -- Section 1502.22
23	Supplemental EAs(Q21) -- Section 1502.9
24	Preparation of Administrative Record – Utilize pertinent available sources of information

*Refers to question number in the Questionnaire survey form; could also include response statistics, comments, or both.

topics. Finally, in a brief fashion, key information for nine Priority 2 topics is also presented in Section 5.

SECTION 5
PROPOSED BPPs

Section 5 delineates 15 proposed Priority 1 BPPs for EAs. The first sub-section provides an example of a generic process utilized for systematically reviewing information within this report which is specifically related to the 15 Priority 1 BPPs identified in Section 4. In this context, Priority 1 reflects specific topics which should be addressed relative to anticipated guidance to be proposed by CEQ. The second sub-section herein includes summarized background information and specific wording for each of the 15 Priority 1 BPPs. If CEQ so chooses, the BPP wording, or edited modifications thereof, could be incorporated into draft guidance related to the preparation and review of EAs. The final sub-section concisely addresses the nine Priority 2 BPPs; this will be accomplished by identifying existing pertinent sections from CEQ's NEPA regulations. If CEQ chooses to include the nine Priority 2 topics in proposed EA guidance, it would be necessary to develop concise statements related to each of the nine topics.

PROCESS FOR DEVELOPMENT OF EACH PRIORITY 1 BPP

This sub-section illustrates a process for identifying background information contained at various locations within this report. BPP No. 8 – Cumulative Effects Assessment and Management (CEAM) will be used as the illustration of the process. Six generic steps are associated with process; the steps are described as follows based on using the CEAM subject as an example.

Step 1 -- Answer question – What are current inadequacies in addressing CEAM in EAs?

- Review the findings of Question 6 regarding general inadequacies of CEAM in EAs
    - Examine Q6 in Appendix E: "Complete Analysis of All Questionnaires" (CAAQ) – the inadequacy entitled absence of hard look regarding specific types of impacts was noted (this inadequacy had the second average rating – 1.66, thus it is important to address direct, indirect, and cumulative effects
- Review Q6 comments received on CEAM
    - Examine Q6 in Appendix E (CAAQ) – four comments related to inadequate cumulative impact analysis – they ranged from no attention to insufficient attention to CEAM
- Prepare answer to the Step 1 question

Step 2 -- Answer question – What are current features typically associated with adequate CEAM attention in EAs?

- Review the CEAM comments received on Question 7 in Appendix E (CAAQ) – 16 comments were received, they generally focused on addressing the topic, documenting the results, and describing the rationale for no significant cumulative effects

- Prepare answer to the Step 2 question

Step 3 -- Answer question – What are the key findings from Q19 regarding CEAM for three levels of EAs?

- Review the tabular results in Appendix E (CAAQ) for Q 19 along with the Observations on Responses and Bottom Line

- Prepare answer to the Step 3 question

Step 4 -- Answer question – Were comments related to CEAM received on any other questions within the survey questionnaire?

- Review Table 4 to determine if any other categories of comments for Q8, 10-12, 14, and 20-21 addressed CEAM

- Answer – no other comments were found

Step 5 -- Answer question – Does CEQ address CEAM in its NEPA regulations, and does CEQ have any other guidance/reports on CEAM? If so, review the information for its relevance.

- CEQ's NEPA regulations – Sec. 1508.27 (b)(7) indicates that agencies should identify cumulatively significant impacts as an intensity factor in determining impact significance. If cumulatively significant impacts are predicted, this could be a trigger for requiring the preparation of an EIS.

- CEQ's 40 FAQs – Questions 36 through 40 are related to EAs – no answers directly refer to CEAM (see these questions in Appendix A herein).

- CEQ's 1997 report entitled "Considering Cumulative Effects Under the National Environmental Policy Act" contains an 11-step CEAM process which is primarily related to EISs. A subset of the steps (Steps 1-9) could provide a framework for consideration of CEAM at an EA level, and for determining if cumulatively significant impacts are of concern within an EA.

Step 6 -- Prepare draft of BPP for CEAM; circulate the draft to selected members of the Steering Committee for their review and comments.

FIFTEEN PRIORITY 1 BPPS

This sub-section contains background information and proposed BPPs for the 15 Priority 1 BPPs as listed in Table 11 in Section 4.

BPP1 – Three Levels of Analysis (Q8)* (*denotes Question 8)

Background Information

Responses to Question 8 indicated a high level of support for three levels of EAs. Specifically, 210 out of 238 respondees (88.2%) supported the concept of having three levels of EAs. Twenty eight out of 238 respondees (11.8%) did not support the concept of having three levels of EAs. In addition, eighty-four people out of the 238 respondees (35.3%) made comments.

A total of 21 comments supported the three levels: 5 comments directly and 16 comments conditionally supported them. Nine additional comments raised concerns about the three levels, particularly with regard to use of the term "Super EAs." Further, 23 additional comments generally voiced disagreements with the concept of "Super EAs"; some of these comments voiced opposition to using "Super EAs" as a means to avoid public involvement and participation. Finally, 31 other comments were provided on a range of concerns relative to levels of EAs.

NEPA does not address levels of EAs. National Environmental Policy Act of 1969, § 2 et seq., 42 U.S.C.A. § 4321 et seq. The only guidance in CEQ's NEPA regulations concerning EAs is contained in 40 CFR 1508.9 and it does not address different levels of EAs. The Council on Environmental Quality Regulations for Implementing the Procedural Provisions of the National Environmental Policy Act, 40 C.F.R. §§ 1500-1508 (2011) [hereinafter NEPA regulations]. However, The *Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations* does address two levels of EAs in questions 36 (recommends 10-15 pages) and 40 (mitigated FONSI EAs). In addition, there is a growing recognition in the NEPA practitioner community that several levels of EAs are *already* being prepared beyond these two levels and these may range from 15-page documents (rarely) all the way up to several hundred pages (frequently).

A search of the case law reveals no court cases exist on point defining different levels of EAs, or referencing three levels of EAs. However, Judge Breyer, sitting on the First Circuit Court of Appeals at the time, authored the most noteworthy opinion differentiating between EAs and EISs during the review of a 350-page EA. *See Sierra Club v. Marsh*, 769 F.2d 868, 874 (1st Cir. 1985*), abrogated on other grounds by* Judge Breyer who succinctly emphasizes that *"[w]e should not give conclusive weight, one way or the other, to the simple facts of EA length, complexity, and controversy. These facts do not by themselves show that the EA's conclusion—'no significant impact'—is correct, nor do they show it is incorrect." Id.* (emphasis added).

Accordingly, an EA is not a substitute for an EIS, regardless of the time, effort, and analysis that went in to making it. An EA and EIS serve different purposes. An EA aims to identify potential impacts on the human environment in an effort to help agencies decide if they should prepare an EIS. An EIS helps federal decision makers balance different kinds of positive and negative environmental effects, one against the other and weighs negative environmental impacts against a project's other objectives, such as economic development.

Based upon analysis of the above Questionnaire findings, it was concluded that a BPP for addressing three levels of EAs should be prepared.

Specific BPP for Three Levels of EAs

Determining the appropriate EA level is a three-step process. First, conduct preliminary screening by identifying the purpose and need of the proposed action and any potential reasonable alternatives. Before you go to steps two and three, write down the proposed action, its purpose and need, and the possible alternatives.

Step two involves using Table 13 to determine what level of EA is most appropriate. Small-scale, one project EAs are identified by the term *"Traditional"*; medium-scale, one to multi-project EAs are identified by the term "*Mitigated FONSI EAs*"; and large-scale EAs including programmatic or consolidated EAs are identified by the term "*Enhanced EAs*". An "X" located in the intersection of a given BPP (Priorities 1 and 2) and EA level means that BPP applies to that level of EA. Not all BPPs apply to all levels of EAs. Table 13 uses a cascade approach, i.e. moving left to right in the table all BPPs for the previous EA level are included in the next, more inclusive, level. The Traditional EA requires application of the fewest BPPs while the Enhanced EA the most.

Step three involves using the information gathered from the preliminary screening in step one and the identification of specific BPPs in step two (Table 13) and proceeding to the appropriate BPPs listed herein.

BPP2 – Description of Purpose and Need (Q7 and Q6)

Background Information

Responses to Question 6 (inadequacies in EAs) indicate a concern that the statements of purpose and need in EAs are inadequate. Four related comments regarding purpose and need in Question 6 noted that inadequacies ranged from inadequate explanation of need for the action, unclear delineation of purpose, confusion of the purpose and need with proposed action, and reverse engineering the purpose and need to fit the proposed action.

Conversely, the responses to Question 7 (adequacies in EAs) in the Description of Purpose and Need section included 46 comments on good purpose and need

statements within EAs. The comments generally focused on the importance of drafting a clear, concise, well-articulated, and well-defined purpose and need statement.

Other portions of Question 7 that included comments regarding purpose and need were four responses to the Description of Proposed Action and Alternatives

Table 13: Decision Matrix for BPPs

	EA Level		
	Traditional EA Small-scale , 1 Project	Mitigated FONSI EA Medium-scale, possible multi-project	Enhanced EA Large-scale, Programmatic or Consolidated Project
BPPs			
Priority 1:			
BPP2 Description of Purpose and Need	X	X	X
BPP 3 Description of Proposed Action & Alternatives	X	X	X
BPP 4 Description of Study Area and Resources		X	X
BPP 5 Comparative Impacts on Resources	X	X	X
BPP 6 Topical Outlines			X
BPP 7 Page Limits	X	X	X
BPP 8 Cumulative Effects Assessment and Management		X	X
BPP 9 Regulatory/Coordination/ Consultation/Compliance	X	X	X
BPP 10 Significance Determinations		X	X
BPP 11 Mitigation Measures & Monitoring		X	X
BPP 12 Climate Change		X	X
BPP 13 Adaptive Management		X	X
BPP 14 Scientific Writing and Communication	X	X	X

BPP15 Public Involvement and Response to Comments		X	X	
Priority 2:				
BPP 16 Leadership and Membership of Preparation Team		X	X	
BPP 17 Executive Summary		X	X	
BPP 18 Scoping Process		X	X	
BPP 19 Scientific Foundation for Study			X	
BPP20 Composite Report of Laws and Criteria			X	
BPP 21 Preparation of FONSI	X	X	X	
BPP 22 Incomplete or Unavailable Information			X	
BPP 23 Supplemental EAs			X	
BPP 24 Administrative Record			X	

(DOPAA) section, and four comments to the Application of Principles of Scientific Writing and Communication section. All comments focused on the need for clear and concise purpose and need statements. Four comments were also noted in the section entitled Inadequacies in EAs, which focused on loosely written and poorly defined purpose and need statements.

Responses to Question 7, involving 269 respondents indicated strong support for ensuring clear, concise, well-defined purpose and need statements in all levels of EAs..

NEPA does not contain language involving purpose and need but does provide two separate alternatives analysis requirements.[1]

CEQ regulations require that "[t]he statement shall briefly specify the underlying purpose and need to which the Agency is responding in proposing the alternatives including the proposed action."[2] They also require that an EA contain "brief discussions of the need for the proposal."[3].

The CEQ advocates a collaborative approach, when applicable, in defining purpose and need statements [4] The collaborative approach involves the lead agency working directly with parties, such as agencies with regulatory authority, cooperating agencies and private parties, at one or more stages during the NEPA process, seeking their advice and agreement on the purpose and need statement.

Finally, many courts will look to the project's purpose and need statement to determine whether an agency should have reasonably considered an alternative[5]; the purpose and need statement dictates the range and selection of reasonable alternatives.

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[1] 42 U.S.C. § 4332(2)(C)(iii) (detailing the contents of an EIS and requiring "alternatives to the proposed action"); 42 U.S.C.§ 4332(2)(E)(directing federal agencies to "study, develop, and describe appropriate alternatives to recommended courses of action in any proposal which involves unresolved conflicts concerning alternate uses of available resources). These requirements apply to EAs as well. *Hanley v. Kleindienst*, 471 F.2d 823, 834-35 (2d Cir. 1972).

[2] 40 C.F.R. §1502.13; *see also* 40 C.F.R. § 1502.1 (expressing a need for good writing in documents, and requiring that "[s]tatements shall be concise, clear, and to the point.").

[3] 40 C.F.R. § 1508.9 (2)(b).

[4] CEQ, "Collaboration in NEPA: A Handbook for NEPA Practitioners" (October 2007), *available at* http://ceq.hss.doe.gov/publications/collaboration_handbook.html.

[5] *See, e.g., Mayo Found. v. Surface Transp. Bd.*, 472 F. 3d 545, 550 (8th Cir. 2006), *City of Alexandria v Slater*, 198 F.3d 862, 867-69 (D.C. Cir. 1999); *Carmel-by-the-Sea v. U.S. Dep't of Transp*., 123 F.3d 1142 (9th Cir. 1997)

Courts defer to agency statements of purpose and need and uphold them when reasonable.[6] On the one hand, an agency may not define the purpose of and need for the action in unreasonably narrow terms so as to become a foreordained formality. But then again an agency need not craft a statement so broad that it requires consideration of alternatives that are inconsistent with the overarching purpose of the proposal. The courts are silent when differentiating purpose and need in an EA rather than an EIS, applying similar legal reasoning in both types of documents.

The courts emphasize the importance of a carefully developed purpose and need section – the needs should be succinctly stated and the purposes (goals or objectives) should be articulated such that measurable (quantitative or qualitative) criteria could be utilized in the evaluation of reasonable alternatives.[7]

Finally, agencies should look to their own guidance to determine whether an agency has reasonably defined the purpose and need of an applicant-proposed project.

Based upon the above Questionnaire results, a BPP for ensuring adequate purpose and need statements in EAs should be prepared.

Specific BPP for Purpose and Need

When writing a purpose and need statement within an EA, begin by defining, in clear and concise language, the existing needs to be addressed. Then, after defining the need for the project, determine what the purpose of the project is. The purpose is a statement of goals and objectives that an Agency intends to fulfill by taking action. These goals should be related to agency mission, or from implementing or other legislation, or other sources, such as agency policy, guidance or management objectives.

Ensure that the descriptions of purpose and need stand alone; that they are not too narrow to suggest only one alternative must be selected, especially in the case of traditional EAs; on the other hand, ensure that purpose and need are not too broad, and are consistent with the agency's own guidance. Consider a collaborative approach with other cooperating agencies, agencies with regulatory authority or other parties in the drafting of the purpose and need statement.

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[6] *See e.g., Citizens for Smart Growth v. v. Secretary of Dept. of Transp.,* 669 F.3d 1203, 1212 (11th Cir. 2012) (citing *Citizens Against Burlington, Inc. v. Busey*, 938 F.2d 190, 196 (D.C.Cir.1991)("[A]gencies must look hard at the factors relevant to the definition of purpose" and "should take into account the needs and goals of the parties . . . ").

[7] Schmidt, O. L., "The Statement of Underlying Need Determines the Range of Alternatives in an Environmental Document", Environmental Analysis -- The NEPA Experience, Hildebrand, S. G., and Cannon, J. B., editors, Lewis Publishers, Boca Raton, Florida, 1993, pp. 42-65. Lee, J.L., "The Power of Purpose and Need in Quality NEPA Planning: Three Case Studies", Federal Facilities Environmental Journal, Autumn, 1997.

The purpose and need statement for the action dictates the range of reasonable alternatives and supports the screening process in selecting the reasonable alternatives.

BPP3 – Description of Proposed Action/Activity and Alternatives (Q7 and Q6); and Alternatives for Three Levels of Analysis (Q9)

Background Information

Written comments in response to Question 6 (inadequacies in EAs) indicated that inadequacies ranged from inadequate description of proposed project, inadequate screening and consideration of alternatives to reduce impacts, failure to consider obvious alternatives and reverse engineering purpose and need to fit the proposed action, and the absence of a hard look regarding specific types of impacts (including cumulative impacts). On the positive side, Question 7 included 16 comments on good features within EAs which are generally focused on the importance of drafting a well-defined, and detailed project description, including the Description of Proposed Action and Alternatives (DOPAA), a clear, definitive alternatives analysis, including the "no-action" alternative, discussion of comparative impacts for each alternative, and logical, rational reasons for why an alternative was chosen or dismissed from consideration.

Responses to Question 9 indicated strong support for addressing alternatives in all three levels of an EA. Specifically, 79.5% of 224 respondees supported lesser (2) alternatives for small-scale EAs (including no-action alternative). Higher percentages of support for a greater range of alternatives (3-4) were noted for mitigated FONSI EAs (64.6%) and for Enhanced EAs (56.6%). A greater percentage (33%) supported four or more alternatives for Enhanced EAs as well. The comments general supported the concept that more complicated EAs should incorporate more alternatives which are subjected to comparative analyses

Section 102 (42 U.S.C. § 4332) (C) requires that agencies must "include in every recommendation or report on proposals for legislation and other major Federal actions significantly affecting the quality of the human environment, a detailed statement . . .including alternatives to the proposed action . . " Regarding CEQ's NEPA regulations, alternatives is defined and discussed in Section 1502.14 , "the heart of the [EIS]."[8]

Section 1502.14 states:

> This [ ] is the heart of the environmental impact statement. Based on the information and analysis presented in the sections on the Affected Environment (Sec. 1502.15) and the Environmental Consequences (Sec. 1502.16), it should present the environmental impacts of the proposal and the alternatives in comparative form, thus sharply

[8] A comprehensive list of CEQ Regulations and Guidance involving alternatives is available.

> defining the issues and providing a clear basis for choice among options by the decisionmaker and the public. In this section agencies shall:
>
> (a) Rigorously explore and objectively evaluate all reasonable alternatives, and for alternatives which were eliminated from detailed study, briefly discuss the reasons for their having been eliminated.
>
> (b) Devote substantial treatment to each alternative considered in detail including the proposed action so that reviewers may evaluate their comparative merits
>
> (c) Include reasonable alternatives not within the jurisdiction of the lead agency.
>
> (d) Include the alternative of no action.
>
> (e) Identify the agency's preferred alternative or alternatives, if one or more exists, in the draft statement and identify such alternative in the final statement unless another law prohibits the expression of such a preference.
>
> (f) Include appropriate mitigation measures not already included in the proposed action or alternatives.

Further, the CEQ addresses in detail specifics and clarifying guidance on the range and application of alternatives in their FAQ's.[9] The CEQ also discusses the value of a collaborative approach in defining the preferred alternatives in its publication: "Collaboration in NEPA: A Handbook for NEPA Practitioners" (October 2007)(available at http://ceq.hss.doe.gov/publications/collaboration_handbook.html)."

The court cases involving EAs state that federal agencies must include "all reasonable alternatives" setting forth those alternatives that demonstrate a reasoned choice.[10] An agency need not consider an infinite range of alternatives, only reasonable or feasible ones. [11] An agency is not required to consider alternatives that are not significantly different from those considered or that have substantially similar

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[9] Council on Environmental Quality, "Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations," Questions 1-7, Fed. Reg. 18026, 18027 (1981).

[10] *See e.g., Te-Moak Tribe of Western Shoshone of Nevada v. U.S. Dept. of Interior*, 608 F.3d 592 (9th Cir. 2010).

[11] *Id.*

consequences. The courts do not define a “numerical limit” on the number of alternatives that must be considered.[12]

CEQ added that what constitutes a reasonable range of alternatives depends on "the nature of the proposal and the facts in each case." Some courts have held that the range of alternatives agencies must reasonably consider decreases as the proposed action's environmental impact becomes less and less substantial.[13]

For EAs, however, the courts and CEQ allow agencies to consider a more limited or narrower range of alternatives.[14] The Ninth Circuit has upheld EAs with merely a no-action alternative and a preferred alternative.[15]

In addition, two peer-reviewed articles were relied on to formulate some of the BPPs; consistent and in some cases, building upon the answers received in this survey.[16]

Based upon the above Questionnaire findings, it was concluded that a BPP for addressing Description of Proposed Action and Alternatives, and Range of Alternatives in EAs should be prepared.

Specific BPP for DOPAA/Range of Alternatives (for three levels of analysis)

Draft a solid and legitimate statement of purpose and need; the agency’s screening criteria for selection of alternatives is derived from the purpose and need statement. Thus if the purpose and need statement is improperly narrowed – it may serve to flaw the alternatives analysis.

Construct a solid and legitimate statement of purpose and need, analyze a reasonable range of alternatives in detail that stems directly from that purpose and need, and explain clearly and with rational reasoning why the agency is dismissing other alternatives to its project and explain the reasoning why the agency selected its preferred alternative.

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[12] *Native Ecosystems Council v. U.S. Forest Service*, 428 F.3d 1233, 1246 (9th Cir. 2005).

[13] *See e.g., Native Ecosystems Council v. United States Forest Serv*., 428 F.3d 1233 (9th Cir. 2005); *Mt. Lookout-Mt. Nero Prop. Prot. Ass'n v. Federal Energy Regulatory Comm'n*, 143 F.3d 165 (4th Cir. 1998); *Sierra Club v. Espy*, 38 F.3d 792 (5th Cir. 1994).

[14] *See e.g., North Idaho Community Action Network v. U.S. Dept. of Transp.,* 545 F.3d 1147 (9th Cir. 2008); *Center for Biological Diversity v. Salazar*, 695 F.3d 893 (9th Cir. 2012).

[15] *Center for Biological Diversity v. Salazar*, 695 F.3d 893 (9th Cir. 2012).

[16] *See* Smith, “A Review of Recent NEPA Alternatives Analysis Case Law,” 27 Envtl. Impact Assess. Rev. 126 (2007); Steineman, “Improving Alternatives for Environmental Impact Statements,” 21 Envtl. Impact Assess. Rev. 3 (2001).

Ensure that a comparative analysis is completed for each alternative. Identify the no-action alternative, preferred alternative, and environmentally preferable alternative (if applicable).

Begin the alternatives analysis as early as possible in the project, as soon as the purpose and need is defined and then draft a well-defined description of the proposed action.

If enough decision space exists in the preparation of the NEPA document, consider involving the public and stakeholders more substantively in the development of alternatives; if a member of the public or a stakeholder or other interested party suggests an alternative – ensure that the agency studies the alternative in detail – unless the agency provides a well-reasoned explanation for why the alternative is being dismissed.

If the nature and scope of the proposed action changes between the draft and final impact statement, the agency must update the list of alternatives considered to reflect these changes, or explain clearly and rationally why the agency selected the unchanged alternatives.

Generally, more complex, complicated EAs should incorporate a greater range of alternatives, which are then subjected to comparative analyses. Simple, less complex (or in some cases, traditional) EAs have a lesser obligation to consider alternatives as compared to an EIS.

BPP4 – Description of Study Area and Resources (Q7 and Q6)

Background Information

Information used to support development of a BPP for Description of Study Area and Resources was based primarily on the survey results and pertinent sections of CEQ‘s NEPA regulations (40 CFR 1500-1508), augmented by selected federal, state, and non-governmental guidance.

Responses to Question 6 (inadequacies in EAs) identified an inadequacy of notable concern to the survey respondents: absence of a “hard look” regarding specific types of impacts. This inadequacy received an average rating of 1.66, which was second on the importance scale for nine noted inadequacies.

NEPA imposes a requirement on federal agencies to take a "hard look at environmental consequences" (Natural Resources Defense Council v. Morton, 458 F.2d 827, 838. D.C. Cir., 1972). Although the “hard look” concept covers more than selecting the correct resources for study and establishing appropriate study areas, these are necessary foundations for an adequate analysis of the environmental impacts of a proposed action and its alternatives. If the impact analysis is incomplete because it omits relevant resources or neglects affected geographic areas or time frames, the EA

will not be adequate to satisfy the “hard look” requirement. Therefore, it is reasonable for EA BPPs to address Description of the Study Area and Resources.

Comments provided in response to Question 6 (relating to EA inadequacies) included four statements relating to Description of the Study Area and Resources. These were:

- One comment under Incomplete Impact Analysis: “Inadequate scoping;” and
- Three comments under Incomplete Coordination with Other Agencies:
  - “Does not adequately address impacts to Native Americans/Alaskans/ Hawaiians;”
  - “does not include Traditional Knowledge of Indigenous Peoples (when applicable) on equal footing;” and
  - “Lack of coordination with permitting agencies or staff.”

Responses to Question 7 (relating to EA positive qualities) included 16 comments pertaining to Description of the Study Area and Resources, as follows:

- Focus on existing or affected resources and dismiss others
- Detailed affected environment section
- Clear and precise definition of study area; clearly defined alternatives
- Analysis of pertinent resource impacts only
- Accurate identification of current resources
- Sufficient data; concise review
- Clear discussion of existing conditions and impacts
- Adequate description of affected environment, proposed action and alternatives
- Good definition of analysis area - spatial and temporal; clear indication of potential impact areas
- Excellent description of existing conditions and potential impacts analysis; adequate public participation
- Focus on issues of concern
- Absence of "Affected Environment Encyclopedia" or focus on impacts

- Current conditions
- Good site specific information; project need
- Focus on relevant resources that could potentially be impacted
- Sound data collection and analysis

These comments emphasize five concepts:

- Selecting only relevant resources for analysis;
- Describing site-specific conditions and resources accurately with respect to their current or baseline condition;
- Clearly and precisely defining the spatial and temporal analysis areas;
- Using accurate data to describe the resources and define the study areas; and
- Applying information gained from public participation to focus the selection and description of resources and their study areas on issues of concern to the public.

Section 1502.15 of the CEQ NEPA regulations, Affected environment, emphasizes brevity and proportion, stating in part that an EIS "shall succinctly describe the environment of the area(s) to be affected or created by the alternatives under consideration. The descriptions shall be no longer than necessary to understand the effects of the alternatives. Data and analysis in a[n environmental impact] statement shall be commensurate with the importance of the impact, with less important material summarized, consolidated, or simply referenced. Agencies shall avoid useless bulk in statements and shall concentrate effort and attention on important issues."

Although it concerns cumulative impact assessment, the CEQ handbook *Considering Cumulative Effects Under the National Environmental Policy Act* (Council on Environmental Quality, 1997) provides guidance on selecting resources and defining study areas which applies equally well to the analysis of direct and indirect impacts in EAs. With regard to the selection of resources for study, CEQ emphasizes *value* (Council on Environmental Quality, 1997, Section 2, Table 2-1):

"What is the value of the affected resource or ecosystem? Is it:

- Protected by legislation or planning goals?
- Ecologically important?
- Culturally important?

- Economically important?

- Important to the well-being of a human community?"

The value of the resource to society is an important principle because it reaffirms the statutory purpose and language of NEPA "to enrich the understanding of the ecological systems and natural resources important to the Nation" (Sec. 2 [42 USC 4321]) and the intent of NEPA's Title I "to foster and promote the general welfare, to create and maintain conditions under which man and nature can exist in productive harmony, and fulfill the social, economic, and other requirements of present and future generations of Americans" (Sec. 101 [42 USC 4331]). In this context, the degree to which a resource component is valued by society is a key criterion for its inclusion in an EA, and a resource may be valued by society for any of a wide range of reasons, such as providing biodiversity, recreation, aesthetic enjoyment, a source of food, economic growth, improved health, education, and additional benefits.

With regard to defining geographic study areas, the CEQ handbook recommends defining a *project impact zone* based on a combination of two factors: (1) the types of changes—for example, emissions, noise, landform alterations—the proposed action would produce and the distances they would extend outward from the project site, and (2) the distribution of resources that would be vulnerable to, and might be affected by, the changes produced by the proposed action. Geographic boundaries would vary for different resources (Council on Environmental Quality, 1997, Section 2, pp. 12-16). The key principle expressed by this guidance is that the geographic study area should be defined in accordance with the characteristics of both the proposed action and each valued resource component, and based on the relationship between the two.

For time frames, CEQ guidance starts with the length of time over which the direct effects of the project are likely to occur. The CEQ handbook points out, however, that indirect and cumulative impacts can occur through persisting project-related and external influences that outlast the life of the proposed action, and that the analyst must take such long-term effects into account (Council on Environmental Quality, 1997, Section 2, p. 16). Here, the key principle is that environmental impacts can be subtle and persistent, and that the effects of a proposed action can be expressed long after the proposed action itself has ended. Landform alterations, radioactive and other types of contamination, and generational effects within biological populations, including human health and societal changes, are all pertinent examples.

The term *valued environmental component*, or VEC, is increasingly used in NEPA practice. The term originated as *valued ecological component* (Beanlands and Duinker 1983) and has been broadened to include physical and societal, as well as ecological, components of the environment. A strength of this terminology is its emphasis on value to society, reinforcing the intent of NEPA Title I and of the CEQ (1997) guidance discussed previously. A number of federal, state, and non-governmental organizations have adopted the VEC terminology in their NEPA guidance.

For example, the National Marine Fisheries Service (NMFS) document *Guidance on Describing the Affected Environment in EAs and EISs* (National Marine Fisheries Service, 2012) identifies inferred principles derived from 40 CFR 1502.15, Affected environment, which are relevant to selecting and describing VECs and defining study areas. The following points partially excerpt that discussion, which is presented in full under *Purposes and Principles from CEQ's NEPA Regulations* found on page 3 of the referenced document:

- Prepare succinct descriptions rather than verbose descriptions. This principle is supported in Section 1502.2(a) as follows, "EISs shall be analytic rather than encyclopedic."

- Select the VECs for analysis in the EA from a longer list on the combined basis of (1) the importance of each resource and (2) the potential of the proposed action and alternatives to impose direct, indirect, and contributed cumulative impacts on the resource.

- The included data for the components of the affected environment should be proportional to the perceived importance of the anticipated direct, indirect, and cumulative impacts. This principle is supported in Section 1502.2(b) as follows, "Impacts shall be discussed in proportion to their significance" (by inference this principle can be extended to the associated discussion of VECs in the Affected Environment section).

- Detailed information on the conditions of selected VECs should be included in one or more appendices (Section 1502.18). This approach is supported by the referral to baseline studies in the response to Question 25a in CEQ's 40 Questions (Council on Environmental Quality, 1981 and 1986). In this way, relevant information is made available, but the EA or EIS does not become "encyclopedic."

Recommended BPPs for Description of Study Area and Resources

The key BPP for describing resources and study areas is that no resource, and no study area boundary, can be arbitrary. Every resource, geographic study area boundary, and time frame included in the analysis must have a supporting rationale based on referenced evidence. Potentially affected resources, and impact mechanisms and pathways linking them to the proposed action, must be identified before meaningful geographic and temporal study areas can be defined.

Identification of Potentially Affected Resources

Meet early with federal, state, regional, and local resource agencies to identify and locate the physical, biological, and social resources under their jurisdiction which they believe could be affected by the proposed action. Invite Tribal leaders, representatives of non-governmental organizations, and stakeholder representatives to

these or separate meetings to secure their early recommendations as well. Take care to ensure that the relevant Traditional Knowledge of Native Americans, Alaska Native people, or Pacific Islanders, as appropriate, is documented and incorporated. The trust and information resulting from these early, pre-scoping meetings can save substantial amounts of time and money and contribute greatly to the success of the EA, regardless of its size and complexity.

Review the agency management plans for these VECs to identify (a) the vulnerable features of the VECs which have led to their being managed, (b) the management goals and time frames, and (c) the management area boundaries.

Conduct a focused literature review to identify additional physical, biological, and social resources to be included in the list of VECs, their vulnerable features, and their geographic distributions.

On a preliminary basis as the start of an iterative process, identify and list all features of the proposed action which could alter the environment during its construction, operation, and maintenance. These features – for example, vegetation clearing, excavation and fill placement, emissions to air and water, noise, stormwater runoff, roadway alterations, visual effects – could be impact mechanisms and pathways linking the proposed action to the identified VECs.

After the VECs and the relevant features of the proposed action have been identified on a preliminary basis, prepare a matrix listing the VECs along one axis and the relevant project features along the other. Using the matrix, conduct a preliminary but systematic analysis to identify each specific feature of the proposed action that could adversely or beneficially affect a specific vulnerability of each VEC. Briefly enter the information in each cell, leaving empty those cells where no linkage is found between the proposed action and a VEC. This preliminary analysis, to be conducted more rigorously later in the project, will provide an initial understanding of the impact mechanisms and pathways through which the proposed action could result in direct, indirect, and cumulative effects on the VECs. It will provide a basis for prioritizing budgeted work effort, and also start the foundation for determining the significance criterion and threshold for the analysis of each impact.

Description of Geographic and Temporal Study Areas

To have meaning, the boundary of a geographic study area must be extensive enough to capture the potential effects of specific features of a proposed action on a particular VEC, without being larger than necessary. The study area should be based on evidence linking the proposed action to the VEC within a cause-and-effect relationship, forming an approximate map of the geographic area covered by that relationship. Although each VEC could in theory have its own study area, it is efficient to use a single boundary that includes all of the VEC study areas within a single, unified study area.

Because the regulatory definition of indirect effects states that they are “farther removed in distance” [40 CFR 1508.8(b)], the geographic study area must be large enough to capture them. In practice, this means that the study area for a VEC that would potentially receive indirect impacts from the proposed action can be extended beyond or bounded differently from the unified study area used for the other VECs, and shown in a separate graphic.

Some VECs have characteristics that present special problems for defining study areas. Atmospheric and water contaminants, populations of anadromous and amphidromous fishes, migratory birds, and macroeconomic processes, among other examples, can have direct or indirect impact pathways encompassing very large areas. Cases like these can be addressed individually at the appropriate scales and shown in separate graphics.

Geographic study areas for assessing potential cumulative effects can, for many VECs, have the same boundaries used to assess direct and indirect impacts on those same VECs. This is because cumulative effects on a VEC are assessed only if the proposed action would have one or more direct or indirect impacts on that VEC. (See BPP No. 8, Cumulative Effects Assessment and Management.) In some cases, however, the study area for cumulative effects has to be larger because impact pathways from other past, present, and reasonably foreseeable future actions can affect a larger portion of a VEC while adding to or interacting with the direct or indirect effects of the proposed action.

In a hypothetical example, such as acid rain or arctic haze, emissions from a proposed power plant are carried hundreds of miles to affect atmospheric phenomena at remote locations. If this is defined as an indirect effect of the proposed action, a map can be drawn to show a probable impact vector based on prevailing winds and other factors. If the proposed action would contribute to a cumulative effect, however, a larger study area would be required to encompass the impact vectors of other point source emissions that are contributing to the cumulative effect. In the hypothetical case of a biological population, a direct or indirect effect on a defined portion of that population could be augmented by direct and indirect effects of other actions on other portions of the population. In this case, the study area required to assess the cumulative effect would have to be extended beyond the boundary that was sufficient to analyze just the portion of the population receiving direct or indirect effects from the proposed action alone.

Temporal study areas, or time frames, for assessment of a VEC may vary for potential direct, indirect, and cumulative impacts, and may also vary from one VEC to another. In accordance with the regulatory terminology [40 C.F.R. § 1508.8(a)], direct effects “occur at the same time and place as the action.” The temporal study area for direct effects on a VEC, therefore, begins at the start of the action and continues through construction, operation, and maintenance for the duration of the project, often defined as the design year. For some projects, additional time for decommissioning may be required. Direct effects could occur throughout this lengthy time frame.

Because indirect effects “are later in time or farther removed in distance” [40 C.F.R. § 1508.8(b)], the temporal study area must extend far enough into the future to capture them. In the case of actions which would result in long-lasting built projects such as a highway or bridge, potential effects that could occur beyond the life of the project could include long-term physical, biological, and social changes induced by the project and lasting beyond the project life. Such transformations could include, for example, erosional effects on terrain, watershed and habitat reconfiguration from slope alteration and stream channel migration, and induced changes in the built environment and resulting social and cultural patterns. Potential indirect effects of a proposed action on community health, education, or regional economic growth, for example, could produce changes extending into future generations.

The time frame for assessing cumulative impacts depends on the particular VEC under study and will typically vary among different kinds of VECs. The temporal study area must extend far enough into the past to capture actions in previous years which produced effects on the VEC that still persist, present-day actions in progress, and “reasonably foreseeable future actions” that could affect the VEC, “regardless of what agency (Federal or non-Federal) or person undertakes such other actions” (40 C.F.R. § 1508.7).

All VECs and study areas described using the preceding approach should be considered preliminary and subject to refinement until they have been tested as part of the formal NEPA scoping process. Many or most of the same individuals who were consulted in earlier meetings with representatives of agencies, Tribal organizations, non-governmental organizations, and stakeholder groups will participate in the scoping meetings and reviews, along with members of the public at large. The scoping process should be used as an opportunity to ground-truth the preliminary list of VECs and study area maps against experts and stakeholders who have resource-specific knowledge of the VECs and site-specific familiarity with the study areas. Scoping participants should be sought out and questioned closely to obtain feedback on the precision and accuracy of the work accomplished thus far. Proactive use of the scoping process in this way can help to ensure that the description of the affected environment, VECs, and study areas is accurate and that the supporting evidence is appropriate and complete. The scoping process should serve as the basis for further revision and refinement so that going forward, the alternatives analysis and impact assessments will be based on accurate information about the VECs and their study areas.

BPP5 – Comparative Impacts on Resources (Q7 and Q6), and Pertinent Issues and Impacts (Q10)

Background Information

Question 7 in the survey questionnaire invited respondee input relative to adequate features related to EAs. One topical category which was identified related to “Comparative Impacts on Resources”. This category included 107 comments across a

broad range of issues, including the need to systematically select issues and impacts, quantitatively document the anticipated changes (if possible), and use the findings when comparing alternatives. The term “hard look” was used by several respondees. Also, it was noted that the rationale for excluding certain issues should be described. Further, mitigation measures related to potential impact also need attention. Finally, it was mentioned that a thorough analysis of direct, indirect, and cumulative impacts on each selected resource, ecosystem, and human community should be accomplished. This concept is important since Question 6 addressed inadequacies in EAs, one of which was the absence of a “hard look” regarding specific types of impacts. In fact, this inadequacy was rated second in importance out of nine listed inadequacies.

Question 10 specifically noted the importance of selecting pertinent issues and impacts to be addressed in EAs, including a description of the selection process and the findings of the EA. Out of 242 respondees, 226 (93.4%) agreed with the statement that pertinent selected issues and impacts should be described in EAs. Further, 70 comments were received and categorized into five groups. Fifteen comments concurred with the above statements, and an additional 31 indicated qualified support thereof.

One of the received positive comments essentially captures the essence of Question 10 – “My yes response is to the idea that EAs need to focus on resources, ecosystems and communities that have the potential to be significantly impacted by the action. The EA should include a thorough description of the analysis done to determine the level of impact, and the use of thresholds to show how the impact is less than significant. It also needs to dismiss, with a short explanation, those resources, ecosystems or communities that cannot be significantly impacted by the action, but where there may be concern (e.g., dismissal of impacts to wetlands because a survey was done and no wetlands are present in the project area).”

BPP for Comparative Impacts on Resources

While concurrence exists on the need for selecting pertinent issues and impacts to be addressed in an EA, and for describing the selection process and outcomes, there is no single uniform list of resources, ecosystems, and human communities that should be considered across all agencies. A pertinent list is dependent upon the location of the study area, and the types of direct, indirect, and cumulative effects associated with the proposed project or activity. Further, it must be recognized that different agencies deal with different types of projects or activities. Accordingly, there is no single list (or checklist) of resources that would serve the needs of all agencies. Conversely, examples of issues and impacts could encompass changes in:

- Ecological systems
- Terrestrial, riparian, and aquatic resources
- Threatened, endangered, or protected species, and critical habitat

- Surface water and ground water hydrology and water quality
- Wetlands parameters
- Ambient air quality and climatological features
- Ambient noise levels
- Historical and cultural resources and related Federal laws and state programs
- Human population
- Land use
- Environmental justice issues
- Economic indicators
- Community infrastructure
- Etc.

Assemblage of an EA checklist of issues and impacts could be best accomplished by specific agencies. In fact, it is assumed that most agencies already utilize an agency specific checklist. Further, agencies should be encouraged to update their existing checklists; one approach would be to systematically review recent EAs prepared by the agency and the issues and impacts addressed therein.

BPP6 – Topical Outlines in EAs (Q11)

Background Information

This BPP is derived from the information from Question 11. Participants were asked if they agreed or disagreed with the following premises: (1) for an Enhanced EA, the EIS format in Section 1502.10 should be used; (2) for a Mitigated FONSI EA, the EIS format in Section 1502.10 should be used; however, the topical coverage could be reduced; and (3) for a Traditional (Small-Scale) EA, the topical outline in Section 1508.9(b) could be used with slight modification. Tabulated responses from 231 persons are included with Question 11 in Appendix E.

A total of 231 respondees provided their reactions to the three premises (see Appendix E). There was a general agreement (71.0%) that 40 CFR Section 1502.10 could provide an outline for Enhanced EAs, along with its intended use as an outline for EISs. For Traditional EAs, 84.8% of the respondees indicated that the brief outline in 40 CFR Section 1508.9(b) could be used and modified (expanded) as needed. For Mitigated FONSI EAs, the responses were closer in magnitude--54.3% agreeing and 45.7% disagreeing. The 77 received comments were divided into five categories, with

the first two either supporting (5 comments) or stating conditional support for the three postulates (26 comments). Several concerns related to the statements were identified in the third category (7 comments); along with 24 other comments, generally opposed to the statements, in the fourth category. Finally, 15 comments on Enhanced EAs were in the fifth category; these comments were generally in opposition to Enhanced EAs.

National Environmental Policy Act of 1969, § 2 et seq., 42 U.S.C.A. § 4321 et seq. does not address topical outlines in EAs. CEQ's regulations (discuss format and topics for EISs and EAs at 40 CFR 1502.10 for EISs, and at 40 CFR 1508.9(b) for EAs. The Council on Environmental Quality Regulations for Implementing the Procedural Provisions of the National Environmental Policy Act, 40 C.F.R. Pts. 1500-1508 (2011) [hereinafter NEPA regulations] {emphasis added}. The *Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations* address format issues in a general way at Question 25, Appendices; Question 26, Index; and Question 27, List of Preparers.

In addition, there are four other sources that address EA format or contents in some fashion. First is a memorandum from the CEQ Chairman to the Secretaries of Agriculture and Interior, December 9, 2002, subject: Guidance for Environmental Assessments for Forest Health Projects. This memorandum describes core elements of the EA process and provides the contents of a model forest health EA.

Second is The NEPA Task Force Report to the CEQ, *Modernizing NEPA Implementation*, September 2003 (revised 2004). Chapter 6 discusses EAs, including small and large EAs; checklists and forms; and recommendations.

Third is a memorandum from the CEQ associate director for NEPA oversight, subject: Emergency Actions and NEPA, September 8, 2005. This guidance followed closely after Hurricane Katrina hit southeast Louisiana on Monday August 29, 2005. Attachment 2 of the memorandum contains guidance on preparing focused, concise, and timely EAs. This guidance states that the core elements of an EA are:

- The need for the proposal,
- Alternatives as required by NEPA Section 102(2)(A),
- The environmental impacts of the proposed action and alternatives, and
- The agencies and persons consulted

These "core elements" are the same as described in 40 CFR 1508.9(b).

The last memorandum is from the CEQ Chair to the heads of all federal departments and agencies, May 12, 2010, subject: Emergencies and the National Environmental Policy Act. This guidance was issued shortly after the Macondo Well Blowout (also popularly known as the Deepwater Horizon Oil Spill) in the Gulf of Mexico, April 20, 2010. This document also has an Attachment 2, preparing focused, concise, and timely EAs, which is essentially the same guidance as in the above 2005 memorandum's Attachment 2 with the exception of some examples.

Finally, according to Judge Posner, *"an environmental assessment is a rough-cut, low-budget environmental impact statement designed to show whether a full-fledged environmental impact statement -- which is very costly and time-consuming to prepare and has been the kiss of death to many a federal project -- is necessary."* (*Cronin v. U.S. Dep't of Agric.*, 919 F.2d 439, 443 (7th Cir. 1990) (emphasis added).

Specific BPP for Topical Outlines in EAs

NEPA requires federal agencies to prepare an EIS prior to taking "major Federal actions significantly affecting the quality of the human environment." Some proposed federal actions categorically require the preparation of an EIS. If the proposed action does not categorically require the preparation of an EIS, the agency must prepare an EA to determine whether the action will have a significant effect on the environment. If the EA reveals that the proposed action will significantly affect the environment, then the agency must prepare an EIS. If the EA reveals no significant effect, the agency may issue a Finding of No Significant Impact (FONSI).

The most important thing in writing an EA is a clear analysis of impacts, rather than the format used. However, presentation of analysis is critically important to clarity. Even though the purpose, depth, and breadth of analysis differ between the levels of EAs, a common format should be useful. If the conclusion is reached that there is no significant impact, which is the case in most EAs, then that must be clearly supported in the analysis in the EA. If the EA reveals potential significant impacts, or uncertainties about significant impacts, then an EIS is needed.

To summarize, Traditional EA guidance comes directly from 40 C.F.R. § 1508.9(b). Four topics are noted: the need for the proposal, alternatives as required by NEPA Section 102(2)(A), the environmental impacts of the proposed action and alternatives, and the agencies and persons consulted.

In accordance with 40 C.F.R. § 1502.10, the recommended format for an EIS is:

- (a) Cover sheet.
- (b) Summary.
- (c) Table of contents.
- (d) Purpose of and need for action.
- (e) Alternatives including proposed action (sections 102(2)(C)(iii) and 102(2)(E) of the Act).
- (f) Affected environment.
- (g) Environmental consequences (especially sections 102(2)(C)(i), (ii), (iv), and (v) of the Act).
- (h) List of preparers.
- (i) List of Agencies, Organizations, and persons to whom copies of the statement are sent.
- (j) Index.

- (k) Appendices (if any).

This BPP recommends a hybrid, common format for all three levels of EAs. The analysis of issues with lesser importance or impacts can be reduced as necessary. The proposed format for EAs is:

1.0 Title page
2.0 Acronyms & abbreviations
3.0 Abstract
4.0 Executive summary
5.0 Purpose and need
6.0 Alternatives
7.0 Combined affected environment, environmental consequences, and cumulative effects sections
8.0 List of preparers
9.0 Agencies and persons consulted
10.0 References

BPP7 – Page Limits for Three Levels of EAs (Q12)

Background Information

A total of 240 people answered Question 12. Responses to Question 12 indicated a low level of support for page limits for the three levels of EAs posed in Question 8. Specifically, 71 out of 240 respondees (30%) supported the concept of having page limits for the three levels of EAs; however, 169 respondees (70%) did not support the concept of page limits for the three levels of EAs. In addition, 103 people (43%) provided comments.

Forty comments indicated ranges of pages, with the typical pattern involving smaller page limit ranges for small scale EAs, and larger page limit ranges for mitigated FONSI EAs, and Super EAs, respectively. Thirty-two commenters actually specified pages limits or ranges of page limits for the three levels of EAs listed in question 8, which are named *"Traditional EAs," "Mitigated FONSI EAs,"* and *"Enhanced EAs."* After transforming and/or averaging the page limits as specified by the commenters the page limits suggested are 39, 81, and 149 pages, respectively, for the three levels of EAs. Twenty-eight concerns were identified in the category entitled "Concerns Regarding Ranges of Page Limits". Many of the concerns related to the uniqueness of proposed projects and their location and study requirements. Thirty-three "Other Related Comments" were also provided. These comments provide a range of perspectives and opinions on the subject. The "ranges of page limits" topic is important; however, the first priority for BPPs should be focused on the purpose and need and a reasonable range of alternatives given the substantive context of EAs, including the clear delineation and rationale for concluding "no significant impacts".

National Environmental Policy Act of 1969, § 2 et seq., 42 U.S.C.A. § 4321 et seq. does not address page limits for EAs. However, the CEQ at 40 C.F.R. § 1502.7 states the following page limits concerning EISs: *"The text of final environmental impact statements (e.g., paragraphs (d) through (g) of Sec. 1502.10) shall normally be less than 150 pages and for proposals of unusual scope or complexity shall normally be less than 300 pages."* The Council on Environmental Quality Regulations for Implementing the Procedural Provisions of the National Environmental Policy Act, 40 C.F.R. §§ 1500-1508 (2011) [hereinafter NEPA regulations] {emphasis added}.

In addition, The *Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations* does address page limits for EAs in question 36a by suggesting EAs should approximately be 10-15 pages. Furthermore, question 36b states that agencies should avoid preparing lengthy EAs except in complex cases. Lastly, question 36b tells us that in most cases a lengthy EA indicates the need for an EIS.

Insofar as we could determine in this study, there are no court cases involving page limits for EAs.

Based upon analysis of the above Questionnaire findings, we concluded that a BPP for addressing page limits for the three levels of EAs should be prepared.

Specific BPP for Three Levels of EAs

All EAs should contain concise, focused analysis regardless of the number of pages. EAs must show that the proponent took a hard look at the proposed action, possible alternatives, and impacts to the affected resources. What follows in Table 14 is a *recommended target maximum* number of pages for each level of EA. These page limits are recommendations only because there will likely be agency- and case-specific reasons to deviate from them.

Table 14: Target Page Limits for Three Levels of EAs

	Traditional EA	**Mitigated FONSI EA**	**Enhanced EA**
	Small-scale, 1 Project EA	**Medium-scale, multi-project EA**	**Large-scale, Programmatic or Consolidated EA**
Recommended target maximum page limits	**40**	**80**	**150**

BPP8 – Cumulative Effects Assessment and Management (Q7 and Q6)CEAM for Three Levels of EAs (Q19)

Background Information

Responses to Question 6 (inadequacies in EAs) indicated that the absence of a hard look regarding specific types of impacts (including cumulative impacts) was a highly rated inadequacy. Four CEAM-related comments on Question 6 noted that inadequacies ranged from no attention to insufficient attention to the subject. On the positive side, Question 7 included 16 comments on good features within EAs which are generally focused on the importance of addressing cumulative impacts, documenting the results, and describing the rationale for finding no cumulatively significant impacts.

Responses to Question 19 indicated strong support for addressing cumulative impacts in all three levels of an EA. Specifically, 72.8% of 233 respondees supported some consideration and documentation of cumulative impact concerns, if any, for Traditional (small-scale) EAs. Higher percentages of support for more thorough consideration of cumulative impacts were noted for Mitigated FONSI EAs (82.8%) and for Enhanced EAs (91.4%).

Regarding CEQ's NEPA regulations, cumulative impacts (effects) is defined in Section 1508.7 and included as an intensity factor in defining the term significantly (Section 1508.27 (b)(7). Cumulatively significant impacts could be a trigger for requiring preparation of an EIS rather than an EA. Further, in 1997 CEQ released a report entitled, "Considering Cumulative Effects Under the National Environmental Policy Act". It contains an 11-step CEAM process which is primarily related to EISs. Use of a subset of the steps (Steps 1-4 and 7-9) and topics within these steps could provide a frame-work for consideration of CEAM at an EA level, and for determining if cumulatively significant impacts are of concern.

Finally, a growing number of Court cases involving EAs have included plaintiff claims that proponent agencies have either inadequately addressed cumulative impacts, or not considered such impacts at all, or included unsubstantiated statements regarding no cumulative impacts.

Based upon these Questionnaire findings, it was concluded that a BPP for addressing CEAM in EAs should be prepared.

Specific BPP for CEAM

When addressing cumulative impacts within any level of an EA, begin by informally identifying resources, ecosystems, and human communities (hereafter referred to by the single word resources) that will be affected by direct and indirect effects of the proposed action and alternatives. Designate preliminary spatial and

temporal (past to future) boundaries to be considered for resources within the EA. Consider the occurrence and/or status of past, current, or future actions, within the spatial and temporal boundaries, which have or could contribute to effects on the same resources as for the proposed action and alternatives. If no other actions are expected to contribute to effects, these findings from Steps 1 to 4 in the CEQ's CEAM guidance can be summarized. If other actions become of concern, determine the historical to current conditions of the affected resources (Steps 5 to 7). If the conditions are not currently stressed, and if the contributed effects from the proposed action (and alternatives) and other actions are minimal, then document these findings and indicate that no cumulatively significant impacts will occur. If concerns are identified relative to cumulatively significant effects, identify implementable and effective mitigation measures for the direct and indirect effects of the proposed action and alternatives (Steps 8 to 10). If the remaining effects are still cumulatively significant, consider the development of a collaborative program with other Federal agencies to encourage better management of contributions from other actions (Step 11). If cumulative impact concerns still remain following these mitigation and management activities, then consider the preparation of an EIS.

BPP9 – Regulatory/Coordination/Consultation/Compliance (Q7 and Q6)

Background Information

Question 6 asked participants, based on their general NEPA knowledge and EA experience, to prioritize the relative importance of certain inadequacies identified with litigation and public comments and criticisms on specific EAs. Participants used a numbering scale of 1 to 3, with 1 denoting highly important, 2 denoting medium importance, and 3 indicating minor importance. Two inadequacies were identified in question 6 specifically relating to omission or inadequate agency coordination: one having to do with the Endangered Species Act (ESA) and the other concerning cultural resources laws such as the Natural Historic Preservation Act (NHPA). A total of 279 respondees answered the part of question 6 relating to ESA coordination. The rating average for ESA coordination was 1.86, which means it fell somewhere between highly and medium importance -- 102 participants (36.6%) rated this highly important, 114 participants (40.9%) rated it as medium importance, and 63 participants (22.6%) rated it as minor importance. In addition, 34 respondees (12%) provided comments.

Question 7 asked respondees to list three features, based on their general NEPA knowledge and EA experience, which are typically associated with adequate EAs. Of the total 269 responses to this question, there were 30 comments specifically directed toward regulatory integration and/or coordination for adequate EAs.

NEPA addresses integration in Section 102(2)(A), all agencies of the Federal Government *shall "utilize a systematic, interdisciplinary approach that will insure the integrated use of the natural and social sciences and the environmental design arts in planning and decision making…"* National Environmental Policy Act of 1969, § 2 et seq., 42 U.S.C.A. § 4321 et seq. (emphasis added). Furthermore, Section 102(2)(C)

states, *"Prior to making any detailed statement, the responsible federal official shall consult with and obtain the comments of any federal agency which has jurisdiction by law or special expertise with respect to any environmental impact involved."* Section 102(2)(G) states that all agencies of the Federal Government *shall "make available to States, counties, municipalities, institutions, and individuals, advice and information useful in restoring, maintaining, and enhancing the quality of the environment…"* In addition, Section 104 states, *"Nothing in section 102 [42 U.S.C. § 4332] or 103 [42 U.S. C. § 4333] shall in any way affect the specific statutory obligations of any Federal agency (1) to comply with criteria or standards of environmental quality, (2) to coordinate or consult with any other Federal or State agency, or (3) to act, or refrain from acting contingent upon the recommendations or certification of any other Federal or State agency."*

CEQ's regulations (40 C.F.R. *§§* 1500-1508) concerning NEPA integration and coordination are contained in 40 CFR 1500.2(c), Policy, *"Federal agencies shall to the fullest extent possible…"*; 1500.5, Reducing delay, *"Agencies shall reduce delay by…"*; 1501.2, Apply NEPA early in the process, *"Agencies shall integrate the NEPA process…"*; 1501.6, Cooperating agencies; 1502.25(a) and (b), Environmental review and consultation requirements, *"To the extent possible, agencies shall prepare draft environmental impact statements concurrently with and integrated with…"*; and 1506.2, Elimination of duplication with state and local procedures.

The *Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations* address integration and coordination in Question 8, Early Application of NEPA; Question 14, Rights and Responsibilities of Lead and Cooperating Agencies; Question 22, State and Federal Agencies as Joint Lead Agencies; and Question 23, Conflicts of Federal Proposals with Land Use Plans.

In addition, there are various Executive Orders that require integration and coordination, such as Executive Order 12898, Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations. This particular Executive Order on Environmental Justice (EJ) has gotten presidential attention since 2009 and Plan EJ 2014 is a roadmap that will help EPA integrate environmental justice into the Agency's programs, policies, and activities. Plan EJ 2014 identifies Cross-Agency Focus Areas, Tools Development, and Program Initiatives as three essential elements that will advance environmental justice across the EPA and the federal government. Plan EJ 2014 is named in recognition of the 20th anniversary of President Clinton's issuance of Executive Order 12898, February 11, 1994.

A few courts address NEPA integration and coordination in cases involving the systematic, interdisciplinary approach to integrating environmental values in decision making. *"If an agency decides not to prepare an EIS, a court may find it has violated paragraph 102(2)(A) of NEPA if it has not fully consulted experts or other agencies whose expertise is relevant to the agency's action." See McDowell v. Schlesinger, 404*

F. Supp. 221, (W.D. MO 1975), involving an Air Force base closing where the agency only consulted an industrial health expert." [17]

Specific BPP for Regulatory/Coordination/Consultation/Compliance

The requirement to integrate NEPA with other laws is based on reducing delay; avoiding duplication; making decisions based on understanding of environmental consequences; and taking actions that protect, restore, and enhance the environment. Without integration of other legal requirements into the NEPA process, laws would be satisfied sequentially rather than simultaneously and could result in different or conflicting conclusions resulting in unnecessary environmental harm. What follows is an eight-step approach for accomplishing NEPA integration and coordination.

- Make a thorough, clear, concise record of all coordination efforts.
- Identify early external entities and parties that may need to be consulted.
- Consult early with state, local, and federal agencies, and tribes, to determine if they have any jurisdiction and/or to what degree they have a stake in the outcome of the proposed action.
- Request the participation of cooperating agencies (40 CFR 1501.6) at the earliest possible time.
- For those agencies (as defined in 40 CFR 1508.12) that have jurisdiction, and/or a stake in the outcome, document their specific processes and designate major decision points (40 CFR 1505.1).
- Discuss all extraordinary circumstances and cumulative impacts of the proposed action and alternatives.
- Conduct meetings with the U.S. Fish and Wildlife Service and/or the National Marine Fisheries Service to discuss ESA Section 7 consultations and/or MMPA issues. Also, include NHPA section 106 consultations with SHPO.
- Conduct SAFETEA-LU Section 4(f) meetings when applicable.

BPP10 – Systematic Determinations of Significance of Impacts (Q7 and Q6); and Impact Significance Determinations (Q13)

Background Information

[17] Daniel R. Mandelker, *NEPA Law and Litigation*, Second Edition, Rel. 9, 7/2011. Section 6.2. Thomson Reuters/West.

Information used to support development of a BPP for determining impact significance was based primarily on the questionnaire survey results and on the 1978 CEQ regulations implementing NEPA, specifically 40 CFR 1508.27.

Responses to Question 6, which asked respondees to prioritize inadequacies of EAs, identified “No clear delineation of impact significance” as the most important concern to the survey respondees. This inadequacy received an average rating of 1.52, between first and second on the importance scale and the highest importance rating among all of the listed inadequacies. In addition, one respondent to Question 6 identified “Lack of quantification of impacts” as an inadequacy of EAs. This relates to the determination of impact significance because some type of rating is necessary to establish a significance threshold and to determine whether the impact exceeds the threshold.

Responses to Question 7, which asked respondees to list three features which are typically associated with adequate EAs, included 28 comments pertaining directly to the determination of impact significance. The 28 comments were then grouped into six distinct features of adequate EAs pertaining to determining impact significance:

- Demonstration of a logical basis for the significance determination
- Clear definition of an appropriate and relevant significance threshold for each VEC (Valued Ecosystem Component)
- Where feasible and appropriate, connection of the significance determination to a specific, relevant, and applicable regulatory or human health/ecological threshold
- Use of methods that ensure unambiguous significance determinations
- Use of defensible, up-to-date evidence and data to support the significance determination
- Clear explanation and presentation of the rationale supporting each conclusion regarding impact significance

Section 1508.27 of the 1978 CEQ regulations implementing NEPA (40 CFR §§1500-1508) defines the term *Significantly* and provides substantial detail. In full, Section 1508.27 states:

> "Significantly" as used in NEPA requires considerations of both context and intensity:
>
> (a) Context. This means that the significance of an action must be analyzed in several contexts such as society as a whole (human, national), the affected region, the affected interests, and the locality. Significance varies with the setting of the proposed action. For instance, in the case of a site-

specific action, significance would usually depend upon the effects in the locale rather than in the world as a whole. Both short- and long-term effects are relevant.

(b) Intensity. This refers to the severity of impact. Responsible officials must bear in mind that more than one agency may make decisions about partial aspects of a major action. The following should be considered in evaluating intensity:

1. Impacts that may be both beneficial and adverse. A significant effect may exist even if the Federal agency believes that on balance the effect will be beneficial.

2. The degree to which the proposed action affects public health or safety.

3. Unique characteristics of the geographic area such as proximity to historic or cultural resources, park lands, prime farmlands, wetlands, wild and scenic rivers, or ecologically critical areas.

4. The degree to which the effects on the quality of the human environment are likely to be highly controversial.

5. The degree to which the possible effects on the human environment are highly uncertain or involve unique or unknown risks.

6. The degree to which the action may establish a precedent for future actions with significant effects or represents a decision in principle about a future consideration.

7. Whether the action is related to other actions with individually insignificant but cumulatively significant impacts. Significance exists if it is reasonable to anticipate a cumulatively significant impact on the environment. Significance cannot be avoided by terming an action temporary or by breaking it down into small component parts.

8. The degree to which the action may adversely affect districts, sites, highways, structures, or objects listed in or eligible for listing in the National Register of Historic Places or may cause loss or destruction of significant scientific, cultural, or historical resources.

9. The degree to which the action may adversely affect an endangered or threatened species or its habitat that has been determined to be critical under the Endangered Species Act of 1973.

10. Whether the action threatens a violation of Federal, State, or local law or requirements imposed for the protection of the environment.

To summarize, results of the 2012 survey identified “No clear delineation of impact significance” as the most important inadequacy of NEPA EAs. Their comments also identified six positive features associated with the adequate determination of impact significance. These features emphasized logic, transparency, precision, use of appropriate thresholds, currency and defensibility of supporting data, and clear and complete exposition of the rationale supporting every significance determination. The survey results also provide insight into the concerns and values of public and private sector NEPA practitioners which can guide the development of BPPs for significance determination. In addition, Section 1508.27 provides regulatory guidance which not only informs best practice principles but also imposes a compliance responsibility on NEPA practitioners. Finally, the responses to Question 13 indicated that significance determination was important for all three levels of EAs. The bottom line from Question 13 was that preparers of EAs should document the use of Section 1508.27 as a means to conclude a FONSI. Reviewers of EAs should note the usage or non-usage of Section 1508.27, and recommend/require, as needed, its incorporation.

The following sub-section recommends several supporting BPPs for the determination of impact significance in NEPA EAs. They are based on Section 1508.27 and synthesize the relevant concerns and topics identified by the 2012 survey respondees. Each specific principle is written as a single sentence on which a best practice procedure can be based, tailored to the user’s particular lead agency or agencies, the proposed action, and the potentially affected resources. A brief discussion follows each recommended specific principle.

<u>Specific BPPs for Determining Impact Significance in EAs</u>

1. Significance is based on the context and the intensity of the impact, per 40 CFR 1508.27.

   Section 1508.27 defines the term *Significantly* and establishes that impact significance determinations must be based on the dual consideration of *context* and *intensity*. A systematic, transparent, and repeatable approach is necessary to create significance criteria that combine context and intensity in functional, appropriate, and understandable ways. Use Section 1508.27 and its explanatory discussions of context and intensity as the starting point for developing impact assessment approaches and significance criteria. This is not a trivial task and is one of the more challenging aspects of NEPA compliance. Section 1508.27 provides advice on both components, including 10 factors which should be considered when establishing intensity scales and thresholds. The EA budget and schedule should reflect the labor-intensive and time-consuming procedures required to formulate well-founded significance criteria, because they are essential for a legally and technically defensible EA.

2. Criteria for impact significance are VEC-specific.

   As noted in BPP No. 4, the term *valued environmental component*, or VEC, is increasingly used in NEPA practice because it provides a convenient way to prioritize and focus the emphasis of impact assessment on physical, biological, and social resources that are *valued* by people at the international, national, regional, or local level. The fact that a resource is valued provides the basis for its inclusion in the EA as a subject for impact assessment. Every VEC has one or more vulnerable features which the impact assessment approach and significance criteria must take into account. For this reason, impact significance criteria must be VEC-specific, and the context component of the significance criterion is based, at least in part, on the reason why the VEC is valued. This means, for example, that impact significance criteria for a biological species might not be based solely on biology, but could include social criteria relating to subsistence, recreational, or aesthetic considerations.

3. Significance thresholds are precise and unambiguous.

   Significance thresholds can be quantitative or qualitative, but in either case they must be precise and yield an unequivocal yes-or-no determination of significance. The threshold cannot be arbitrary or based solely or primarily on professional judgment; it must be based on evidence about the relevant vulnerable feature or features of the VEC. To set a precise point on a scale which reflects both context and intensity, a decision must be made that will be defensible under expert scrutiny. If applicable regulatory thresholds apply, such as for air quality, water quality, noise, contaminants, *take* as defined by the Endangered Species Act, etc., use them; they already incorporate the necessary considerations of context and intensity and are supported by legal precedent.

4. Significance determination is built on logic and evidence.

   The EA must explain and present the significance determination for each impact in a way that makes the underlying reasoning transparent and is supported by information from agency and public scoping, documented studies and literature reviews, and where necessary original data obtained from surveys or field studies. Supporting evidence must be reliable and up to date. If supporting evidence is incomplete or unavailable, follow Section 1502.22, Incomplete or unavailable information, and include (1) a statement that the information is incomplete or unavailable; (2) a statement of the relevance of the incomplete or unavailable information to evaluating reasonably foreseeable significant adverse impacts on the VEC; (3) a summary of existing credible scientific evidence which is relevant to evaluating significant adverse impacts on the VEC; and (4) the evaluation of such impacts based upon theoretical approaches or research methods generally accepted in the scientific community (partial paraphrase of 40 CFR §1502.22).

5. Reasoning supporting significance determination is fully explained and clearly presented.

   The significance determination for each VEC must be based on logic and evidence. Accomplishing this, however, is not sufficient to ensure an adequate EA. The reasoning and supporting evidence must be transparent, understandable, accessible, and verifiable to the reviewer. This means that both *explanation* and *presentation* are crucial to a successful EA. The reviewer must be able to follow the rationale supporting each conclusion regarding impact significance, even if he or she disagrees with the conclusion. Clear and concise writing, effective graphics, and thorough referencing of source material are all necessary to ensure that the supporting rationale and evidence for the significance determination are adequately demonstrated. See BPP No. 14, Principles of Scientific Writing and Communication, for further information.

BPP11 – Identification of Mitigation Measures and Monitoring (Q7 and Q6)

Background Information

Question 6 on inadequacies in EAs included two listed items related to mitigation measures and related monitoring. The first one involved concerns regarding the actual effectiveness of mitigation measures, and the second one dealt with practical concerns for the implementation of impact mitigation measures. The number of respondees to these two items included 277 and 278, respectively. The resultant “rating averages” reflect the overall importance of each listed inadequacy. In this case, the lower rating averages denote that the inadequacies are more important, and they infer that attention should be given to improving on the inadequacies. Another perspective is that BPPs should be identified to address such inadequacies. The rating averages from the lowest (most important inadequacy) to the highest (least most important inadequacy, but not to be ignored) include the following:

1.52 – No clear delineation of impact significance

1.73 – Concerns regarding the implementation of impact mitigation measures

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1.79 – Concerns regarding the effectiveness of impact mitigation measures

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1.95 – Poor writing and editing

The two listed concerns above are third and fifth in the nine listed inadequacies. These two items need to be considered and melded into one BPP.

Comments received on Question 7 included one composite category entitled "Identification of Mitigation Measures and Related Monitoring"; a total of 35 comments were recorded. The rich diversity of comments were particularly related to the two above listed inadequate items. Examples of such comments addressed the need to relate mitigation measures to reductions in the significance of anticipated impacts. Other comments suggested the need to clearly identify and describe such measures and their relative advantages and disadvantages. Also noted were needs for the funding for systematic design and effectiveness monitoring of such measures. These comments certainly contain practical relevance to this subject.

Specific BPP for Identification of Mitigation Measures and Monitoring

On January 14, 2011, CEQ issued guidance on the incorporation of mitigation and monitoring in NEPA compliance documents (EAs and EISs), including specific attention to mitigated FONSIs. Of particular interest herein is the guidance on inclusion of mitigation and monitoring in EAs, and on commitments for implementation of such topics in mitigated FONSIs (Council on Environmental Quality, 2011). Because of the current nature and focus of this guidance, it is anticipated that portions of the guidance could be directly used as a BPP for this topic. More specifically, the following seven topics from the guidance are listed below. They could serve as foundation items for this BPP. Further, some of them refer to the use of adaptive management (BPP13). The seven topics include (Council on Environmental Quality, 2011):

- Mitigation commitments in an EA to support a mitigated FONSI (page 7) – When preparing an EA, many agencies develop and consider committing to mitigation measures to avoid, minimize, rectify, reduce, or compensate for potentially significant adverse environmental impacts that would otherwise require full review in an EIS. … An agency should not commit to mitigation measures necessary for a mitigated FONSI if there are insufficient legal authorities, or it is not reasonable to foresee the availability of sufficient resources, to perform or ensure the performance of the mitigation … Mitigation commitments needed to lower the level of impacts so that they are not significant should be clearly described in the mitigated FONSI document and in any other relevant decision documents related to the proposed action. Agencies must provide for appropriate public involvement during the development of the EA and FONSI.

- Ensuing implementation of mitigation commitments (pages 8-9) – Federal agencies should take steps to ensure that mitigation commitments are actually implemented. Consistent with their authority, agencies should establish internal processes to ensure that mitigation commitments made on the basis of any NEPA analysis are carefully documented and that relevant funding, permitting, or

other agency approvals and decisions are made conditional on performance of mitigation commitments. … Mitigation commitments should be carefully specified in terms of measurable performance standards or expected results, so as to establish clear performance expectations. … CEQ views funding for implementtation of mitigation commitments as critical to ensuring informed decision-making. For mitigation commitments that agencies will implement directly, CEQ recognizes that it may not be possible to identify funds from future budgets; however, a commitment to seek funding is considered essential and if it is reasonably foreseeable that funding for implementation of mitigation may be unavailable at any time during the life of the project, the agency should disclose in the EA or EIS the possible lack of funding and assess the resultant environmental effects.

- Establishing a mitigation monitoring program (pages 9-11) – Adaptive management can help an agency take corrective action if mitigation commitments originally made in NEPA and decision documents fail to achieve projected environmental outcomes and there is remaining federal action. … Monitoring is fundamental for ensuring the implementation and effectiveness of mitigation commitments, meeting legal and permitting requirements, and identifying trends and possible means for improvement. … An agency should also commit to mitigation monitoring in important cases when relying upon an EA and mitigated FONSI. Monitoring is essential in those important cases where the mitigation is necessary to support a FONSI and thus is part of the justification for the agency's determination not to prepare an EIS. … Once an agency determines that it will provide for monitoring in a particular case, monitoring plans and programs should be described or incorporated by reference in the agency's decision documents. … Regardless of the method chosen, agencies should ensure that the monitoring program tracks whether mitigation commitments are being performed as described in the NEPA and related decision documents (i.e., implementation monitoring), and whether the mitigation effort is producing the expected outcomes and resulting environmental effects (i.e., effectiveness monitoring). Agencies should also ensure that their mitigation monitoring procedures appropriately provide for public involvement.

- Monitoring mitigation implementation (page 12) – A successful monitoring program will track the implementation of mitigation commitments to determine whether they are being performed as described in the NEPA documents and related decision documents. The responsibility for developing an implementation monitoring program depends in large part upon who will actually perform the mitigation – the lead Federal agency or cooperating agency; the applicant, grantee, or permit holder; another responsible entity or cooperative non-Federal partner; or a combination of these. Effectiveness monitoring tracks the success of a mitigation effort in achieving expected outcomes and environmental effects. … When monitoring mitigation, agencies should consider drawing on sources of information available from the agency, from other Federal agencies, and from state, local, and tribal agencies, as well as from non-governmental sources such

as local organizations, academic institutions, and non-governmental organizations.

- Monitoring the effectiveness of mitigation (page 12) – Effectiveness monitoring tracks the success of a mitigation effort in achieving expected outcomes and environmental effects … When monitoring mitigation, agencies should consider drawing on sources of information available from the agency, from other Federal agencies, and from state, local, and tribal agencies, as well as from non-governmental sources such as local organizations, academic institutions, and non-governmental organizations.

- Public involvement in mitigated FONSIs (page 13) – Public involvement is a key procedural requirement of the NEPA review process, and should be fully provided for in the development of mitigation and monitoring procedures. …The CEQ Regulations also require agencies to involve the public in the EA preparation process to the extent practicable and in certain cases to make a FONSI available for public review before making its final determination on whether it will prepare an EIS or proceed with the action. Consequently, agencies should involve the public when preparing EAs and mitigated FONSIs. … Beyond these requirements, agencies are encouraged to make proactive, discretionary release of mitigation monitoring reports and other supporting documents, and to make responses to public inquiries regarding mitigation monitoring readily available to the public through online or print media. … In some cases, agencies may need to balance competing privacy or confidentiality concerns (e.g., protecting confidential business information or the location of sacred sites) with the benefits of public disclosure.

- Remedying ineffective or non-implemented mitigation (page 14) – Through careful monitoring, agencies may discover that mitigation commitments have not been implemented, or have not had the environmental results predicted in the NEPA and decision documents. Agencies, having committed to mitigation, should work to remedy such inadequacies. … If a mitigation commitment is simply not undertaken or fails to mitigate the environmental effects as predicted, the responsible agency should further consider whether it is necessary to prepare supplemental NEPA analysis and documentation.

BPP12 – Climate Change and Three Levels of Impacts (Q20)

Background Information

This BPP is derived from the information gathered and analyzed from Question 20. This question told respondents that addressing climate change in NEPA compliance documents has been increasing, particularly regarding EISs. Furthermore, Question 20 made three statements concerning climate change analysis and the three levels of EAs, then asked if respondents agreed: (1) For Enhanced EAs, it may be expedient to develop greenhouse gas emissions inventories and also to consider the effects and

consequences of climate change in the area wherein preferred alternatives will be located, (2) For mitigated FONSI EAs there may be a need to address both inventories and locational climate change effects and their implications for the preferred alternatives, and (3) For Traditional EAs there may not be a requirement for any specific analyses of climate change.

A total of 236 respondees answered Question 20. Out of the 236 respondees, 130 (55%) answered “yes” to the three statements above, which meant they agreed. A total of 106 respondees (45%) answered “no” to the three statements, meaning they disagreed. In addition, 110 respondees provided comments on climate change analysis in EAs.

The overall response was positive for including climate change in EA analysis (55.1%); however, 44.9% indicated a negative response. The fact that CEQ has not finalized its draft guidance entitled “Consideration of the Effects of Climate Change and Greenhouse Gas Emissions” (published on February 18, 2010) may have influenced the overall percentage responses noted above. The 110 received comments were divided into groups entitled Support for Climate Change Analysis in EAs (19 comments), Qualified Support for Climate Change Analysis in EAs (55 comments, with many of them noting the need for additional information), Concerns Related to Climate Change Analysis in EAs (19 comments), and Other Comments (17 comments). Again, the majority of comments were favorable; and informational needs and other issues were identified.

Neither NEPA nor the CEQ’s regulations implementing NEPA, nor the *Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations* discuss climate change in a direct fashion. However, NEPA, Section 102(2)(F), requires Federal agencies to support international cooperation by recognizing *“the global character of environmental problems and, where consistent with the foreign policy of the United States, lend appropriate support to initiatives, resolutions, and programs designed to maximize international cooperation in anticipating and preventing a decline in the quality of mankind’s world environment.”*

Climate Change 2007: Synthesis Report, Summary for Policy Makers, November 2007, begins by stating *“ Warming of the climate system is unequivocal, as is now evident from observations of increases in global average air and ocean temperatures, widespread melting of snow and ice and rising global average sea level.”* (p.2)

Executive Order (EO) 13514, "Federal Leadership in Environmental, Energy, and Economic Performance," was signed by President Obama on 5 October, 2009. The goal of EO 13514 is *"to establish an integrated strategy towards sustainability in the Federal Government and to make reduction of greenhouse gas emissions (GHG) a priority for Federal agencies."* The GHGs targeted for emission reductions in EO 13514 are:

- Carbon dioxide (CO2);
- Methane (CH4);

- Nitrous oxide (N2O);
- Hydrofluorocarbons (HFCs);
- Perfluorocarbons (PFCs); and
- Sulfur hexafluoride (SF6).

Courts have addressed climate change analysis in EAs. In one case, *Hapner v. Tidwell,* 621 F.3d 1239 (9th Cir. 2010), environmental groups brought action against the Forest Service, alleging that project authorizing commercial logging and prescribed burning of national forest violated, *inter alia,* the National Environmental Policy Act (NEPA). The environmental advocacy groups argued that the agency failed to discuss global warming in the EA, pointing to agency guidance directing the it to incorporate climate change analysis into its evaluations of projects. The agency guidance also clarified that proposals require no discussion if they are of a "minor scale [so] that the direct effects would be meaningless." The court held that the Forest Service adequately considered impacts of prescribed burning project on climate change in proportion to its significance, given that small amount of land involved would have meaningless impact on climate change.

In another case, *Earth Island Institutev. Gibson, 834 F.Supp.2d 979 (E.D.Cal.,2011),* environmental advocacy groups alleged that the Forest Service violated NEPA, in part, by failing to take the requisite "hard look" in the final EA at "the adverse effects [the Angora Project] will have on the Black-backed Woodpecker (BBWP), future fire behavior, and climate change." The court held that the climate change analysis was adequate, as the agency's EA, which included a computation of the estimated greenhouse gas emissions, discussed the project's change impact in proportion to its significance.

Another recent case, *Barnes v. U.S. Dep't of Transp.*, 655 F. 3d 1124 (9th Cir. 2011), involved a challenged to an EA, prepared by the FAA, analyzing the proposed construction by the Port of Portland of a new runway at Hillsboro Airport in Oregon. Plaintiffs argued that the decision not to prepare an EIS was unreasonable for several reasons, one of which was that the EA was deficient because its analysis of greenhouse The court rejected plaintiffs' argument that the EA was deficient because its analysis of greenhouse gases was not specific to the locale, and the court explained that "the effect of greenhouse gases on climate is a global problem; a discussion in terms of percentages is therefore adequate for greenhouse gas effects," and upholding the EA on this point (but ultimately remanded the EA to the agency for other deficiencies).

Based upon analysis of the above Questionnaire findings and background information, it was concluded that a BPP for addressing climate change for EAs should be prepared. The concepts in the CEQ's February 18, 2010, draft guidance on climate change analysis could be extended for use in EAs and is suggested herein. The issuance of final guidance on climate change analysis could also include relevance to EAs.

<u>Specific BPP Climate Change Analysis for EAs</u>

Based primarily on the scientific assessments of the U.S. Global Change Research Program (USGCRP) and the National Research Council (NRC), EPA has issued a finding that the changes in climate caused by GHG emissions endanger public health and welfare (Endangerment and Cause or Contribute Findings for Greenhouse Gases Under Section 202(a) of the Clean Air Act, December 15, 2009, 74 Fed. Reg. 66496). Ambient concentrations of GHGs do not cause direct adverse health effects (such as respiratory or toxic effects), but public health risks and impacts as a result of elevated atmospheric concentrations of GHGs occur via climate change. 74 Fed. Reg. at 66497-98.

The core issue here is the potential for the generation of climate change impacts from, or on, the proposed action, not the level of EA. CEQ's draft guidance entitled *"Consideration of the Effects of Climate Change and Greenhouse Gas Emissions"* (published on February 18, 2010), cited extensively above, is a useful and reasonable approach. As such, it should serve as the conceptual basis for climate change analysis in all three levels of EAs (see BBP No.1 above).

EAs must explain why climate change is, or is not, germane to the particular proposed action. EAs are the most numerous type of NEPA document. While accurate numbers are not available, EAs outnumber EISs by at least a factor of 100, probably much more. As such, environmental degradation may be induced by the "tyranny of small decisions" wherein a series of small, apparently unconnected decisions, are made with the end result that an accumulation of these small decisions effect the local, regional, and global environment without the larger issues being specifically addressed at higher levels of decision making. This may be particularly true for vulnerable populations or ecologically sensitive areas.

Federal agencies must ensure the scientific and professional integrity of their assessment of the ways in which climate change is affecting or could affect environmental effects of the proposed action. Agencies should use the scoping process to set reasonable spatial and temporal boundaries for this assessment and focus on aspects of climate change that may lead to changes in the impacts, sustainability, vulnerability and design of the proposed action and alternative courses of action.

Where the proposed activity is subject to GHG emissions accounting requirements, such as Clean Air Act reporting requirements that apply to stationary sources that directly emit 25,000 metric tons or more of CO_2-equivalent GHG on an annual basis, the agency should include this information in the EA for consideration by decision makers and the public.

In the analysis of direct effects, it would be appropriate to: (1) quantify cumulative emissions over the life of the project; (2) discuss measures to reduce GHG emissions, including consideration of reasonable alternatives; and (3) qualitatively discuss the link between such GHG emissions and climate change.

However, it is not currently useful for the NEPA analysis to attempt to link specific climatological changes, or the environmental impacts thereof, to the particular project or emissions; as such direct linkage is difficult to isolate and to understand. The estimated level of GHG emissions can serve as a reasonable proxy for assessing potential climate change impacts, and provide decision makers and the public with useful information for a reasoned choice among alternatives.

In some instances, the GHG emissions of the proposed action may be so small as to be a negligible consideration. Agencies should identify in the cumulative effects assessment those actions for which GHG emissions and other environmental effects are neither individually or cumulatively significant.

To describe the impact of an agency action on GHG emissions, once an agency has determined that this is appropriate, agencies should consider quantifying those emissions using the following technical documents, to the extent that this information is useful and appropriate for the proposed action being analyzed in the EA:

- For quantification of emissions from large direct emitters: 40 CFR Parts 86, 87, 89, et al. Mandatory Reporting of Greenhouse Gases; Final Rule, U.S. Environmental Protection Agency (74 Fed. Reg. 56259-56308). Note that "applicability tools" are available (http://www.epa.gov/climatechange/emissions/GHG-calculator/) for determining whether projects or actions exceed the 25,000 metric ton of CO_2-equivalent greenhouse gas emissions.

- For quantification of Scope 1 emissions at Federal facilities: *Federal Greenhouse Gas Accounting and Reporting Guidance*, October 6, 2010.

- For quantification of emissions and removals from terrestrial carbon sequestration and various other project types: Technical Guidelines, Voluntary Reporting of Greenhouse Gases, (1605(b) Program, U.S. Department of Energy (http://www.eia.doe.gov/oiaf/1605/))

For sources of the best available scientific information on reasonably foreseeable climate change impacts, Federal agencies may summarize and incorporate by reference the Synthesis and Assessment Products of the U.S. Global Change Research Program (USGCRP, http://www.globalchange.gov/publications/reports/scientific-assessments/saps), and other major peer-reviewed assessments from USGCRP . Particularly relevant is the report on climate change impacts on water resources, ecosystems, agriculture and forestry, health, coastlines and arctic regions in the United States. Global Climate Change Impacts in the United States (http://www.globalchange.gov/publications/reports/scientific-assessments/us-impacts). In addition, consult the Fourth Assessment Report of the Intergovernmental Panel on Climate Change (IPCC), 2007, http://www.ipcc.ch/, AR4-Climate Change 2007.

BPP13 – Use of Adaptive Management (Q7 and Q6)

Background Information

Within the last few years, adaptive management has become a topic for consideration in the post-EIS time period for specific policies, plans, programs, projects, and permit actions. For Traditional EAs, this subject may not be of specific concern; however, for Mitigated FONSI EAs, and especially for Expanded EAs, and depending upon the actions and locations, adaptive management is receiving greater attention. The concept was originally introduced in 1997 as an emerging model for the conduction of impact studies, particularly for EISs. The traditional concept model for some EISs (and even some EAs) included “predict-mitigate-implement”.

In 1997, the 25-year report by CEQ identified an emerging model which included “predict-mitigate-implement-monitor, and adapt” (Council on Environmental Quality, 1997). This latter model can be used to account for unanticipated changes in environmental conditions, inaccurate predictions, and unidentified responses in natural resources and social situations. Further, the concept could be used to partially address incomplete and unavailable information in specific EISs, and for Mitigated FONSI EAs, and Expanded EAs.

Numerous definitions of adaptive management have been promulgated. One example related to natural resources management indicates that …”adaptive management is a system of management practices based on clearly identified outcomes, monitoring to determine if management actions are meeting outcomes, and, if not, facilitating management changes that will best ensure that outcomes are met or that the outcomes are re-evaluated. Adaptive management recognizes that knowledge about natural resource systems is sometimes uncertain and thus it is the preferred method of management in these cases” (U.S. Department of the Interior, 2004). Other definitions have been developed for water resources projects, environmental restoration projects, water supply and transportation projects, and in support of evaluating fisheries management and the effectiveness of mitigation measures.

Chapter 4 in the 2003 NEPA Task Force report was entirely focused upon adaptive management and monitoring (Council on Environmental Quality, 2003). It was noted that planning a successful adaptive management program would require: (1) the development of a monitoring scheme that examines the environmental effects of the action allowing practitioners to determine whether adjustments are necessary to avoid unpredicted effects; (2) the identification of adaptive measures that could be used within the range of alternatives whose impacts were analyzed, or specifically identifying and analyzing each of the adaptive measures as an alternative or part of an alternative; (3) the use of technically and scientifically credible performance measures or thresholds for assessing progress and effects, and quality control measures that ensure the integrity and appropriateness of the adaptive management approach; and (4) adequate public involvement mechanisms.

No specific questions related to adaptive management were included in the survey questionnaire. However, the responses to Question 7 on identified adequacies in

EAs included two comments related to the use of adaptive management. They noted the need for strong agency involvement in planning for mitigation and monitoring and attention to measuring/quantifying environmental changes. One noted caution related to underfunded implementation of adaptive management programs. Other concerns have related to subsequent legal requirements for preparing supplemental EAs (or EISs), and the dissemination of program findings to various stakeholders and the general public.

An abundance of reference materials related to NEPA and adaptive management have been recently generated, and several examples will be noted. First, in 2004, a National Research Council report on adaptive management concepts for water resources projects was generated (Panel on Adaptive Management for Resource Stewardship, 2004). This report identified six fundamental elements along with supporting policy needs; the topics included: (1) Element 1 – management objectives that are regularly re-visited and accordingly revised; (2) Element 2 – a model (or models) of the system(s) to be managed; (3) Element 3 – a range of management choices relative to the project and/or utilized resources; (4) Element 4 – a systematic monitoring program which includes reporting, evaluation of management choices, and compliance with management objectives; (5) Element 5 – one or more mechanisms for incorporating learning into future decisions; and (6) Element 6 – a collaborative structure for stakeholder participation and learning, including disseminating such learned information to various stakeholders and agencies.

In addition to these six elements, other considerations in planning an adaptive management program include the need for assembling information on historical and current conditions of key indicators for pertinent natural resources and social situations. Another consideration involves collaborative long-term agreements among pertinent federal, state, tribal and local environmental agencies, and a program management board (or steering committee) comprised of representatives from these agencies. Another one includes adequate budgetary and personnel resources. Finally, a peer group of advisors with expertise in the science of the key resources, in public policy and analyses, in the planning and conduction of environmental monitoring and research, and in environmental decision making, would be highly desirable (Canter and Atkinson, 2010).

An additional useful USDOI reference document includes a systematic report on an eight-step process for planning, implementing, documenting, and decision making associated with adaptive management (Williams, et al., 2009). Detailed information is included on these iterative steps. A second report, published by the U.S. Geological Survey, contains a useful protocol for developing an environmental monitoring system, and for implementing and operating the system (Marcus, 1979). The Marcus report also includes an actual case study wherein the methodology was utilized. Finally, the USDOI has recently released an application guide (containing case studies) for using adaptive management in natural resources decision making (U.S. Department of the Interior, 2012).

Specific BPP for Use of Adaptive Management

Adaptive management is a useful concept which could be used to reduce impact uncertainties and enhance knowledge relative to direct, indirect, and cumulative impacts for both Mitigated FONSI EAs and Enhanced EAs. Key elements within an adaptive management program include the delineation of management objectives, the development and use of appropriate types of models (qualitative, conceptual, and/or quantitative) for resources of concern, the identification of management choices, a systematic and adjustable monitoring program, current and future decision-making based on findings and learning accomplishments, and an appropriate information dissemination effort. The literature base for adaptive management is robust, including those references mentioned in the background information. Budgetary requirements and sources of funding must be considered in initial planning. Regarding Mitigated FONSI EAs and Enhanced EAs, adaptive management and associated funding requirements could be addressed in one or more appendices to these two categories of EAs.

BPP14 – Application of Principles of Scientific Writing and Communication (Q7 and Q6)

Background Information

Because of the topical importance of scientific writing and communication for all three levels of EAs, additional attention was devoted to several sources of writing instructions. The resultant findings are both lengthy and important, thus they can be found in Appendix F.

Specific BPP for Scientific Writing and Communication

The scientific writing and communication BPPs are described in the following 12 items.

- Identify your audience and communicate in a way they will understand.
- Before starting the document, understand its requirements for legal sufficiency and how to fulfill them appropriately and concisely.
- Organize the document so that the sections support one another and tell the story of the project in a logical progression.
- Unify the team by chartering the project, providing a style guide for a consistent and reader-friendly voice, making all responsibilities clear, and ensuring the team understands the story of the project and how the document will be organized to tell it.
- Rely on proven guidance such as the three reports referenced at the end of this discussion to define and describe clearly, write concisely and briefly, make the

document reader-friendly and consistent, and ensure that the analyses and conclusions are transparent and understandable by the target audience.

- Confine the analyses to relevant topics, define and apply appropriate significance criteria, and discuss issues and impacts in proportion to their importance to the decision about the proposed action and its alternatives.

- Strive for objectivity, accuracy, balance, and completeness.

- Support every description, assertion, and conclusion with referenced evidence.

- Use tables and graphics to help tell the story, but keep them simple and clear.

- Test early draft sections with members of the target audiences, including stakeholders, agency representatives, and an attorney, and apply their recommendations to improve the document.

- Consider alternative formats for different audiences and for different parts of the document package, such as the executive summary and appendices based on landscape-formatted plans or graphics.

- Design the document, or a version of the document, for easy website access and use.

Finally, the BPPs stated above are not intended or represented to be definitive; other analysts might well prepare a different – and better – list. But to prepare an excellent NEPA EA, it would be hard to improve on the three core principles defined in *Improving the Quality of Environmental Documents* (AASHTO/ACEC 2006):

- Tell the story of the project so that the reader can easily understand the purpose and need for the project, how each alternative would meet the project goals, and the strengths and weaknesses associated with each alternative.

- Keep the document as brief as possible, using clear, concise writing; an easy-to-use format; effective graphics and visual elements; and discussion of issues and impacts in proportion to their significance.

- Ensure that the document meets all legal requirements in a way that is easy to follow for regulators and technical reviewers.

The following three reports provide comprehensive, practical, and easy to understand guidance for NEPA practitioners regarding the 12 BPPs listed above, and they are highly recommended:

American Association of State Highway and Transportation Officials (AASHTO) and American Council of Engineering Companies (ACEC). 2006. *Improving the Quality of Environmental Documents.* A Report of the Joint AASHTO/ACEC Committee in Cooperation with the federal Highway Administration. Washington, D.C.: May 2006. 35 pp. Available online at: http://environment.transportation.org/pdf/IQED-1_for_CEE.pdf

Washington State Department of Transportation (WSDOT). 2008. *Reader-Friendly Document Tool Kit and Appendices.* June 2008. Available online at: http://www.wsdot.wa.gov/Environment/ReaderFriendly.htm

Plain Language Action and Information Network (PLAIN). 2011. *Federal Plain Language Guidelines.* March 2011; Revision 1, May 2011. Available online at: http://www.plainlanguage.gov/howto/guidelines/FederalPLGuidelines/index.cfm

BPP15 – Public Involvement, Response to Review Comments on Draft EAs (Q7 and Q6), and Public Reviews of Three Levels of EAs (Q18) (Section 1506.6 and 1503.4) – can also be referred to as Public Participation

Background Information

This BPP is derived from the information gathered from Questions 6, 7, and 18. The terms “participation” and “involvement” as used in this report are synonymous; however, “participation” will be used in this BPP.

Question 6 asked respondees, based on their general NEPA knowledge and EA experience, to prioritize the relative importance of certain inadequacies identified with the absence of public participation for Enhanced EAs. Participants used a numbering scale of 1 to 3, with 1 denoting highly important, 2 denoting medium importance, and 3 indicating minor importance. A total of 279 people answered the part of Question 6 relating to the absence of public participation. The rating average was 1.90, which means it fell somewhere between highly and medium importance -- 95 participants (34.1%) rated this highly important, 117 participants (41.9%) rated it as medium importance, and 67 participants (24.0%) rated it as minor importance. In addition, 34 people out of the 279 responders (12%) made comments, but none of them related to public participation.

Question 7 asked participants to list three features, based on their general NEPA knowledge and EA experience, which are typically associated with adequate EAs. A total of 269 people addressed to Question 7. In addition, there were 39 comments specifically directed toward public participation.

Question 18 asked if the three types of EAs (Traditional, Mitigated FONSI, and Enhanced) should be circulated for solicitation of public reviews and comments with the final EAs including responses to the received comments. The shows the responses were as follows:

Level of EA	Yes	No	Response Count
Enhanced EA	87.8%* (209)**	12.2% (29)	238
Mitigated FONSI EA	68.6% (164)	31.4% (75)	239
Traditional EA	38.0% (90)	62.0% (147)	237

*percentage of total responses
**( ) denotes number of responses

As can be seen, Enhanced EAs were strongly perceived as needing public participation (87.8%), while Traditional EAs with lesser scope were not as likely to need public participation efforts (38.0%).

NEPA does not explicitly require agencies to solicit comments on an EA. National Environmental Policy Act of 1969, § 2 et seq., 42 U.S.C.A. § 4321 et seq. However, Section 102(2)(G) states that all agencies of the federal government shall *"make available to states, counties, municipalities, institutions, and individuals, advice and information useful in restoring, maintaining, and enhancing the quality of the environment." Id.* (Emphasis added).

CEQ's regulations discuss public involvement at 40 C.F.R. §§ 1500.2(d), Policy; 1501.4(e)(1) (2), Whether to prepare an environmental impact statement; 1501.7(a)(1), Scoping; 1503.1(a)(3), Inviting comments; and 1506.6, Public involvement, which is the most important regulation on public participation: *"Agencies shall: (a) Make diligent efforts to involve the public in preparing and implementing their NEPA procedures. (b)Provide public notice of NEPA-related hearings, public meetings, and the availability of environmental documents so as to inform those persons and agencies who may be interested or affected."* The CEQ regulations define "environmental document" at regulation 1508.10 to *"include the documents specified in Sec. 1508.9 (environmental assessment), Sec. 1508.11 (environmental impact statement), Sec. 1508.13 (finding of no significant impact), and Sec. 1508.22 (notice of intent)."*

The *Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations* address public participation in question 12a, Effective Date and Enforceability of the Regulations: *"All the provisions of the regulations are binding as of that date, including those covering decision making, public participation, referrals, limitations on actions, EIS supplements, etc."* Question 38, Public Availability of EA v. FONSIs. Must EAs and FONSIs be made public? If so, how should this be done? *"Yes, they must be available to the public. Section 1506.6 requires agencies to involve the public in implementing their NEPA procedures, and this includes public involvement in the preparation of EAs and FONSIs. These are public "environmental documents" under Section 1506.6(b), and, therefore, agencies must give public notice of their availability. A combination of methods may be used to give notice, and the methods should be tailored to the needs of particular cases. Thus, a Federal Register notice of availability of the documents, coupled with notices in national publications and mailed to interested national groups might be appropriate for proposals that are national in scope. Local newspaper notices may be more appropriate for regional or site-specific proposals. The objective, however, is to notify all interested or affected parties. If this is not being*

achieved, then the methods should be reevaluated and changed. Repeated failure to reach the interested or affected public would be interpreted as a violation of the regulations."

Executive Order 11514—Protection and enhancement of environmental quality also requires public participation: "*Sec. 2. Responsibilities of federal agencies. (b) Develop procedures to ensure the fullest practicable provision of timely public information and understanding of federal plans and programs with environmental impact in order to obtain the views of interested parties. These procedures shall include, whenever appropriate, provision for public hearings, and shall provide the public with relevant information, including information on alternative courses of action. Federal agencies shall also encourage state and local agencies to adopt similar procedures for informing the public concerning their activities affecting the quality of the environment."*

Professor Mandelker summarizing the status of public participation in his treatise, *NEPA Law and Litigation*[18], specifically discusses three court cases involving EAs.

> *The First Circuit concluded that the Corps of Engineers satisfied its procedural obligations to allow public input on an EA. The Corps issued a public notice of the project, provided a five-month public comment period, conducted two public hearings, responded to public comments in the EA, and conferred with federal and state environmental agencies. Alliance to Protect Nantucket Sound, Inc. v. U.S. Dept. of Army, 398 F.3d 105 (1st Cir. 2005).*
>
> *The Ninth Circuit in Citizens for Better Forestry v. U.S. Dept. of Agriculture, 341 F.3d 961 (9th Cir. 2003) concluded that agencies have an obligation to involve the public in the preparation of an EA and discussed the extent of that duty.*[19] *This case arose in the context of the court's consideration of whether an environmental group had standing to challenge the Forest Service's alleged noncompliance with NEPA as a result of the procedural injury it suffered by being deprived of the opportunity to comment on a FONSI. The court rejected the Forest Service's contention that the CEQ regulations at 1501.4(b), (e) and 1506.6(a) are merely "oratory." The court concluded, "the public must be given an opportunity to comment on draft EAs and EISs."*
>
> *The Ninth Circuit addressed the issue again in Bering Strait Citizens for Responsible Resource Development v. U.S. Army Corps of Engineers, 524 F.3d 938 (9th Cir. 2008). The court's holding reflected a middle position when it stated that the circulation of a draft EA is not required in*

[18] Mandelker, Daniel R. *NEPA Law and Litigation*, 2d, Database updated August 2012, Chapter 7, The Environmental Review Process.

every case and enunciated the following "rule": An agency, when preparing an EA, must provide the public with sufficient environmental information , considered in the totality of circumstances, to permit members of the public to weigh in with their views and thus inform the agency decision making process."

The U.S. EPA published *The Model Plan for Public Participation*, February 2000 (EPA-300-K-00-001). This report and recommendations were written by the National Environmental Justice Advisory Council, a public advisory committee providing extramural policy information and advice to the EPA Administrator. The report lists critical elements for conducting public participation and core values and guiding principles for the practice of public participation.

Two excellent sources concerning public participation are:

Public Participation in Environmental Assessment and Decision Making, Thomas Dietz and Paul Stern, Eds., National Research Council, The National Academies Press, Washington, D.C., 2008. Chapters 4 through 6 deal specifically with the practice of public participation.

Democracy in Practice, Public Participation in Environmental Decisions, Thomas C. Beierle and Jerry Cayford, Resources for the Future, Washington, D.C., 2002. The authors point out that *"a fundamental challenge for administrative governance is reconciling the need for expertise in managing administrative programs with the transparency and participation demanded by a democratic system." (p.3)*

Finally, Professor Lynton K. Caldwell wrote an article titled *The National Environmental Policy Act: Retrospect and Prospect.* It was published in *A Report Prepared Pursuant to the Request of the Subcommittee on Fisheries and Wildlife, Conservation and the Environment of the Committee on Merchant Marine and Fisheries*, U.S. House of Representatives, 94th Congress, 2d Session, February 1976, Serial No. 94-E, pages 69-86. In the article Caldwell states that *"NEPA changed public life in four important respects: first, it kept the environmental issue before the American people, the Congress , and the President; second, through the EIS it altered the decision process in the federal agencies; third, in association with the Freedom of Information Act, it forced the public disclosure of that process and opened the way to public participation in it; and fourth, it provided a model that has influenced environmental policy legislation among several states and nations abroad."*

Specific BPP for Public Participation

The requirement to involve the public in EAs stems from many sources as noted above, but the most salient is in CEQ regulation 40 CFR 1506.6 where it is clearly stated that agencies **shall** *"Provide public notice of NEPA-related hearings, public meetings, and the availability of environmental documents so as to inform those*

persons and agencies who may be interested or affected." Accordingly, agencies should involve the public in EAs using the elements of public participation on a sliding scale as indicated in Table 15. Documentation of the findings should also be made.

NINE PRIORITY 2 BPPs

This sub-section addresses informational sources for Priority 2 BPPs. As noted earlier, most of the nine topics are already addressed for EISs within specific sections of CEQ's NEPA regulations (Council on Environmental Quality, 1986). The purpose herein is to delineate sections within the regulations which specifically relate to the nine topical issues. Careful review of the sections should provide the foundation for adapting them to the pertinent topics for EAs. Further, comments on various questions within the questionnaire survey should be reviewed to determine the relevance of the comments to the nine topics. Examples of sources of relevant information for the nine BPPs include:

- BPP No. 16 – Leadership and Membership of EA Preparation Team, and Planning of an EA – sources of information include:

  - Categorized comments on these topics in Q7 and Q6 (see Appendix E herein)

TABLE15: Public Participation for Three Levels of EAs

			Mitigated FONSI EA		**Enhanced EA**
	Small-scale, 1 Project		**Medium-scale, multi-project**		**Large-scale, Programmatic or Consolidated Project**
Public Participation Elements					
Public notice	X		X		X
Scoping			X		X
Minimum 15-30-day public comment period			X		X
Preparation of responses			X		X

Dissemination of information	X		X		X
Notice of availability			X		X
Public meetings and/or hearings			X		X

- Agency guidance which support these topics; examples of such agencies include, but are not limited to, the U.S. Department of Energy, the Nuclear Regulatory Commission, the Federal Highway Administration, and others
- Textbooks and journal articles related to environmental impact studies
- Communications with experienced EA professionals

- BPP No. 17 – Executive Summary – sources of information include:

  - Categorized comments on this topic in Q7 and Q6 (see Appendix E herein)
  - Agency guidance which addresses the Executive Summary; examples include the above listing plus the Department of the Army and National Marine Fisheries Service
  - Textbooks, journal articles, and reports on technical/scientific writing
  - Section 1502.12

- BPP No. 18 – Scoping Process and Public and Agency Scoping for Three Levels of EAs

  - Categorized comments on these topics in Q7 and Q6 (see Appendix E herein)
  - Agency guidance on scoping; numerous illustrations are available
  - Section 1501.7
  - Examples of scoping reports from various agencies
  - Tabular responses to Q17 (see Appendix E herein)

- BPP No. 19 – Scientific Foundation for Study and Subject Matter Experts

  - Categorized comments on these topics in Q7 and Q6 (see Appendix E herein)
  - Section 1502.24
  - Relevant case law
  - Section 1502.22

- BPP No. 20 – Composite Report of Laws and Criteria

- Categorized comments on these topics in Q14 (see Appendix E herein)
- Section 1502.25a and b
- NEPA-related requirements of Clean Water Act, Endangered Species Act, and many others
- Summary reviews of environmental laws and requirements

- BPP No. 21 – Preparation of FONSI

  - Categorized comments on this topic in Q7 and Q6 (see Appendix E herein)
  - Section 1508.13
  - Relevant case law
  - Specific agency guidance on the preparation of FONSIs

- BPP No. 22 – Incomplete and Unavailable Information

  - Tabular responses to Q15 and Q16 (see Appendix E herein)
  - Section 1502.22
  - Relevant case law
  - Specific agency guidance on incomplete and unavailable information

- BPP No. 23 – Supplemental EAs

  - Tabular results of responses to Q21 (see Appendix E herein)
  - Categorized comments on supplemental EISs (see Appendix E herein)
  - Section 1502.9(c) (for criteria for supplementation)
  - Relevant case law
  - Specific agency guidance on supplementing NEPA compliance documents

- BPP No. 24 – Preparation of Administrative Record

  - Guidance from Department of Justice
  - Relevant case law
  - Specific agency guidance on preparing an administrative record

SECTION 6
POSITIVE ACTIONS FOR IMPLEMENTING BPPs

Question 23 of the Questionnaire Survey was focused on identifying positive actions that could be taken by CEQ, federal agencies, NAEP, and others relative to implementation of anticipated BPPs for EAs. The question listed three positive actions and requested other suggestions from the respondees. The three actions were: include BPPs in contractual scopes of work for the preparation of EAs; federal agencies and/or consulting firms should develop training courses to further explain BPPs and their application; and conduct special studies of case law or other subjects that could be used to support BPPs for EAs.

A total of 106 respondees addressed Question 23. This was the lowest response rate for all of the 23 questions; this rate could partially be explained by the fact that this was the final question in a lengthy and time consuming questionnaire. A total of 95 suggestions related to additional actions were received, with 29 related to suggestions for CEQ activities and initiatives, and an additional 20 related to agency activities.

Extensive analyses of each of the provided suggestions are considered to be beyond the scope of this Pilot Study. However, if CEQ decides to pursue the development of specific EA guidance, the following strategies should be considered:

- CEQ should carefully review the responses to Question 23, and develop an initial list of priority actions for inclusion in an implementation plan.

- CEQ should also carefully review the 302 comments received on Question 22; the focus of this question related to identifying barriers to the implementation of BPPs for EA. Nine categories of comments were identified, with “institutional barriers and concerns” containing 200 comments. Reviews of these comments would be informative in the development of an implementation plan.

- CEQ should consider the establishment of a supporting panel of agency NEPA experts to collaborate in the development of an implementation strategy for dissemination of guidance on BPPs for EAs.

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APPENDIX A
CEQ GUIDANCE ON EAs

This Appendix contains EA-related information from four guidance documents issued by CEQ. These documents were released in 1981, 2003, 2011, and 2012. Review of the contents of each revealed a sizeable information base which was useful in this Pilot Study. Specifically, many of the topical questions in the Questionnaire Survey were based on these documents, and included as a means to solicit practical knowledge from EA practitioners. The four documents included frequently asked questions regarding EAs (Council on Environmental Quality, 1981 and 1986), Chapter 6 in CEQ's NEPA Task Force report (Council on Environmental Quality, 2003), guidance on mitigation, monitoring, and the use of mitigated FONSIs (Council on Environmental Quality, January 14, 2011), and preparing efficient and timely environmental reviews under NEPA (Council on Environmental Quality, 2012).

FREQUENTLY ASKED QUESTIONS REGARDING EAs

Due to numerous practical questions which were raised following the 1979 issuance of CEQ's NEPA regulations, CEQ decided to address a list of 40 FAQs and their associated answers. The list was originally released in 1981, and updated in 1986 (Council on Environmental Quality, 1981 and 1986). Of relevance herein are Questions 36a, 36b, 37a, 37b, 38, 39, and 40. Each of the seven answers still have relevance; however, in many cases, the practice related to preparing EAs has evolved to the development of more lengthy documents. Further, newer CEQ guidance related to the use of mitigation and monitoring for mitigated FONSIs is now available and will be subsequently summarized in this Appendix (Council on Environmental Quality, January 14, 2011). The EA-related questions and answers in the 1986 version of the 40 FAQs are as follows (Council on Environmental Quality, 1981 and 1986).

36a. Environmental Assessments (EA**).** How long and detailed must an environmental assessment (EA) be?

A. The environmental assessment is a concise public document which has three defined functions. (1) It briefly provides sufficient evidence and analysis for determining whether to prepare an EIS; (2) it aids an agency's compliance with NEPA when no EIS is necessary, i.e., it helps to identify better alternatives and mitigation measures; and (3) it facilitates preparation of an EIS when one is necessary. Section 1508.9(a).

Since the EA is a concise document, it should not contain long descriptions or detailed data which the agency may have gathered. Rather, it should contain a brief discussion of the need for the proposal, alternatives to the proposal, the environmental impacts of the proposed action and alternatives, and a list of agencies and persons consulted. Section 1508.9(b).

While the regulations do not contain page limits for EA's, the Council has generally advised agencies to keep the length of EAs to not more than approximately 10-15

pages. Some agencies expressly provide page guidelines (e.g., 10-15 pages in the case of the Army Corps). To avoid undue length, the EA may incorporate by reference background data to support its concise discussion of the proposal and relevant issues.

36b. Under what circumstances is a lengthy EA appropriate?

A. Agencies should avoid preparing lengthy EAs except in unusual cases, where a proposal is so complex that a concise document cannot meet the goals of Section 1508.9 and where it is extremely difficult to determine whether the proposal could have significant environmental effects. In most cases, however, a lengthy EA indicates that an EIS is needed.

37a. Findings of No Significant Impact (FONSI). What is the level of detail of information that must be included in a finding of no significant impact (FONSI)?

A. The FONSI is a document in which the agency briefly explains the reasons why an action will not have a significant effect on the human environment and, therefore, why an EIS will not be prepared. Section 1508.13. The finding itself need not be detailed, but must succinctly state the reasons for deciding that the action will have no significant environmental effects, and, if relevant, must show which factors were weighted most heavily in the determination. In addition to this statement, the FONSI must include, summarize, or attach and incorporate by reference, the EA.

37b. What are the criteria for deciding whether a FONSI should be made available for public review for 30 days before the agency's final determination whether to prepare an EIS?

A. Public review is necessary, for example, (a) if the proposal is a borderline case, i.e., when there is a reasonable argument for preparation of an EIS; (b) if it is an unusual case, a new kind of action, or a precedent setting case such as a first intrusion of even a minor development into a pristine area; (c) when there is either scientific or public controversy over the proposal; or (d) when it involves a proposal which is or is closely similar to one which normally requires preparation of an EIS. Sections 1501.4(e)(2), 1508.27. Agencies also must allow a period of public review of the FONSI if the proposed action would be located in a floodplain or wetland. E.O. 11988, Sec. 2(a)(4); E.O. 11990, Sec. 2(b).

38**.** Public Availability of EAs v. FONSIs. Must (EAs) and FONSIs be made public? If so, how should this be done?

A. Yes, they must be available to the public. Section 1506.6 requires agencies to involve the public in implementing their NEPA procedures, and this includes public involvement in the preparation of EAs and FONSIs. These are public "environmental documents" under Section 1506.6(b), and, therefore, agencies must give public notice of their availability. A combination of methods may be used to give notice, and the methods should be tailored to the needs of particular cases. Thus, a Federal Register

notice of availability of the documents, coupled with notices in national publications and mailed to interested national groups might be appropriate for proposals that are national in scope. Local newspaper notices may be more appropriate for regional or site-specific proposals.

The objective, however, is to notify all interested or affected parties. If this is not being achieved, then the methods should be reevaluated and changed. Repeated failure to reach the interested or affected public would be interpreted as a violation of the regulations.

39. Mitigation Measures Imposed in EAs and FONSIs. Can an EA and FONSI be used to impose enforceable mitigation measures, monitoring programs, or other requirements, even though there is no requirement in the regulations in such cases for a formal Record of Decision?

A. Yes. In cases where an EA is the appropriate environmental document, there still may be mitigation measures or alternatives that would be desirable to consider and adopt even though the impacts of the proposal will not be "significant." In such cases, the EA should include a discussion of these measures or alternatives to "assist [46 FR 18038] agency planning and decision-making" and to "aid an agency's compliance with [NEPA] when no environmental impact statement is necessary." Section 1501.3(b), 1508.9(a)(2). The appropriate mitigation measures can be imposed as enforceable permit conditions, or adopted as part of the agency final decision in the same manner mitigation measures are adopted in the formal Record of Decision that is required in EIS cases.

40. Propriety of Issuing EA When Mitigation Reduces Impacts. If an environmental assessment indicates that the environmental effects of a proposal are significant but that, with mitigation, those effects may be reduced to less than significant levels, may the agency make a finding of no significant impact rather than prepare an EIS? Is that a legitimate function of an EA and scoping?

A. Mitigation measures may be relied upon to make a finding of no significant impact only if they are imposed by statute or regulation, or submitted by an applicant or agency as part of the original proposal. As a general rule, the regulations contemplate that agencies should use a broad approach in defining significance and should not rely on the possibility of mitigation as an excuse to avoid the EIS requirement. Sections 1508.8, 1508.27.

If a proposal appears to have adverse effects which would be significant, and certain mitigation measures are then developed during the scoping or EA stages, the existence of such possible mitigation does not obviate the need for an EIS. Therefore, if scoping or the EA identifies certain mitigation possibilities without altering the nature of the overall proposal itself, the agency should continue the EIS process and submit the proposal, and the potential mitigation, for public and agency review and comment. This is essential to ensure that the final decision is based on all the relevant factors and that

the full NEPA process will result in enforceable mitigation measures through the Record of Decision.

In some instances, where the proposal itself so integrates mitigation from the beginning that it is impossible to define the proposal without including the mitigation, the agency may then rely on the mitigation measures in determining that the overall effects would not be significant (e.g., where an application for a permit for a small hydro dam is based on a binding commitment to build fish ladders, to permit adequate down stream flow, and to replace any lost wetlands, wildlife habitat and recreational potential). In those instances, agencies should make the FONSI and EA available for 30 days of public comment before taking action. Section 1501.4(e)(2).

Similarly, scoping may result in a redefinition of the entire project, as a result of mitigation proposals. In that case, the agency may alter its previous decision to do an EIS, as long as the agency or applicant resubmits the entire proposal and the EA and FONSI are available for 30 days of review and comment. One example of this would be where the size and location of a proposed industrial park are changed to avoid affecting a nearby wetland area.

MODERNIZING NEPA IMPLEMENTATION

Chapter 6 in CEQ's NEPA Task Force report on modernizing NEPA implementation addresses informational and process needs for the preparation of EAs. Selected information was chosen for inclusion herein since it specifically relates to the potential contents of EA guidance. These proposed contents were reviewed prior to the development of the Questionnaire Survey; as a result, the majority of the recommended comments were addressed within Questions 6 to 21 in the Survey. Further, the majority of the resultant BPPs described in Section 5 herein address the proposed EA contents within the Task Force report. Broadly, the Task Force recommended that CEQ issue guidance which would (Council on Environmental Quality, 2003, p. 75): recognize the broad range in size of EAs across the spectrum of agencies of the Federal government; clarify that the size of EAs should be commensurate with the magnitude and complexity of environmental issues, public concerns, and project scope; describe the minimum requirements for short EAs; and delineate the requirements for public involvement, alternatives, and mitigation for actions that warrant longer EAs including those with mitigated FONSIs.

Further, the following four groups of recommendations were included in the Task Force report (Council on Environmental Quality, 2003, pp. 72-74):

<u>Use and Structure of EAs and FONSIs</u>

- Specify existing minimum EA requirements for all EAs in one guidance document. This guidance also should explain appropriate analysis of alternatives, including the no action alternative; when mitigation measures must be

considered; appropriate public involvement; and suitable use of an EA standardized analysis form.

- Address what should be included in an EA and FONSI to demonstrate that agencies have comprehensively considered the potential environmental consequences of the proposed action before taking the action (i.e., taken a "hard look").

- Emphasize that EAs and FONSIs should focus on the issues or resources that might be significantly affected or are a public concern, consistent with 40 C.F.R. § 1500.1(b). Specifically, the guidance should: emphasize that agencies should address proposed alternative effects and provide sufficient evidence and analysis about whether to prepare an EIS; emphasize that agencies should provide and explain effects determinations for each issue of interest to the public and of potential significance; state that following the CEQ EIS format to prepare an EA is unnecessary even though the issues might be similar to those addressed in an EIS; clarify that the impact discussion requirements within an EA and FONSI should be proportional to their significance and level of public concern; support and identify the methods to incorporate documents by reference; recommend that an EA should be attached to a FONSI or incorporated by reference; and emphasize that agencies must ensure the professional integrity and high quality of the environmental information within EAs.

Mitigated EAs and FONSIs

- Provide an easily understood and applied definition of mitigated FONSI, and clarify that a mitigated FONSI is approved based on the mitigation measures and therefore, an EIS is not required (i.e., without the mitigation measures, the FONSI would not be issued). Specifically, the guidance should: address mitigated FONSI requirements, including whether post-project monitoring and enforcement are required; describe when a monitoring and enforcement program should be adopted consistent with 40 C.F.R. § 1505.2, including factors that should be considered in this determination; and discuss how mitigation will be conducted and enforced, the length of the mitigation period, how mitigation success will be measured, and monitoring and adaptive management approaches.

- Address the ability of a FONSI to serve as a legally binding mechanism to enforce mitigation particularly when mitigation measures must be considered and adopted (e.g., for any project impacts, only when significant adverse impacts exist, for an entire project, only where feasible).

- Discuss how to adequately incorporate the EA analysis into FONSIs.

- Address unresolved conflicts concerning alternative uses of available resources to clarify to the public the agencies' rationale for presenting alternatives within an

EA. Specifically, the guidance should: define the meaning of "unresolved conflict concerning the alternative uses of available resources"; identify the core elements of an EA when unresolved conflicts concerning alternative uses of available resources are either present or not; clarify that alternatives must be evaluated and documented within the EA when unresolved conflicts concerning alternative uses of available resources exist; and specify that each EA should contain a discussion of unresolved conflicts concerning alternative uses of available resources when alternatives beyond the preferred and no-action alternative are being considered.

Alternative Analyses within EAs

- Support documenting eliminated alternatives in a separate section at the beginning of EAs, where appropriate, and identify criteria that agencies can apply to eliminate alternatives including cost, logistics, technology, and greater adverse environmental effects.

- Provide agencies with guidance to address the no action alternative when lack of action is not a reasonable alternative, consistent with guidance issued by CEQ, and clarify whether this approach can be used when there are unresolved conflicts concerning alternative uses of available resources.

- Clarify and highlight the definition of the no action alternative to foster consistent application.

Public Involvement in EAs

- Explain that public involvement requirements in an EA should be commensurate with project scale and complexity, required mitigation, and public interest, consistent with 40 C.F.R. § 1506.6(a)-(b). Specifically, the guidance should: reemphasize that public availability of EAs and FONSIs is a requirement consistent with 40 C.F.R. § 1506.6 and Question 38 of the Forty Most Asked Question Concerning CEQ's NEPA Regulation; emphasize and clarify special cases where a FONSI must be available for public review for 30 days consistent with 40 C.F.R. § 1501.4(e)(2) and Question 37(b); identify the level of public involvement for EAs that either do or do not have a remaining unresolved conflict in alternative uses of available resources and/or that have been mitigated below the threshold of significance that would usually require an EIS; and encourage agencies to electronically establish and maintain NEPA information and documents, provide non-sensitive information to the public via agency Websites, and develop and maintain links to other agencies' NEPA Websites, where ongoing and proposed NEPA work would be advertised, to facilitate EA public interaction. CEQ should provide links to these sites on its NEPAnet Website.

MITIGATION, MONITORING, AND THE USE OF MITIGATED FONSIs

On January 14, 2011, CEQ issued guidance on the incorporation of mitigation and monitoring in NEPA compliance documents (EAs and EISs), including specific attention to mitigated FONSIs. Of particular interest herein is the guidance on inclusion of mitigation and monitoring in EAs, and on commitments for implementation of such topics in mitigated FONSIs. Following are selected portions of the guidance which relate to EAs (Council on Environmental Quality, 2011):

- Page 2 – general concept -- Many Federal agencies and applicants include mitigation measures as integral components of a proposed project's design. Agencies also consider mitigation measures as alternatives when developing EAs and EISs. In addition, agencies have increasingly considered mitigation measures in EAs to avoid or lessen potentially significant environmental effects of proposed actions that would otherwise need to be analyzed in an EIS. This use of mitigation may allow the agency to comply with NEPA's procedural requirements by issuing an EA and a FONSI, or "mitigated FONSI", based on the agency's commitment to ensure the mitigation that supports the FONSI is performed, thereby avoiding the need to prepare an EIS.

- Page 3 – general concept – Agencies should not commit to mitigation measures considered in an EIS or EA absent the authority or expectation of resources to ensure that the mitigation is performed. In the decision documents concluding their environmental reviews; for example, a FONSI, agencies should clearly identify any mitigation measures adopted as agency commitments or otherwise relied upon (to the extent consistent with agency authority or other legal authority), so as to ensure the integrity of the NEPA process and allow for greater transparency.

- Page 5 – mitigation within project design – Many Federal agencies rely on mitigation to reduce adverse environmental impacts as part of the planning process for a project, incorporating mitigation as integral components of a proposed project design before making a determination about the significance of the project's environmental impacts. Such mitigation can lead to an environmentally preferred outcome and in some cases reduce the projected impacts of agency actions to below a threshold of significance.

- Page 6 – mitigation alternatives within EAs and EISs – When a Federal agency identifies a mitigation alternative in an EA or an EIS, it may commit to implement that mitigation to achieve an environmentally-preferable outcome. Agencies should not commit to mitigation measures considered and analyzed in an EIS or EA if there are insufficient legal authorities, or it is not reasonable to foresee the availability of sufficient resources, to perform or ensure the performance of the mitigation. Furthermore, the decision document following the EA (FONSI) should – and a Record of Decision (ROD) must – identify those mitigation measures that the agency is adopting and committing to implement, including any monitoring and enforcement program applicable to such mitigation commitments.

- Page 7 – mitigation commitments in an EA to support a mitigated FONSI – When preparing an EA, many agencies develop and consider committing to mitigation measures to avoid, minimize, rectify, reduce, or compensate for potentially significant adverse environmental impacts that would otherwise require full review in an EIS. … An agency should not commit to mitigation measures necessary for a mitigated FONSI if there are insufficient legal authorities, or it is not reasonable to foresee the availability of sufficient resources, to perform or ensure the performance of the mitigation … Mitigation commitments needed to lower the level of impacts so that they are not significant should be clearly described in the mitigated FONSI document and in any other relevant decision documents related to the proposed action. Agencies must provide for appropriate public involvement during the development of the EA and FONSI.

- Pages 8-9 – ensuring implementation of mitigation commitments – Federal agencies should take steps to ensure that mitigation commitments are actually implemented. Consistent with their authority, agencies should establish internal processes to ensure that mitigation commitments made on the basis of any NEPA analysis are carefully documented and that relevant funding, permitting, or other agency approvals and decisions are made conditional on performance of mitigation commitments. … Mitigation commitments should be carefully specified in terms of measurable performance standards or expected results, so as to establish clear performance expectations. … CEQ views funding for implementation of mitigation commitments as critical to ensuring informed decision-making. For mitigation commitments that agencies will implement directly, CEQ recognizes that it may not be possible to identify funds from future budgets; however, a commitment to seek funding is considered essential and if it is reasonably foreseeable that funding for implementation of mitigation may be unavailable at any time during the life of the project, the agency should disclose in the EA or EIS the possible lack of funding and assess the resultant environmental effects.

- Pages 9-11 – establishing a mitigation monitoring program – Adaptive management can help an agency take corrective action if mitigation commitments originally made in NEPA and decision documents fail to achieve projected environmental outcomes and there is remaining federal action. … Monitoring is fundamental for ensuring the implementation and effectiveness of mitigation commitments, meeting legal and permitting requirements, and identifying trends and possible means for improvement. … An agency should also commit to mitigation monitoring in important cases when relying upon an EA and mitigated FONSI. Monitoring is essential in those important cases where the mitigation is necessary to support a FONSI and thus is part of the justification for the agency's determination not to prepare an EIS. … Once an agency determines that it will provide for monitoring in a particular case, monitoring plans and programs should be described or incorporated by reference in the agency's decision documents. … Regardless of the method chosen, agencies should ensure that the monitoring program tracks whether mitigation commitments are being performed as

described in the NEPA and related decision documents (i.e., implementation monitoring), and whether the mitigation effort is producing the expected outcomes and resulting environmental effects (i.e., effectiveness monitoring). Agencies should also ensure that their mitigation monitoring procedures appropriately provide for public involvement.

- Page 12 – monitoring mitigation implementation – A successful monitoring program will track the implementation of mitigation commitments to determine whether they are being performed as described in the NEPA documents and related decision documents. The responsibility for developing an implementation monitoring program depends in large part upon who will actually perform the mitigation – the lead Federal agency or cooperating agency; the applicant, grantee, or permit holder; another responsible entity or cooperative non-Federal partner; or a combination of these. Effectiveness monitoring tracks the success of a mitigation effort in achieving expected outcomes and environmental effects. … When monitoring mitigation, agencies should consider drawing on sources of information available from the agency, from other Federal agencies, and from state, local, and tribal agencies, as well as from non-governmental sources such as local organizations, academic institutions, and non-governmental organizations.

- Page 12 – monitoring the effectiveness of mitigation – Effectiveness monitoring tracks the success of a mitigation effort in achieving expected outcomes and environmental effects … When monitoring mitigation, agencies should consider drawing on sources of information available from the agency, from other Federal agencies, and from state, local, and tribal agencies, as well as from non-governmental sources such as local organizations, academic institutions, and non-governmental organizations.

- Page 13 – public involvement in mitigated FONSIs – Public involvement is a key procedural requirement of the NEPA review process, and should be fully provided for in the development of mitigation and monitoring procedures. …The CEQ Regulations also require agencies to involve the public in the EA preparation process to the extent practicable and in certain cases to make a FONSI available for public review before making its final determination on whether it will prepare an EIS or proceed with the action. Consequently, agencies should involve the public when preparing EAs and mitigated FONSIs. … Beyond these requirements, agencies are encouraged to make proactive, discretionary release of mitigation monitoring reports and other supporting documents, and to make responses to public inquiries regarding mitigation monitoring readily available to the public through online or print media. … In some cases, agencies may need to balance competing privacy or confidentiality concerns (e.g., protecting confidential business information or the location of sacred sites) with the benefits of public disclosure.

- Page 14 – remedying ineffective or non-implemented mitigation – Through careful monitoring, agencies may discover that mitigation commitments have not been implemented, or have not had the environmental results predicted in the NEPA and decision documents. Agencies, having committed to mitigation, should work to remedy such inadequacies. … If a mitigation commitment is simply not undertaken or fails to mitigate the environmental effects as predicted, the responsible agency should further consider whether it is necessary to prepare supplemental NEPA analysis and documentation.

IMPROVING THE PROCESS FOR PREPARING EFFICIENT AND TIMELY ENVIRONMENTAL REVIEWS UNDER NEPA

CEQ issued this final guidance on March 6, 2012. This guidance was prompted by Executive Order 13563 (Improving Regulation and Regulatory Review) which went into effect on January 21, 2011 (Executive Office of the President, January 21, 2011). The CEQ's guidance on efficient and timely NEPA reviews emphasized existing requirements in CEQ's NEPA regulations and associated guidance. Specifically, eight referrals to EAs were included as follows (Council on Environmental Quality, 2012):

- Page 2 – regarding integrating environmental reviews into the decision-making process – Our ongoing review of the CEQ Regulations confirms the benefits of integrating environmental reviews into the decision-making process, coordinating multi-agency or multi-governmental reviews and approvals, and setting clear schedules for preparing EAs and EISs. This guidance promotes a sufficient and effective process that is tailored to avoid excessive burden. This guidance provides CEQ's interpretation of existing regulations promulgated under NEPA, and does not change agencies' obligations with regard to NEPA and the CEQ Regulations.

- Page 3 – regarding definition of EA – When a CE (Categorical Exclusion) is not appropriate and the agency has not determined whether the proposed action will cause significant environmental effects, then an EA is prepared. If, as a result of the EA, a FONSI is made, then the NEPA review process is completed with the FONSI, including documentation of its basis in the EA; otherwise an EIS is prepared.

- Page 4 – regarding mitigated FONSIs – In January, 2011, CEQ provided guidance that specifically addressed the appropriate use of a FONSI or mitigated FONSI to conclude a NEPA review process relying on an EA (Council on Environmental Quality, January, 2011). A mitigated FONSI is appropriate when mitigation is used to avoid or lessen potentially significant environmental effects of proposed actions that would otherwise need to be analyzed in an EIS. In addition, in May, 2010, CEQ issued guidance on ensuring efficient and expeditious compliance with NEPA when agencies must take exigent action to protect human health or safety and valued resources in a timeframe that does

not allow sufficient time for the normal NEPA process (Council on Environmental Quality, May, 2010)

- Page 5 – regarding relevant environmental analyses – Agencies are encouraged to concentrate on relevant environmental analysis in their EAs and EISs, not to produce an encyclopedia of all applicable information. Environmental analysis should focus on significant issues, discussing insignificant issues only briefly. Impacts should be discussed in proportion to their significance, and if the impacts are not deemed significant there should be only enough discussion to show why more study is not warranted. Scoping, incorporation by reference, and integration of other environmental analyses are additional methods that may be used to avoid redundant or repetitive discussion of issues.

- Page 5 – regarding writing of EAs – All NEPA environmental documents, not just EISs (infers EAs), shall be written in plain language, follow a clear format, and emphasize important impact analyses and relevant information necessary for those analyses, rather than providing extensive background material. Clarity and consistency ensure that the substance of the agency's analysis is understood, avoiding unnecessary confusion or risk of litigation that could result from an ambiguous or opaque analysis.

- Page 6 – regarding lengths of EAs – Similarly, the CEQ guidance issued in 1981 indicated that 10-15 pages is generally appropriate for EAs. This guidance must be balanced with the requirement to take a hard look at the impacts of the proposed action. As with EISs, an EA's length should vary with the scope and scale of potential environmental problems as well as the extent to which the determination of no significant impact relies on mitigation, rather than just with the scope and scale of the proposed action. The EA should be no more detailed than necessary to fulfill the functions and goals set out in the CEQ Regulations: (1) briefly provide sufficient evidence and analysis for determining whether to prepare an EIS; (2) aid an agency's compliance with NEPA when no EIS is necessary, i.e., the EA helps to identify and analyze better alternatives and mitigation measures; and (3) facilitate preparation of an EIS when one is necessary.

- Page 7 – regarding early NEPA integration in planning – To prepare efficient EAs, agencies should adhere to these same principles (as for EISs) and ensure that the EA is prepared in conjunction with the development of the proposed action in time to inform the public and the decision-maker. Agencies should review their NEPA implementing procedures as well as their NEPA practices to ensure that NEPA is integrated into overall project planning and management to the fullest extent possible.

- Page 8 – regarding scoping – In scoping, the lead agency determines the issues that the EA or EIS will address and identifies the significant impacts related to the proposed action that will be considered in the analysis. To increase efficiency,

the lead agency can solicit cooperation at the earliest possible time from other agencies that have jurisdiction by law or special expertise on any environmental issue that should be considered.

- Page 9 – regarding scoping – Agencies can also choose to take advantage of scoping whenever preparing an EA. Scoping can be particularly useful when an EA deals with uncertainty or controversy regarding potential conflicts over the use of resources or the environmental effects of the proposed action, or where mitigation measures are likely to play a large role in determining whether the impacts will be reduced to a level where a FONSI can be made. A lead agency preparing an EA may use scoping to identify and eliminate from detailed study the issues that are not significant or that have been covered by prior environmental review. The scoping process provides a transparent way to identify significant environmental issues and to deemphasize insignificant issues, thereby focusing the analysis on the most pertinent issues and impacts. We recommend that agencies review their NEPA implementing procedures, as well as their NEPA practices, to ensure they have the option of scoping for EAs.

- Page 9 – regarding scoping – Scoping can also be used to begin inter- and intra-governmental coordination if it is not already ongoing. To accomplish these goals, the lead agency preparing an EA or an EIS can choose to invite the participation of affected Federal, State, and local agencies, any affected Indian tribe, the proponent of the action, and other interested persons (including those who might not be in accord with the action on environmental grounds.

- Page 10 – regarding scoping – In sum, the scoping process provides an early opportunity to plan collaboration with other governments, assign responsibilities, and develop the planning and decision-making schedule. It also affords lead agencies the option of setting page limits for environmental documents and settling time limits for the steps in the NEPA process. Agencies may choose to use scoping whenever any of these techniques can provide for the more effective and efficient preparation of an EA.

- Page 12 – regarding adoption – The adoption of one Federal agency's EIS, or a portion of that EIS, by another Federal agency is an efficiency that the CEQ Regulations provide. An agency preparing an EA should similarly consider adopting another agency's EA or EIS when the EA or EIS, or a portion thereof, addresses the proposed action and meets the standards for an adequate analysis under NEPA, the CEQ's Regulations, and the adopting agency's NEPA implementing procedures. This concept was originally introduced in 1983 CEQ guidance (Council on Environmental Quality, 1983). …If the actions covered by the original EIS and the proposed action are substantially the same, the agency adopting the EIS is not required to recirculate the EIS as a draft for public review and comment. This same hold true for the adoption of another agency's EA when the original and proposed actions are substantially the same. … Similarly, when

the adopting agency was a cooperating agency in the preparation of an EA, it may adopt the EA without recirculating the EA.

- Page 13 – regarding incorporation by reference – Incorporation by reference is another method that provides efficiency and timesaving when preparing either an EA or an EIS. Agencies can, consistent with NEPA and the CEQ Regulations, incorporate by reference analyses and information from existing documents into an EA provided the material has been appropriately cited and described, and the materials are reasonably available for review by interested parties.

APPENDIX B

SUMMARY OF SELECT CASE LAW RELEVANT TO ENVIRONMENTAL ASSESSMENTS[20]

I. THRESHOLD OF SIGNIFICANCE:

Hanley v. Kleindienst, 471 F.2d 823 (2d Cir. 1972) ("*Hanley II")*. This Second Circuit case followed a district court's denial for the second time of a preliminary injunction against the construction of the nine-story Metropolitan Correction Center ("MCC") in Manhattan. Appellants, members, who lived or owned businesses in Manhattan, challenged a primitive version of an EA, a 25-page "Assessment of the Environment" prepared by General Services Administration ("GSA") as inadequate. The members disputed the agency's finding that the MCC was not a facility "significantly affecting the quality of the human environment" as incorrect or insufficient, based on impacts to the urban environmental. GSA's EA analyzed the size, exact location, and proposed use of the MCC; its design features, construction, and aesthetic relationship to its surroundings, and included consideration of environmental impacts and alternatives.

The court found that Congress, by adding "significant" in § 102(2)(C), intended that the agency, in determining whether an EIS was triggered, should conclude that a greater environmental impact would result than from "any major federal action." The court clarified that an EIS should be prepared, pursuant to CEQ guidelines, when the impacts are controversial. The course reasoned "controversial" did not refer to the amount of public opposition, but rather when a substantial dispute exists as to the size, nature, or effect of the major federal action.

The Second Circuit established a two-part test to determine when a major federal action will "significantly" affect the environment: (1) the extent to which the action will cause adverse environmental effects in excess of those created by existing uses in the area affected by it, and (2) the absolute quantitative adverse environmental effects of the action itself, including the cumulative harm that results from its contribution to existing adverse conditions or uses in the affected area.

The Second Circuit further stated that agencies must affirmatively develop a reviewable environmental record for the purposes of a threshold determination under § 102(2)(C). The court suggested that an agency must give notice to the public of the proposed major federal action and an opportunity to submit relevant facts, which might bear upon the agency's threshold decision, but did not prescribe certain procedural requirements.

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[20] We wish to extend our gratitude to the NAEP member Lucinda Low Swartz, for recording and compiling an extensive and excellent work, NEPA Major Cases and Update to Major NEPA Cases (2003-2011), published in NAEP's Environmental Practice Journal, and available at http://www.lucindalowswartz.com/NEPAinfoandResources.html.

The court remanded the case, ordering the agency to consider the impacts involving possible existence of a drug maintenance program, the increased risk of crime in the neighborhood, and to clarify certain findings of fact.

Anderson v. Evans, 371 F.3d 475 (9th Cir. 2004). In a series of litigated cases and appeals leading to this amended opinion, multiple animal advocacy groups and several citizens challenged the federal government's approval of a whaling quota for the Makah Indian Tribe ("the Tribe"), asserting violations of National Environmental Policy Act (NEPA) by the preparation of an EA instead of an EIS, among other claims. The Ninth Circuit upheld the EA in other areas, but ultimately held that the EA did not adequately address the highly uncertain impact of the Tribe's whaling on the local whale population and the local ecosystem. The court concluded that the major analytical lapse in the document sustained a sufficient basis for holding that the agencies' finding of no significant impact cannot survive the level of scrutiny applicable in this case. Specifically, the court found that "because the EA [did] not adequately address the local impact of the Tribe's hunt, an EIS is required".

II. APPROPRIATE USES AND SCOPE OF AN EA

Sierra Club v. Marsh, 769 F.2d 868 (1st Cir. 1985). In this First Circuit decision, Judge Breyer, writing for the majority, considered whether a cargo port and a causeway will "significantly affect[ ] the environment." The Sierra Club challenged a series of EAs and related documents adapted and prepared by the Maine Department of Transportation, the Federal Highway Administration, and the Army Corps of Engineers. The court also reviewed the administrative record, which included an 'EA' consisting of at least seven documents containing 350 pages of text, plus numerous pages of diagrams, maps, and technical drawings. The court examined the argument that an EIS is required on the basis of complexity. It scrutinized the CEQ guidance from the regulations 40 C.F.R. § 1502.7 and the FAQs (suggesting 10-15 pages for EA, and no more than 150 pages to 300 pages for a complex EIS).

The court reflected that the lengthy documents reflect a thorough consideration of potential impacts on the environment and determined that it should not give conclusive weight, one way or the other, to the simple *facts* of EA length, complexity, and controversy. These facts do not by themselves show that the EAs' conclusion of "no significant impact" is correct, nor do they show it is incorrect.

The court also differentiated between an EA and an EIS - stating that the two documents serve very different purposes. An EA aims simply to identify (and assess the "significance" of) potential impacts on the environment; it does not balance different kinds of positive and negative environmental effects, one against the other; nor does it weigh negative environmental impacts against a project's other objectives, such as, for example, economic development. The purpose of an EA is simply to help the agencies decide if an EIS is needed.

The First Circuit ultimately remanded the EAs, stating that the record did not

support a FONSI, and required the agencies prepare an EIS to consider secondary and other impacts of the causeway and bridge projects.

III. STANDARD OF REVIEW

A. ARBITRARY AND CAPRICIOUS

Marsh v. Oregon Natural Resources Council, 490 U.S. 360, 109 S.Ct. 1851 (1989). This Supreme Court of the United States case sets the modern standard of review under the Administrative Procedures Act. *Marsh* involved an environmental impact statement on a proposed dam in Oregon's Rogue River Basin. The agency prepared an EIS but environmental advocates claimed a supplemental environmental impact statement was necessary because of new information. The court held that a supplemental impact statement should be prepared when new information will affect the quality of the environment in a significant manner or to an extent not already considered. The court also made it clear that a court should not be unduly deferential when it applies the standard; it should not "automatically defer" to the agency without "carefully reviewing" the record and satisfying itself that the agency had made a "reasoned decision." The court discusses that this standard of review applies to a court's review of an agency decision on threshold questions such as whether to prepare an initial EIS (rather than an EA), "[i]n this respect the decision whether to prepare a supplemental EIS is similar to the decision whether to prepare an EIS in the first instance."

B. HARD LOOK STANDARD

Maryland-National Capital Park & Planning Commission v. United States Postal Service, 487 F.2d 1029 (D.C. Cir. 1973). This District of Columbia Circuit case involved a challenge to the Postal Service when it decided that an EIS was not necessary for construction of a new postal facility. Applying the "hard look" standard, the court determined that an agency must provide "convincing reasons" why an EIS was not necessary. The court described the searching criteria that can be used by a court to make such a determination that the EA is sufficient: (1) whether the agency took a "hard look" at the problem, rather than relying on bald conclusions, unaided by preliminary investigation; (2) whether the agency identified the relevant areas of environmental concern; (3) as to the problems studied and identified, whether the agency made a convincing case that the impact was insignificant; and (4) if there was impact of true significance, whether the agency convincingly established that changes in the project sufficiently reduced it to a minimum. The court remanded the case back to the agency, to investigate the impacts of water and oil runoff.

IV. ADEQUACY OF AN EA – ALTERNATIVES

Sierra Club v. Watkins, 808 F. Supp. 852 (D.D.C. 1991). Sierra Club challenged the adequacy of an EA prepared by the Department of Energy (DOE) for the shipping of spent nuclear fuel rods from Taiwan through the port of Hampton Roads, Virginia. The

court considered the impact analysis of the population density of the port, and the latent risk of fatalities associated with the importation of nuclear fuel rods.

The court stated it must apply the "rule of reason" and must assess whether the agency took "a hard look at the alternatives and explains its reasons for rejecting them." The "rule of reason" governs both *which* alternatives the agency must discuss and the *extent* to which it must discuss them.

The court ultimately found the EA to be inadequate. The court criticized the agency for its failure to explain its reasoning, and why it selected its alternative among seemingly better choices. The court ultimately found that the agency did not considered the range of alternatives that it must, and noted that the EA does not at all discuss why the preferred alternative, Hampton Roads was selected, among other less dense population port cities.

Center for Biological Diversity v. Salazar, 695 F.3d 893 (9th Cir. 2012). Environmental organizations filed action against United States Fish and Wildlife Service ("FWS") alleging that authorization for incidental take of polar bears and Pacific walruses resulting from oil and gas exploration activities in adjacent sea and coast of Alaska violated, among other claims, NEPA. The environmental organizations alleged that the EA failed to analyze other reasonable alternatives, such as imposing additional mitigation measures recommended by FWS scientists, or excluding key habitat areas from the geographic scope of the regulations.

In reviewing the EA, the court found that the FWS initially considered other action alternatives, but explained in the EA why it concluded that they were not feasible. The Service also explains in the 2008 final rule why the EA did not examine in greater detail some of the alternatives suggested by environmental organizations.

The Ninth Circuit previously found EAs sufficient where the agency gave detailed consideration to only two alternatives, a no-action and a preferred action, even with regard to regulatory schemes. The court reiterated the standard that an EA need only include a "brief discussion[ ]" of reasonable alternatives. An agency's "obligation to consider alternatives under an EA is a lesser one than under an EIS." The court upheld the EA.

V. MITIGATED FONSI

O'Reilly v. United States Army Corps of Engineers, 477 F.3 225 (5th Cir. 2007). Residents of Louisiana parish affected by dredging and filling of wetlands by a residential subdivision developer brought suit against the Army Corps of Engineers ("Corps") challenging its Finding of No Significant Impact (FONSI).

The residents challenged the sufficiency of the mitigation measures. The court reviewed the administrative record and mitigation plans in detail. It found that the EA failed to sufficiently demonstrate that the mitigation measures adequately addressed

and remediated the adverse impacts.

The Fifth Circuit criticized the EA, specifically stating that although the EA contained a discussion of potentially significant adverse impacts, it described only in broad terms the types of mitigation measures that will be employed. The court noted that generally "proposed mitigation measures need not be laid out to the finest detail," but they also could not be purely perfunctory or conclusory, citing to *Robertson v. Methow Valley Citizens Council*, 490 U.S. 332, 109 S.Ct. 1835 (1989).

The court found that the Corps' treatment of each individual potential impact was insufficient - and then pointed that the EA asserts, without data or analysis, that the project as mitigated should have "minimal [e]ffect" on flooding within the scope of a 25-year storm, contrary to evidence that storms in categories above a 25-year event could flood the development.

The court expounded that the EA provided only cursory detail as to what the measures were and how the measures served to reduce those impacts to a less-than-significant level. Because the feasibility of the mitigation measures was not self-evident, the court found the mitigation measures to be insufficient.

Ohio Valley Envtl. Coal. v. Aracoma Coal Co., 556 F.3d 177 (4th Cir. 2009). Environmental organizations challenged coal companies and the Army Corps of Engineers ("Corps") regarding the issuance of four permits allowing the filling of West Virginia stream waters in conjunction with area surface coal mining operations. Among the complaints was a challenge to the sufficiency of the Corps' mitigation measures to justify the issuance of a Finding of No Significant Impact (FONSI).

The challenge specifically focused on potential impacts of headwater streams and disputed the mitigation measurement standards employed by the Corps, claiming that Corps relied improperly on the Stream Habitat Unit model developed by the applicants to determine mitigation. In reviewing the administrative record, however, the Fourth Circuit noted that the Corps did not rely on the model in determining mitigation measures.

The court also noted the Corps mitigation plans included requirements for continued monitoring of the efficacy of the mitigation measures (some, for as many as ten years). The court found that each permit also contained detailed special conditions that imposed numerous performance standards to measure and ensure the success of mitigation.

The court analyzed that because the mitigation measures reflected the Corps' determinations of the most appropriate and practicable means of compensating for anticipated impacts and losses of value, and that the Corps' proposed mitigation plans were sufficient to justify the issuance of a mitigated FONSI.

The court also addressed that while the Corps' finding of no cumulative adverse

impacts does lean, to some extent, on mitigation, it was not perfunctory or conclusory in part because of the reliance on the Clean Water Act § 401 permitting process. The court reviewed the cumulative impacts analysis in each of the challenged permits and in the administrative record, and was satisfied the Corps articulated a satisfactory explanation for its conclusion that cumulative impacts would not be significantly adverse.

National Parks & Conservation Ass'n v. Babbitt, 241 F.3d 722 (9th Cir. 2001), *abrogated on other grounds by Monsanto Co. v. Geertson* Seed Farms, -- U.S. ---, 130 S.Ct. 2743 (2010). This Ninth Circuit case involved a challenge to the National Park Service's ("NPS") failure to prepare an EIS before increasing the number of cruise ships into a Glacier Bay National Park and Preserve in Alaska.

Among a number of deficiencies the court noted, one particular was the uncertainty in the agency's ability to offset the environmental impact of the increase in vessel traffic through its proposed mitigation measures. The court clarified that while the agency is not required to develop a complete mitigation plan detailing the "precise nature of the mitigation measures," the proposed mitigation measures must be "developed to a reasonable degree." It repeated the rule that a "perfunctory description," or "mere listing" of mitigation measures, without supporting analytical data," is insufficient to support a FONSI. The court evaluated whether the mitigation measures constituted an adequate buffer against the negative impacts that may result from the activity. Specifically, the it examined whether the mitigation measures rendered the impacts of increased vessel traffic so minor as to not warrant an EIS. The court found that EA lacked any analytical data, and that NPS did not conduct a study of the anticipated effects of the mitigation measures, nor did it provide criteria for a monitoring plan or for taking any needed corrective action. The court finally stated that where significant environmental damage may occur to a treasured natural resource, the studies must be conducted first, not afterwards as the agency proposed.

VI. CUMULATIVE IMPACTS ASSESSMENT

Fritiofson v. Alexander, 772 F.2d 1225 (5th Cir. 1985), *abrogated on other grounds by Sabine River Authority v. U.S. Dept. of Interior*, 951 F.2d 669 (5th Cir. 1992). This Fifth Circuit case involved a challenge to the Army Corps of Engineers ("Corps") decision to prepare an EA before issuing a permit authorizing a housing developer to construct a canal system in Galveston Island in Texas.

The agency argued that the development (1) "is not related to an overall plan ... to provide additional waterfront housing on Galveston Island," has "independent utility," and will not "support or encourage other related development" and, (2) "[i]n the absence of any other studies concerning Galveston Island by the City or other governmental entity, the Corps must examine each permit on an individual basis, carefully examining the environment of West Bay with each permit application." According to the record, further development was planned in West Galveston involving the same ecosystem. The EA concluded without explanation: "[t]he cumulative effects on the aquatic

ecosystem are insignificant."

The Fifth Circuit distinguished that only actual proposals (40 CFR § 1508.23), ready for decision, may be considered sufficiently related to require preparation of a broader NEPA document. Unlike the obligation to include cumulative actions in one EIS for analysis and decision, the obligation to address cumulative impacts is not limited to actual proposals.

With respect to cumulative impacts, the court noted that the CEQ regulations require analysis of direct, indirect, and cumulative impacts and held that in this context, the impacts were not limited to those from actual proposals, but must also include impacts from actions which are merely being contemplated (i.e., are not yet ripe for decision). However, the court noted that contemplated actions must be "reasonably foreseeable," not speculative and not off in the distant future.

The court restated that a meaningful cumulative-effects study must identify: (1) the area in which effects of the proposed project will be felt; (2) the impacts that are expected in that area from the proposed project; (3) other actions - past, proposed, and reasonably foreseeable - that have had or are expected to have impacts in the same area; (4) the impacts or expected impacts from these other actions; and (5) the overall impact that can be expected if the individual impacts are allowed to accumulate.

The district court reasoned from statements in the EA that the agency failed entirely to "conduct[ ] a cumulative effects study." The court held, moreover, that neither of the two reasons offered - the absence of studies by other governmental entities and the lack of both an overall plan and project interdependence - justified the insufficiency of the cumulative effect analysis. The court found that the agency failed to consider cumulative impacts and that the CEQ regulations make mandatory a consideration of cumulative impacts at the threshold stage of the NEPA process.

Klamath-Siskiyou Wildlands Center v. Bureau of Land Management, 387 F.3d 989 (9th Cir. 2004). This Ninth Circuit case involved a challenge by an environmental organization to EAs prepared by the Bureau of Land Management (BLM) for timber sales. The environmental organization claimed that the EAs were legally insufficient because, in part, they failed to adequately evaluate and discuss the potential cumulative environmental impacts posed by the sales in combination with other major activities in the watershed.

The court explained that a proper consideration of the cumulative impacts of a project requires "some quantified or detailed information; ... [g]eneral statements about possible effects and some risk do not constitute a hard look absent a justification regarding why more definitive information could not be provided." "The analysis "must be more than perfunctory; it must provide a useful analysis of the cumulative impacts of past, present, and future projects."

Here, the court considered the two EAs involving timber sales of the agency,

including over a dozen pages under the "Cumulative Effects" section of each EA, and a table in one EA of over three pages. The court ultimately found the agency did not adequately address the cumulative impacts. The court found no quantified assessment of the project's combined environmental impacts, and limited discussion of other timber sales projects in the area. The court criticized the table in that it did not provide any objective quantification of the impacts, only a particular environmental factor would be "unchanged," "improved," or "degraded" and whether that change would be "minor" or "major." The reader was not told what data the conclusions were based on, or why objective data cannot be provided. The court criticized that the agency relied on expert opinions without hard data, and stated the documents are unacceptable if indecipherable by the public. It also noted the lack of projects in one of the EAs under "Future Foreseeable Actions" subsection involving the same watershed.

The Ninth Circuit found the cumulative impacts analysis inadequate, and that the EAs did not sufficiently identify or discuss the incremental impact that can be expected from each successive timber sale, or how those individual impacts might combine or synergistically interact with each other to affect the environment.

VII. SUPPLEMENTATION

Friends of the Bow v. Thompson, 124 F.3d 1210 (10th Cir. 1997). An environmental group brought action against United States Forest Service ("USFS") challenging approval of timber sales from a national forest. The environmental group challenged, among other claims, USFS's decision to prepare a supplemental EA.

In reviewing the case, the court looked to the CEQ regulations for guidance regarding the trigger for supplementation of an EIS: "[t]he agency makes substantial changes in the proposed action that are relevant to environmental concerns," or "[t]here are significant new circumstances or information relevant to environmental concerns and bearing on the proposed action or its impacts." 40 C.F.R. § 1502.9(c)(1)(i), (ii) (1996).

The Tenth Circuit recognized that even though the CEQ regulations do not speak to the circumstances in which a supplemental EA should be prepared - the court applied the requirements of the supplementation standards contained in the CEQ regulations to the EA.

The court also recognized and applied the standard in *Marsh v. Oregon Natural Resources Council,* 490 U.S. 360, 190 S.Ct. 1851 (1989) ("[A]n agency need not supplement an EIS every time new information comes to light after the EIS is finalized. To require otherwise would render agency decision-making intractable, always awaiting updated information only to find the new information outdated by the time a decision is made.").

The environmental group claimed that a supplemental EA was required because: (1) the reduction in timber sale volume was a substantial change in the action; and (2)

significant new information has come to light regarding the timber supply. The Tenth Circuit upheld the EA and found that no supplemental EA was required because the agency correctly determined that the reduction in timber sales was not a substantial change. It specifically noted "a reduction in the environmental impact is less likely to be considered a substantial change relevant to environmental concerns than would be an increase in the environmental impact."

VIII. TIERING

Defenders of Wildlife v. Bureau of Ocean Energy Management, 684 F.3d 1242 (11th Cir. 2012). Advocacy groups challenged an exploratory drilling plan, the Shell Exploration Plan ("Shell EP"), approved by the Bureau of Ocean Energy Management ("BOEM"). The Shell EP covered ten exploratory wells on offshore Alabama leases in the Central Gulf of Mexico. The challenge asserted violations of NEPA and ESA by the BOEM. BOEM prepared tiered EAs for an offshore oil lease sale (for research and development) based off two broad environmental impact statements.

The court examined the EA and found that it contained a plethora of site-specific information on the potential impacts from Shell's proposed exploratory drilling, including known environmental impacts from the *Deepwater Horizon* spill. The EA described site-specific atmospheric conditions, water quality characteristics, likely impact on water quality, possible impact on deepwater coral and marine mammals including specific species of sea turtles, and effects of accidental events.

The advocacy groups argued that BOEM could not rely on tiering from the 2007 EIS and 2009 Supplemental EIS because those studies were outdated after the *Deepwater Horizon* disaster. It considered this argument and stated that tiering allows BOEM to rely on prior work to inform a decision on a current lease. BOEM validly relied on the prior EIS's, but also evaluated mitigation measures adopted after the *Deepwater Horizon* disaster as factors to consider in determining the current risk of an oil spill. The court upheld the EA and explained that because (1) BOEM included all known information about the spill in the Shell EP and (2) BOEM reported that the conclusions from the most recent supplemental EIS - this analysis would not alter any conclusions presented in the 2007 and 2009 EIS's.

IX. PUBLIC INVOLVEMENT

Bering Strait Citizens for Responsible Resource Development v. United States Army Corps of Engineers, 524 F.3d 938 (9th Cir. 2007). A citizen's group challenged the Army Corps of Engineers ("Corps") with a violation of NEPA for granting a permit for the Rock Creek Mine Project, consisting of two open-pit gold mines at separate locations outside of Nome, plus facilities built for recovering and processing gold ore in Alaska.

The citizens' group argued that the Corps did not provide adequate public notice and comment under NEPA because it did not circulate a draft EA before the final EA

was completed. The citizens' group claimed that a draft EA must be circulated to comply with NEPA.

The court held that the circulation of a draft EA is not required in every case. Instead, the Ninth Circuit stressed that the regulations governing public involvement in the preparation of EAs are general in approach, citing to CEQ Regulations, and that requiring the circulation of a draft EA in every case would apply a level of particularity to the EA process that is foreign to the regulations. The court explained that requiring the circulation of a draft EA in every case could require the reversal of permitting decisions where a draft EA was not circulated even though the permitting agency actively sought and achieved public participation through other means.

The court characterized its result as consistent with the views of other Circuits. It then enunciated the following "rule": "An agency, when preparing an [environmental assessment], must provide the public with sufficient environmental information, considered in the totality of circumstances, to permit members of the public to weigh in with their views and thus inform the agency decision-making process." The court upheld the Corps' EA and found the agency took a "hard look."

X. ANALYSIS OF CLIMATE CHANGE IMPACTS

Barnes v. U.S. Dep't of Transp., 655 F. 3d 1124 (9th Cir. 2011). This Ninth Circuit case involved a challenged to an EA, prepared by the FAA, analyzing the proposed construction by the Port of Portland of a new runway at Hillsboro Airport in Oregon. Plaintiffs argued that the decision not to prepare an EIS was unreasonable for several reasons, one of which was the context and intensity of the impacts required an EIS.

The court stated that the FAA was required to consider the environmental impacts of increased demand resulting from the airport expansion project. However, the court found that merely the "context and intensity" of the project did not independently require an EIS.

The court rejected plaintiffs' argument that the EA was deficient because its analysis of greenhouse gases was not specific to the locale, and explained that "the effect of greenhouse gases on climate is a global problem; a discussion in terms of percentages is therefore adequate for greenhouse gas effects."

The court clarified that the expansion from greenhouse gas effects are not "highly uncertain," but rather that "there is ample evidence that there is a causal connection between man-made greenhouse gas emissions and global warming, citing to the seminal case of *Massachusetts v. E.P.A.*, 549 U.S. 497 (2007). The court described that the EA:

> includes estimates that global aircraft emissions account for about 3.5 percent of the total quantity of greenhouse gas from human activities

> and that U.S. aviation accounts for about 3 percent of total U.S. greenhouse gas emissions from human sources. Because the [airport] represents less than 1 percent of U.S. aviation activity, greenhouse emissions associated with existing and future aviation activity at HIO are expected to represent less than 0.03 percent of U.S.-based greenhouse gases. Because this percentage does not translate into locally-quantifiable environmental impacts given the global nature of climate change, the EA's discussion of the project's in terms of percentages is adequate.

On this point, the court found the EA adequate, although ultimately it remanded the EA back to the FAA to correct an inadequacy of impacts on other grounds.

APPENDIX C
FUNDAMENTAL PRINCIPLES FROM OTHER USES OF ENVIRONMENTAL ASSESSMENT

As noted in Section 1, the term “environmental assessment” is most frequently used in the United States to denote a NEPA compliance document wherein no significant impacts on pertinent biophysical resources nor socio-cultural features are associated with a proposed action. Such findings could be based on existing environmental conditions and trends in the study area and the extent of environmental effects from the action. If significant effects are anticipated, it might be possible to identify and employ effective mitigation measures to reduce the effects to a non-significant level.

The term environmental assessment is also used by development banks (e.g., the World Bank) and environmental agencies in other countries to denote a study of environmental and social effects from an action. Corollary terms for these international EAs frequently include “environmental impact assessments” and even “environmental impact statements”.

Further, some Federal agencies in the United States use “environmental assessment” to refer to historical to current to future environmental conditions within specific study areas. Such assessment reports could be supportive to NEPA compliance documents (EAs and EISs) and included as appendices or supporting scientific information. These environmental condition reports are also used to support applications for various permits. Examples of Federal agencies using environmental assessments as condition documents include the U.S. Environmental Protection Agency and several entities within the U.S. Department of the Interior.

Suter and Cormier (2008) have described a theory of practice for environmental assessments that is more focused on specific environmental conditions. Their theory also has relevance to EAs as NEPA compliance documents, and can potentially serve as a foundation for this survey of BPPs for EAs used as compliance documents. They begin by noting that general environmental assessment is needed because (Suter and Cormier, 2008, p. 478):

- People depend on the environment for goods, services, and well being.
- People’s actions inevitably alter the environment.
- Environmental alterations might be unacceptable or irreparable.
- The nature and implications of the alterations might be unrecognized without formal analysis because of the complexity of the environment.
- Scientifically based assessments provide the most reliable basis for determining causes and estimating environmental services and well-being.

In addition, they identified three axioms and 19 associated principles which should provide a foundation for such environmental assessments. Table C.1 lists the axioms and principles (Suter and Cormier, 2008, p. 480). In this context, an axiom refers to a self-evident truth or an accepted principle or rule. The listed principles represent further characterizations of the axioms. In conclusion, it should be noted that the axioms and principles in Table C.1 provide a useful background framework for the development of BPPs for preparing NEPA-compliant EAs. These topics were considered and served as foundational principles for the development of the BPPs for EAs.

Table C.1: Axioms and Associated Principles Related to General Environmental Assessment Studies (Suter and Cormier, 2008, p. 480)

Axiom 1: Assessments inform environmental management decisions – key related principles are that:

- Assessments are comparative
- Assessors must know about the decision, the decision maker(s), and the bases for the decision
- The form of the assessment results must be appropriate to the decision
- Assessment results must be understandable by the decision maker
- Assessments must convey the importance and urgency of the results
- Resources are limited and results should not be more complex than necessary to inform the decision

Axiom 2: Assessments are science based – key related principles are that:

- Science explains the past or predicts the future
- Scientific quality must be assured
- Assessors must be unbiased

Axioms 1 and 2: Assessments inform decision processes and are science based – key related principles are that:

- Assessments must be based on causal relationships, assessments must address exposure, and assessments must define a functional relationship between exposure and effects.
- Uncertainty is always present and must be presented in a way that is useful to the decision
- Policy is input to assessments, not generated by assessors -- – a key related principle is that assessors must translate goals and policies into operational terms.

Axiom 3: Management decisions must accommodate multiple goals and constraints – key related principles are that:

- Assessments must integrate across disciplines
- Assessments must integrate across sources of information
- Assessments must integrate across scales and levels of organization

APPENDIX D

QUESTIONNAIRE FOR BPPs IN EAs

This survey instrument has been prepared by the National Association of Environmental Professionals as part of a Council on Environmental Quality (CEQ) Pilot Project on Best Practice Principles (BPPs) for Environmental Assessments (EAs) prepared under the National Environmental Policy Act. The fundamental premise is that BPPs should be derived from an approach which seeks to assimilate experience and knowledge from practitioners who have prepared and/or reviewed actual EAs. This survey is the tool which is being used to delineate appropriate BPPs. The developed BPPs will be compatible with case law; consistent with scientific principles, policies, and institutional requirements; based upon prior successful usage; supportive of existing analytical frameworks; and adaptable to various conditions. The results of the survey questionnaire will presented to the NAEP membership at the Portland, Oregon annual conference, May 24, 2012. A final report to CEQ will follow in mid-summer 2012.

This instrument includes 23 questions organized into four categories (five respondent-related questions, two situational questions, 14 topically-related questions, and two questions on concluding issues). You should be able to complete the questions in approximately 10-15 minutes.

Thank you for your participation in this survey!

1. Are you an NAEP member?

- Yes
- No

2. How many years of experience do you have in the planning, preparation and/or review of EAs? (Years of Experience)

- Less than three years
- Three to 10 years
- 10 to 20 years
- Greater than 20 years

3. What has been your primary responsibility regarding the use of EAs for NEPA compliance documentation?

- Leader of a team preparing an EA
- Preparer of a portion of an EA
- Preparer of the entire EA
- Reviewer of an EA
- Other (please specify)

4. What is your professional area of expertise? Please check all that apply from the following list.

- Archeologist
- Attorney
- Biologist
- Chemist
- Economist
- Engineer
- Environmental scientist
- Forester
- Generalist
- Geographer
- Noise specialist
- Planner
- Policy analyst
- Sociologist
- Soil scientist
- Water resources specialist

Other (please specify)

5. Identify your primary area of employment relative to your work on EAs.

- Federal agency
- State or local agency
- Consulting firm
- Academia
- Consulting firm under contract with Federal agency
- NGO/Non-Profit
- Law Firm

Other (please specify)

Situational Questions

6. Based upon your general NEPA knowledge and EA experience, prioritize the relative importance of the following inadequacies which have historically been identified in litigation and public comments and criticisms on specific EAs. Use a numbering scale of 1 to 3, with 1 denoting highly important, 2 denoting medium in importance, and 3 indicating minor importance.

	1	2	3
No clear delineation of impact significance			
Omission of or inadequate agency coordination related to the Endangered Species Act			
Inadequate coordination relative to cultural resources laws, e.g., National Historic Preservation Act			
Concerns regarding the effectiveness of impact mitigation measures			
Concerns regarding the implementation of impact mitigation measures			
Absence of public participation for large-scale EAs ("super EAs")			
Absence of a "hard look" regarding specific types of impacts			
Minimal information on the scientific basis for stated impacts			
Poor writing and editing			

Other (please specify)

7. Based upon your general NEPA knowledge and EA experience, list three features which are typically associated with adequate EAs.

Feature 1:

Feature 2:

Feature 3:

8. The concept of EAs, as they were originally introduced in the 1979 CEQ regulations, was that they would be short in length (15 pages) and focused on delineating the significance of key impacts from the proposed action. If non-significance was determined, then a FONSI could be prepared. Conversely, if significant and non-mitigable impacts were found, then an EIS was needed. Over the years, many EAs which are hundreds of pages long have been generated, and assertions related to non-significant impacts have been included without documentation of analyses or significance criteria. Litigation related to inadequate EAs has dominated NEPA case law for over 30 years. Accordingly, a growing recognition is that several levels of EAs are now being prepared. This questionnaire refers to three such levels:

• Super EAs – lengthy documents (several hundred pages) with potentially significant direct, indirect, and/or cumulative effects. They often appear to be EISs by another name. They could include mitigation requirements as appropriate.
• Mitigated FONSI EAs – documents which are 50 to 200 pages in length, and which specify mitigation measures for specific types of impacts.
• Small-scale EAs – these EAs are shorter in length and analogous to the original EA concept as introduced in 1979.

Based upon the range of the levels, it seems appropriate that some BPPs could apply to all levels, while others would be specific for the unique levels. Does this approach seem reasonable?

Yes

No

Please list any comments on other levels or additional concepts you would like to introduce.

9. In keeping with the spirit and intent of NEPA, it is assumed that alternatives will need to be included in all three levels of EAs. However, the extent of coverage could be matched to the level. To provide input to this concept, please check one of the following number of alternatives for each level of EA. Assume that one of the alternatives is the No-Action Alternative.

	2	3-4	>4
Super EA	☐	☐	☐
Mitigated FONSI EA	☐	☐	☐
Small-scale EA	☐	☐	☐

10. Selection of pertinent issues and impacts for study within an EA, including potentially affected resources, should be a cornerstone of EA practice. Further, the selection process and outcomes should be appropriately described in the EA. Do you agree with these statements?

☐ Yes

☐ No

Comments:

11. The CEQ regulations contain a brief topical outline for EAs in Section 1508.9(b). The format for an EIS is in Section 1502.10. Please indicate your response to the following postulates.

	Agree	Disagree
For a super EA, the EIS format in Section 1502.10 should be used.	☐	☐
For a mitigated FONSI EA, the EIS format in Section 1502.10 should be used; however, the topical coverage could be reduced.	☐	☐
For a small scale EA, the topical outline in Section 1508.9(b) could be used with slight modification.	☐	☐

Comments:

12. Should a range of page limits be established for the three levels of EAs?

Yes

No

If your answer is Yes, please indicate a range of page limits for each EA level.

13. Section 1508.27 of CEQ's regulations defines both context and intensity considerations (10 topical issues) relative to determining the significance of impacts on bio-physical and socio-cultural resources. Many EAs include assertions regarding no significant impacts; however, related analyses may not be described, nor referrals be made to Section 1508.27. Accordingly, please check the importance of documented analyses in the following types of EAs.

	Low Importance	Medium Importance	High Importance
Super EA			
Mitigated FONSI EA			
Small EA			

14. Some federal laws and regulations contain impact significance criteria which could be used in the preparation of EAs. Examples of such laws and related regulations include the Clean Air Act, Clean Water Act, Endangered Species Act, and the Marine Mammal Protection Act. Would it be useful to develop a composite report of such laws and criteria, and then make this available to all federal agencies?

Yes, it would be useful

No, it would not be useful

Comments

15. An issue which can arise during the preparation of an EA is associated with incomplete or unavailable information regarding the significance of adverse effects from the proposed action (preferred alternative) or alternatives. Section 1502.22 of CEQ's NEPA regulations describes a procedure for addressing this issue in EISs. Should this issue be ignored at the EA level?

Yes

No

16. If your above answer (to question 15) was "No", which of the following would you recommend for incorporation in a BPP for this issue?

	Yes	No
For a "super EA", apply the Section 1502.22 procedure and carefully document the findings		
For a "mitigated FONSI EA", apply and document the Section 1502.22 procedure with regard to information on the effectiveness of the mitigation measures		
For routine "short EA", briefly document the completeness of available information regarding the non-significance of adverse effects		

17. Should public and agency scoping, as well as the preparation of scoping reports, be included for:

	Yes	No
Super EAs		
Mitigated FONSI EAs		
Small-scale EAs		

18. Should the following types of draft EAs be circulated for solicitation of public reviews and comments; with the final EAs including responses to the received comments?

	Yes	No
Super EAs		
Mitigated FONSI EAs		
Small-scale EAs		

19. Cumulative impact (effect) is defined in Section 1508.7 of the CEQ's regulations. Relative to the three levels of an EA, do you agree or disagree with the following statements:

	Agree	Disagree
Due to the large geographical and impact scales of a "super EA", careful attention must be given to the use of CEQ's 11-step Cumulative Effects Assessment and Management (CEAM) process for key resources		
For small-scale EAs with minimal identified impacts, only cursory consideration needs to be given to CEAM. However, the consideration should be appropriately documented.		
For medium level EAs which include mitigated FONSIs, CEAM should be considered for key resources potentially subjected to adverse cumulative effects. In addition, documentation of the applied CEAM process should be included in the EA.		

20. Addressing climate change in NEPA compliance documents has been increasing, particularly regarding EISs. In some cases, e.g., for super EAs, it may be expedient to develop greenhouse gas emissions inventories and also to consider the effects and consequences of climate change in the area wherein preferred alternatives will be located. Further, some mitigated FONSI EAs may need to address both inventories and locational climate change effects and their implications for the preferred alternatives. However, small-scale EAs will probably not require any specific analyses of climate change. Do you agree with the above statements?

Yes

No

Please provide other comments on climate change analysis in EAs.

21. Section 1502.9(c) of the CEQ's NEPA regulations indicates that agencies "....shall prepare supplements to either draft or final EISs if: (1) the agency makes substantial changes in the proposed action that are relevant to environmental concerns; or (2) there are significant new circumstances or information relevant to environmental concerns and bearing on the proposed action or its impacts." Further, it is noted that agencies "...may also prepare supplements when the agency determines that the purposes of NEPA will be furthered by doing so." Based on the above, should the concept of supplements be considered for:

	Yes	No
Large-scale (Super EAs)	☐	☐
Mitigated FONSI EAs	☐	☐
EAs for small-scale projects	☐	☐

Other comments concerning supplemental EAs:

22. Assume that a series of BPPs for EAs is developed based upon the results of this questionnaire survey. Even though such BPPs could be articulated, institutional or financial barriers could occur regarding their implementation. If such barriers are identified, it could be possible to develop a national implementation strategy for addressing them. Accordingly, please list two barriers you think could be the most difficult to overcome.

Barrier 1:

Barrier 2:

23. Identify positive actions that could be taken by federal agencies, NAEP, and consulting firms relative to implementation of anticipated BPPs for EAs. Please add your suggestions to the following list.

- Include BPPs in contractual scopes of work for the preparation of EAs.
- Federal agencies and/or consulting firms should develop training courses to further explain anticipated BPPs and their application.
- Conduct special studies of case law or other subjects that could be used to support BPPs for EAs.

Other Suggestions:

5

6

APPENDIX E

COMPLETE ANALYSIS OF ALL QUESTIONNAIRES

Question 1 -- Are you an NAEP member?

Answer	Response Count	Response Percent
Yes	240	75.5
No	76	23.9
Did Not Answer	2	0.6
TOTALS	318	100.0

Observations on Responses

A total of 1061 questionnaire surveys were sent to 811 NAEP members and to 250 NEPA professionals in government who are included on a CEQ list of collaborators. A small number of individuals (25 or less) could have been on both lists. Survey Monkey was used as the tool for compiling respondee inputs. The 318 responses to Question 1 indicated that 30% of the total recipients participated in completing the questionnaire survey. Regarding NAEP membership, 240 respondees were members (a response rate of 240 out of 811 members receiving the survey, or 29.6%). Federal employee responses (76 out of 250) indicated a response rate of 30.4%. These response rates exceeded the study team's initial anticipated rate of 20%.

Bottom Line

The overall response rate of 30% (318 out of 1061) to Question 1 indicated a high interest by the respondees to the survey and their perceived need for producing EAs that are more systematically prepared and consistent in their topical contents.

Question 2 -- How many years of experience do you have in the planning, preparation and/or review of EAs?

Years of Experience	Response Count	Response Percent
Less than three years	26	8.3
Three to 10 years	67	21.3
10 to 20 years	96	30.4
Greater than 20 years	126	40.0
TOTALS	315	100.0

Observations on Responses

Survey results indicated that the respondees have considerable experience in the NEPA compliance field, including preparing and reviewing EAs. Only 8.3% had less than 3 years of experience, while 91.7% had more than 3 years in the field. A total of 40% had greater than 20 years experience, while the cumulative total of greater than 10 years experience was 70.4%.

Bottom Line

The responses to Question 2 demonstrate that the respondees were experienced in the preparation, coordination, and review of EAs. This survey was focused on extracting professional knowledge and judgment from practitioners, and the responses reflect that experienced professionals were major participants in the survey.

Question 3 -- What has been your primary responsibility regarding the use of EAs for NEPA compliance documentation?

Responsibility	Response Count	Response Percent
Leader of a team preparing an EA	115	39.7
Preparer of a portion of an EA	51	17.6
Preparer of the entire EA	44	15.2
Reviewer of an EA	80	27.6
TOTALS	290	100.1

Other (please specify) – 34 comments received. They are categorized into two groups.

All Four Above-listed Responsibilities (16 comments)

- Actually all of the above
- All at different points in career
- All of above
- All of above. Currently policy and oversight
- All of the above
- All of the above apply. It depends on the situation.
- All of the above
- All of the above
- All of the above
- All of the above
- Have done all roles during my career
- All 4 (from list in Q3)
- All of the above in previous roles
- All of the above
- All of the above
- All above apply

Other Responsibilities (18 comments)

- Varied
- Environmental policy analyst
- Reviewing attorney
- Setting policies for EA
- Leader of team preparing an EIS
- Hazardous waste
- Work not in conjunction with NEPA
- Limited review of EA prepared by GSA on behalf of my agency
- Manage those who prepare/review

- None. I don't use EAs for NEPA compliance documentation
- Policy oversight nation-wide and all of the above-listed responsibilities
- Regulation development, guidance preparation, training
- Teach NEPA courses
- Also reviewer of EAs
- Head of EA approvals for a federal agency
- My agency and department will soon be required to review transportation project EAs for completeness
- None
- NEPA Program Point of Contact

Observations on Responses

Survey results indicated that 290 of the respondees completed Question 3. Of that number, 115 respondees (39.7%) indicated that they have served as a team leader in the preparation of an EA. Further, 80 respondees (27.6%) had reviewed one or more EAs. Other respondees have prepared entire EAs (44 persons or 17.6%), or they have prepared a portion of an EA (51 persons or 15.2%). These results indicate that the respondees are broadly experienced in the practice of preparing EAs as NEPA compliance documents.

A total of 34 comments were provided on Question 3. As demonstrated above, 16 commenters indicated they had experience in all four areas of responsibility. Eighteen other commenters listed a variety of other responsibilities; several identified higher-level agency NEPA oversight responsibilities, or roles in policy development and professional training.

Bottom Line

The responses to Question 3 demonstrate that the respondees have extensive experience in planning, preparing, and reviewing EAs generated by a diversity of agencies. Their experience will provide a foundation for the delineation of BPPs.

Question 4 – What is your professional area of expertise? Please check all that apply from the following list.

Area of Expertise	Response Count	Response Percent
Archeologist	19	3.0
Attorney	18	2.9
Biologist	84	13.3
Chemist	5	0.7
Economist	10	1.67
Engineer	29	4.6
Environmental Scientist	159	25.2
Forester	14	2.2
Generalist	53	8.4
Geographer	19	3.0
Noise Specialist	11	1.7
Planner	95	15.1
Policy Analyst	49	7.8
Sociologist	7	1.1
Soil Scientist	10	1.6
Water Resources Specialist	49	7.8
TOTALS	631*	100.0

* 300 persons completed Question 4; each person averaged listing over two professional areas of expertise

Other Areas of Expertise – 45 listed; they included the following:

- Environmental Management (OS&H)
- Atmospheric scientist
- Cultural resources specialist; architectural historian
- Historic preservation specialist; historian
- Toxicologist
- Lawyer
- City planner
- Environmental consultations; meteorologist, ecologist
- CHMM 15 years; air quality specialist
- NEPA
- Permitting
- University professor
- Physical scientist
- Geologist (4)
- Paralegal
- Wildlife, aquatic resources, land management

- Geologist/hydrologist
- Wildland fire ecology
- Construction environmental issues
- Legal
- Architectural historian
- Certified Project Manager
- Project and program management
- Air quality and contamination
- Aquatic ecologist
- Environmental manager
- Instructor in natural resource policy
- Architect, Program Manager
- Technical writer
- Public outreach, behavioral psychology
- Architect
- Marine environmental restoration
- Traditional knowledge
- Engineering geologist
- Geologist/hydro-geologist
- Environmental policy
- Ecologist
- Project Manager; EHS
- Program analyst
- Wetland scientist
- Minerals and land authorizations
- Toxicologist
- Environmental protection specialist
- Geologist; botany, but you left some off, e.g. wetlands/ecology
- Geologist/geophysicist

Observations on Responses

Sixteen areas of expertise are listed in Question 4, and the respondees were asked to check all that applied to them. Accordingly, over 600 responses were received (over 2 per respondee), along with 45 other areas of expertise. The six most frequently identified professional areas include environmental scientist (25.2%), planner (15.1%), biologist (13.3%), generalist (8.4%), and policy analyst and water resources specialist (7.8% each). Based on the Question 4 table above, and the other listed areas, 61 professional areas were identified; thus the questionnaire respondees exhibited a diversity of expertise relative to their work on EAs.

Bottom Line

The respondees represented a diversity of professional backgrounds and experience. This diversity is supportive of the use of interdisciplinary approaches in preparing, coordinating, and reviewing EAs.

Question 5 – Identify your primary area of employment relative to your work on EAs.

Area of Employment	Response Count	Response Percent
Federal Agency	120	39.3
State or Local Agency	21	6.9
Consulting Firm	144	47.2
Academia	3	1.0
Consulting Firm under Contract with Federal Agency	11	3.6
NGO/Non-Profit	3	1.0
Law Firm	3	1.0
TOTALS	305	100.0

Other Areas of Employment – 20 listed; they included the following:

- Not currently working on EA
- Under contract of governmental agencies not just Federal
- Egyptian Modern Center
- Justice Department
- Was with state DOT for 12 years before working with Federal Agency
- Independent consultant
- Also consulting firm with contracts with federal, state, local agencies
- Electric utility
- Contractor
- Fortune 500 company
- Manufacturer
- Also have 14+ years for Federal Agency
- Management & operating contractor for Federal Agency
- Applicant whose projects require EA/EIS
- Now working local government
- Utility employee
- Also prepared through non-profit
- Consultant under contract with grantee/permittee
- Have been in academia, consulting, and NGO
- Commercial Testing Laboratory

Observations on Responses

Seven areas of employment are listed in Question 5; further, an additional list of 20 other areas were provided in comments. Out of 305 respondees, consulting firms

represented 47.2% of the individuals (144 out of 305), while Federal agencies employed 39.3% (120 out of 305). Based upon the seven areas listed in the Question 4 table above, along with 20 others listed separately, the questionnaire respondees exhibited a diversity of categories of employers.

Bottom Line

The respondees represented a diversity of employers involved in NEPA compliance work encompassing EAs. This diversity supports the target audience which was sought; that is, knowledge and experience of professionals from both government and the private sector was sought.

Question 6 -- **Based upon your general NEPA knowledge and EA experience, prioritize the relative importance of the following inadequacies which have historically been identified in litigation and public comments and criticisms on specific EAs. Use a numbering scale of 1 to 3, with 1 denoting highly important, 2 denoting medium in importance, and 3 indicating minor importance.**

Inadequacy	Importance Scale 1	2	3	Rating Average	Response Count
No clear delineation of impact significance	**56.6% (158)**	**34.4% (96)**	9.0% (25)	1.52	279
Omission of or inadequate agency coordination related to the Endangered Species Act	36.6% (102)	**40.9% (114)**	22.6% (63)	1.86	279
Inadequate coordination relative to cultural resources laws, e.g., National Historic Preservation Act	33.6% (94)	**45.0% (126)**	21.4% (60)	1.88	280
Concerns regarding the effectiveness of impact mitigation measures	38.3% (106)	**44.4% (123)**	17.3% (48)	1.79	277
Concerns regarding the implementation of impact mitigation measures	42.4% (118)	**42.4% (118)**	15.1% (42)	1.73	278
Absence of public participation for large-scale EAs (“super EAs”)	34.1% (95)	**41.9% (117)**	24.0% (67)	1.90	279
Absence of a “hard look” regarding specific types of impacts	**47.3% (133)**	39.1% (110)	13.5% (38)	1.66	281
Minimal information on the scientific basis for stated impacts	38.1% (106)	**46.8% (130)**	15.1% (42)	1.77	276
Poor writing and editing	34.5% (96)	**36.3% (101)**	29.1% (81)	1.95	278

Other (please specify) – 33 comments were received; they are characterized into eight groups.

Inadequate Explanation of Need for Action

- Inadequate explanation of need for action
- Process, defendable P&N, defendable reasonable alternatives

Inadequate Description of Proposed Action

- Poor description of proposed project; environmental justice
- No clearly defined project description or insufficient detail on proposed actions. Also, absence of alternatives or poorly researched/defined alternatives
- Poorly-stated project description/purpose and need
- Proposed action not clearly defined or too technical to understand

Inadequate Consideration of Alternatives

- Alternatives screening
- Disagreement about alternatives; air quality analysis
- Inappropriate evaluation of alternatives
- Too narrow range of alternatives & purpose & need not clearly delineated and confused with proposed action
- Lack of understanding regarding the need for alternatives
- Inadequate consideration of alternatives that would reduce impact levels
- Failure to consider obvious alternatives, and reverse engineering purpose and need to fit the proposed action.

Incomplete Impact Analysis

- Lack of quantification of impacts
- Inadequate scoping

Inadequate Cumulative Impact Analysis

- Lack of cumulative impact analysis
- Cumulative impacts not addressed, nor hard look taken
- Cumulative effects analysis
- Insufficient cumulative impacts analysis

Incomplete Coordination with Other Agencies

- Omission of Section 4(f) analysis when applicable
- Lack of coordination with agencies and clear direction when coordinating is the biggest hurdle
- Ability to use a standard format, cumulative impacts, climate change analysis, inadequate agency coordination to other laws that provide necessary information to understand how impacts may be mitigated (CWA, CAA, etc)

- Does not adequately address impacts to Native Americans/Alaskans/Hawaiians; does not include Traditional Knowledge of Indigenous Peoples (when applicable) on equal footing
- Lack of coordination with permitting agencies or staff

Minimal to No Scientific-Based Writing

- Need to emphasize concise writing and "plain English" rather than using too much jargon
- Needs to identify preparers

Other Inadequacy Concerns

- Need for supplemental draft release prior to final
- Political direction of EA results
- EAs used in place of EISs because of a false sense of expediency with a mitigated FONSI EA over a properly executed EIS, especially programmatic or policy-level EIS.
- This question is confusing - is it to rate how important these inadequacies would be if they occurred in an NEPA document or how important/common/legitimate are these inadequacies based on my past experience with NEPA documents in general? I rated them according to the latter
- EA after the real decisions have been made on a project design
- Use of "pre-screening" options to exclude some options and steer the outcome towards a desired agency or political outcome.
- The nine listed inadequacies in the above chart are all potentially fatal if not done right.

Observations on Responses

A total of 281 respondees provided input on their perceptions of the key inadequacies in EAs and their associated need for topical coordination with other agencies. The Question 6 table above lists nine inadequacies and asks respondees to choose a relative importance number for each. The resultant “rating average” reflects the overall importance of each listed inadequacy. In this case, the lower rating averages denote that the inadequacies are more important, and they infer that attention should be given to improving on the inadequacies. Another perspective is that BPPs should be identified to address the inadequacies. The rating averages from the lowest (most important inadequacy) to the highest (least most important inadequacy, but not to be ignored) include the following:

1.52 – no clear delineation of impact significance

1.66 – absence of “hard look” regarding specific types of impacts

1.73 – Concerns regarding the implementation of impact mitigation measures

1.77 – Minimal information on the scientific basis for stated impacts

1.79 – Concerns regarding the effectiveness of impact mitigation measures

1.86 – Omission of or inadequate agency coordination related to the Endangered Species Act

1.88 – Inadequate coordination relative to cultural resources laws, e.g., National Historic Preservation Act

1.90 – Absence of public participation for large-scale EAs ("Super EAs")

1.95 – Poor writing and editing

The respondees also provided 26 additional comments related to inadequate EAs, along with seven other "inadequacy" concerns. The 26 comments address the following seven topics:

- Inadequate Explanation of Need for Action
- Inadequate Description of Proposed Action
- Inadequate Consideration of Alternatives
- Incomplete Impact Analysis
- Inadequate Cumulative Impact Analysis
- Incomplete Coordination with Other Agencies (see rating averages 1.86 and 1.88 above)
- Minimal to No Scientific-Based Writing (see rating average 1.95 above)

It should be noted that BPPs could also be identified for the five first-listed bulleted items above.

Bottom-Line

Question 6 was focused on inadequacies in EAs, and the results could be used to identify needs for BPPs. However, Question 7 asked the respondees for examples of features in adequate EAs. In composite, the 559 features listed in Question 7 encompass the above-listed inadequacies and could serve as topics to be addressed by BPPs.

Question 7 -- Based upon your general NEPA knowledge and EA experience, list three features which are typically associated with adequate EAs.

Features – A total of 269 respondees provided 535 positive features of adequate EAs, along with 24 examples of inadequacies in EAs. The inadequacies list is related to the focus of Question 6 above. The 535 positive features provide an overwhelming level of response to Question 7. The 559 total responses are divided into 24 topical categories. The first 23 categories are related to the planning and contents of adequate EAs. The 24 comments on inadequacies in EAs are contained in the last category which is entitled "Examples of Inadequacies in EAs". The listed items within any of the 24 categories could be duplicative. However, for completeness, they were all listed in their order of appearance in the Survey Monkey results for Question 7.

Leadership and Membership of EA Preparation Team

- Good team leadership
- Multidisciplinary team preparation
- Use of a multi-disciplinary team; for identified impacts, proper/implementable mitigation

Planning of EA

- Adequate reference to early (e.g. planning) analyses
- Planning
- Clear and effective process
- Experience usually shows - be comprehensive
- Clear planning timeline
- Timely
- Sufficient time/money for adequate and correct detail; clear, concise writing
- Clear project planning
- An interdisciplinary approach not a multidisciplinary one
- Well-developed scope for which key party input was sought
- Logical progression: alts - analysis - impacts – mitigation; clear conflict / impact resolution

Executive Summary

- Executive summary that prioritizes the most important impacts, and explains what has been put in place to mitigate the impacts to make them less than significant
- Clear conclusions regarding impacts; public involvement; good purpose and need statement; clear project description; discussion of alternatives considered
- Clear, but concise, basis for conclusions
- Conclusions being supported by strong findings
- Clearly articulated description of the relevant issues

- Factual basis for conclusions; agency involvement; complete disclosure of all impacts: context/intensity; defined project goals and objectives; adequate public and agency involvement
- Analysis and documentation supports impact conclusions; scientific basis

Description of Purpose and Need

- Clear purpose and need statement
- Clarity; clear purpose and need
- Clear purpose and scope
- Clear description of need for project; good basis for results
- A clearly defined purpose and need statement; protocol; clearly developed alternatives
- Thorough look at all resources; clear concise project purpose and need
- Clear and objective description of project purpose
- Clear statement of purpose and need
- Clear purpose and need
- Clear statement of purpose and need
- Clearly articulated purpose and need; impact evaluation based on good data and research
- Clearly-stated project description/purpose and need; impact significance
- Clearly defined "Need"
- Focused purpose and need
- Clear description of the purpose and need
- Good description of purpose and need
- Clear, concise purpose and need
- Clearly defined purpose and need
- A clearly stated purpose and need
- Clear statement of purpose and need, distinguished from "proposed action"
- Complete description of purpose and need
- Clear, concise statement of purpose and need
- Clear purpose and need
- Clear purpose and need; commitments and recommendations; project description
- Well substantiated purpose and need
- Well-developed purpose and need
- Clear concise purpose and need
- Clear purpose and need for project
- A good purpose and need
- Clear purpose and need
- Clearly defined purpose and need
- Project need discussion
- Clear statement of purpose and need
- Precise statement of purpose and need
- Clear statements of purpose and need, proposed action and alternatives

- Defining purpose and need to narrowly, specifically in the case where there is a 3rd party applicant; good public involvement; adequate length for analysis, not repetitive, etc.
- Solid purpose and need
- Good purpose and need
- A clear purpose and need; well organized; mitigations measures that can be accomplished
- Succinct statement of project purpose and need; sufficient description of impacts, both context and intensity, not unsupported assertions
- Clear definition of project purpose and footprint/impacts
- Clearly defined purpose and need
- Purpose and need are properly defined and distinguished from proposed action
- Purpose and need
- Strong purpose and need and reasonable range of alternatives; adequate historical documentation
- Clearly defined purpose and need; concise definitions of impact scale (minor, moderate, significant); cumulative impacts

Description of Proposed Action/Activity and Alternatives

- Clearly defined alternatives
- Clear; clear project description; science-based
- Clear description of proposed project with realistic explanation of need
- Clear descriptions of alternatives
- Identifying agency action and agency authority for action; public participation
- Well-defined proposed action and alternatives
- Clear project description
- Well thought alternatives
- Clearly defined action and it's scope
- Adequate range of alternatives
- Clear description of the proposed action
- Adequate engineering
- Well defined proposed action (Chapter 1 and 2) with lots of detail
- Adequate description of action, alternatives, purpose and need
- Excellent DOPAA; based on scientific fact
- Clear, concise analysis of a reasonable suite of alternatives
- Adequate project description
- Delineation of alternatives
- Avoidance alternatives
- Adequate project description
- Clearly defined project
- Good description of the proposed action.
- Clear explanation of the proposed action
- Clear project description, including connected actions

- Clearly defined proposed action; historic research
- Thorough project description; detailed site visit documentation of AOCs
- Clear description of the action
- Good description of proposed action
- Clear alternatives that meet the agency goal; inclusion of important potential impact areas
- List of viable alternatives; thorough alternatives review
- Well described alternatives; clear identification of mitigation and commitments
- Writing a good DOPAA
- Range of alternatives, not just the action and no action
- Includes a range of reasonable alternatives; technical data summarized in the EA with the full technical studies as appendices
- Clear description of project action (DOPAA)
- Clearly defined and researched alternatives
- Adequate alternatives
- Reasonable range of alternatives to address resource conflicts and meet purpose and need
- Clear screening criteria to determine "reasonable" alternatives; adequate public involvement and agency coordination
- Alternatives
- Clear description of the proposed action alternative (project)
- Good description of proposed action, such that there is a clear relationship between the identified potential for impacts
- Description of proposed action
- Reasonable alternatives
- Complete description of alternatives
- Strong breadth and analysis of alternatives
- Clear, concise description of proposed action
- Clear and specific proposed action
- Adequate range of alternatives; impacts assessment and mitigation; focus of reason for EA
- A good description of proposed action and alternatives
- Higher level of engineering/design detail in document
- Adequate reasonable range of alternatives
- A detailed project description; good scoping record
- Clear explanation of realistic alternatives
- Complete definition of proposed action and alternatives
- Project description that shows the EA author(s) understand the 'how tos' for the actual project implementation (e.g., construction means/methods)
- Clear description of project with no loose connected actions unaccounted for
- No Build remains an option plus early opportunity for public involvement/comment
- The proposed action and alternatives are clearly explained
- Good range of alternatives

Scoping Process

- Addressing germane issues
- EA properly scoped with primary stakeholder(s); comprehensive coverage of elements of environment
- Concise and focused on relevant issues (do not have to cover every environmental topic if irrelevant to proposed action)
- Properly scoped and not piecemealed from a larger proposal found to have potential for significant effects
- Good scoping; thorough
- Comprehensive environmental scope
- Use scoping to identify the handful of resources that warrant analysis; potentially significant impacts clearly reduced to less than significant levels; objective analysis
- Adequately conducted and documented public and agency scoping; analysis of a range of alternatives
- Public scoping and agency coordination early in process
- Appropriate scope; fully coordinated
- Early scoping
- Good public notice.
- Clearly defined scope
- Proper scoping

Description of Study Area and Resources

- Focus on existing or affected resources and dismiss others
- Detailed affected environment section
- Clear and precise definition of study area; clearly defined alternatives
- Analysis of pertinent resource impacts only
- Accurate identification of current resources
- Sufficient data; concise review
- Clear discussion of existing conditions and impacts
- Adequate description of affected environment, proposed action and alternatives
- Good definition of analysis area - spatial and temporal; clear indication of potential impact areas
- Excellent description of existing conditions and potential impacts analysis; adequate public participation
- Focus on issues of concern
- Absence of "Affected Environment Encyclopedia" or focus on impacts
- Current conditions
- Good site specific information; project need
- Focus on relevant resources that could potentially be impacted
- Sound data collection and analysis

Use of Traditional Knowledge

- Inclusion of Traditional Knowledge on an equal footing with western science (as with CEAA in Canada); public involvement; good public involvement

Description of Impact Prediction Methodologies

- Clear impact prediction methodology
- Explanation of impact assessment methodology

Comparative Impacts on Resources

- Thorough analysis of environmental impacts; clear statement of impact
- Focused on critical impacts and interactions
- Thorough discussion of proposed activity and potential for impacts
- Thorough alternatives analysis
- Comprehensive information; adequate analysis of impacts
- Excellent detail - when needed
- Strong impact delineation
- Detailed analysis
- Thorough evaluation of potential impacts
- Honest evaluation of alternatives
- Impact quantification table/matrix clearly identifying the impact
- Clear impact discussion
- Cultural resources section
- Strong assessment of significant impacts
- Comprehensive impacts section emphasizing issues in line with their relative impacts; easy to read; well defined need and purpose
- Impacts are clearly stated and explained
- Thorough examination of issues and potential impacts; Section 106; hard look
- Good discussion of impacts
- Earnest identification, evaluation, and consideration of alternatives (not a pro forma exercise); field studies are adequate; well written and easy to understand; well written and organized - brief and to the point
- Thorough analysis of alternatives
- Robust alternatives analysis
- Concise description of impacts; the review should aggregate activities that are logically or geographically related
- Adequate discussion of alternatives; follow guidance formats even as they have been modified throughout the project
- Direct, indirect, and cumulative impact analysis
- Describing impacted resource areas; adequate
- Balanced evaluation of alternatives
- Complete and accurate assessment of all resources
- Structured and focused on taking a hard look at the important resources potentially impacted
- Accurate identification of potential impacts

- If there are no impacts on a particular resource, it is explained as such in as brief a manner possible to eliminate unnecessary text
- Clearly defined impacts
- Environmental effects section based on information in affected environment
- Focus on elements of the environment that would be affected
- All relevant VECs identified; explanation for alternative selection/dismissal; clear and concise writing
- Focused analysis on the identified issues; considerate
- Full impact analysis for each alternative; honest description of risk resulting from federal action; comprehensive alternatives analysis
- Consistent alternative analysis; analysis of reasonable alternatives; thorough analysis of the effects (avoiding conclusory statements)
- Focus on only relevant impacts
- Clear, quantitative comparison of impacts among alternative courses of action to truly aid decision making
- Adequate description of impacts and mitigation
- Relationship between issues and alternatives
- Synthesis of information, analysis of data, with conclusions, even those that do not support the alternative preferred by the project proponent
- Demonstrated "hard look" taken
- Evaluation of impacts
- Impact identification and analyses
- Clear explanation of level of impacts versus other alternatives
- Transparent alternatives selection/decision-making process
- A fair evaluation of all reasonable alternatives, including the no-action alternative; clear statements of impact thresholds relative to activity
- Full disclosure of impacts
- Clear analysis of potential impacts, as opposed to cutting and pasting verbiage
- Clear, definitive alternatives analysis
- Clear identification of potential impacts; detailed decade air photo history interpretation scientific data to back up impact analyses
- Appropriate alternatives analysis
- "Apples to apples" comparison of all alternatives; site visit documentation
- Clearly articulated conclusions of effects
- Address all potential impacts adequately
- Objective
- Meaningful impact evaluation
- Explain the "why" or "because" question on effects
- Clearly defined baseline for comparison; thorough cumulative effects section; include all feasible alternatives
- Rationale for why issues are not discussed
- Factual and quantifiable resource assessments and impacts
- Adequate analysis of impacts (not simply asserting no significant impacts); most lead to a FONSI; comprehensive; clearly define impacts and mitigation measures

- Clear, objective evaluation of impacts; completed compliance with other applicable laws (ESA, NHPA, CAA, etc); hard evidence supporting findings; proposed action and alternative structure relates back to original need; alternatives to recommendations discussed; robust effort to delineate impacts; mitigation clearly explained and plan for tracking
- Alternatives according to 102(2)(E)
- Combine issues into unique impact topics based on the project and affected area
- Well supported impact conclusions; understanding the guidance and policies and their applicability
- Taking a "hard look" at possible impacts
- Analyzing a wide range of environmental impacts
- Accurate
- Focus on key impacts
- Adequate bases for conclusions regarding impacts
- Focus on potentially significant impacts
- A quantifiable assessment of impacts for each alternative; solutions; appropriate level of detail for each resource; presentation of consideration of all potential impact categories and applicable local, state, and federal laws; experience of the resource specialists
- Hard look at affected environment
- Adequate funding to assess and document potential risks and uncertainties
- Reviews and involvement by subject matter experts familiar with the action and environment action will occur; written so someone with no knowledge of the subject can understand the EA
- Impact analysis that clearly differentiates potential impacts of alternatives
- Clear, concise discussion of impacts and conclusions, properly referenced; not much different than an EIS
- Concise but complete explanation of the potential impacts and the relevant mitigation measures, if any are appropriate
- Rigorous discussion of impacts
- Documenting the "hard look" at impacts under applicable resource categories
- Early dismissal of minor and irrelevant impacts
- Familiarity with the project and expected impacts
- Adequate analysis of impacts
- Relationship between issues and environmental consequences
- Quantification of impacts with context for the impacts
- Assertions without analysis; impact conclusions that are supported by analysis; thorough analysis of applicable regulations to the project
- Selection of preferred alternative; reluctance of resource agencies to make decisions prior to receiving a permit application
- Impacts to affected environment
- Logical and thorough impact analysis of all elements
- A thorough analysis of direct, indirect and cumulative impacts associated with each resource, ecosystem or community impacted by the action; scientifically sound and implementable mitigation measures

- Adequate impact analysis; absence of a “hard look” regarding specific types of impacts
- Discussion of impacts to local economy and way of life
- Good alternatives analysis
- Complete analysis of environmental consequences
- Clear alternatives comparison including reference to the status quo science backing analysis; NEPA person understands NEPA
- Concentrate on relevant environmental topics applicable to the project, and clearly explain why other topics are not relevant to the project; good affected environment analysis; adequate public involvement and review
- Clear analysis of alternatives
- Clear analysis with straightforward presentation of potential impacts; environmental records research and review
- A concise affected environment and consequences narrative focused on key issues
- Comprehensive consideration of potential impacts; identification of positive as well as negative impacts
- Focus on relevant and de-prioritize irrelevant
- Adequate alternatives analysis
- "Significant issues" only are addressed; implementation schedule and budget are clearly defined; clear definition of mitigation measures appropriate for the impacts; evidence of public involvement that is taken seriously.
- Fair and balanced evaluation, as opposed to a "preferred outcome"
- "Hard look" at comparative environmental consequences

Cumulative Effects Assessment and Management

- Cumulative impact addressed
- Complete cumulative impact assessment section
- Cumulative impacts
- Adequate treatment of cumulative effects
- Complete cumulative effects analysis
- Comprehensive assessment of direct, indirect, and cumulative impacts
- Any major issues highlighted in the EA should be addressed in the cumulative effects section to show how the incremental effect of the proposed action will not cause a "significant" cumulative effect; present good recommendations
- Direct, indirect, and cumulative impacts addressed; clear impact analysis; legally sufficiency review by attorney
- Excellent cumulative impact analysis; reasonable basis for conclusions
- Cumulative impacts addressed
- Cumulative impacts discussion
- Quality cumulative effects analyses
- Discussion of alternatives and cumulative effects
- Complete impact analysis including cumulative; public involvement and local government consistency; mitigation

- Discussion of context and impact analysis with clear conclusions; thoughtful cumulative and indirect impacts analysis (growth inducement, etc.)
- Adequate cumulative impacts assessment including climate change

Scientific Foundation for Study and Subject Matter Experts

- Good scientific basis for impact assessments
- A good scientific basis for the stated impacts
- Objective analysis
- Evidence/rationale is provided related to conclusions and decisions
- Adequate science to back up results/determinations
- Scientifically justified
- Succinct; resource analysis, based in sound science
- Sound scientific data to support impact assessment
- Good scientific data to support the facts
- Scientific documentation
- Assessment of impacts based on science
- Technical adequacy; mitigation clearly implementable and reduce impacts; focuses on key impacts and mitigation of them
- Logic technical data
- Scientifically defensible; mitigation features that are accepted by stakeholders; clear language; fact based science
- Determination of impacts based on science
- Honest
- Substance

Regulatory Coordination/Consultation/Compliance

- Early regulatory involvement
- Adequate consultation record/resolution
- Thorough Agency coordination
- Full cooperation by involved agencies from the start; solid analysis of impacts
- Consultation with key agencies; excellent agency and stakeholder coordination
- Agency coordination
- Evidence of agency coordination/coordination; thorough impact analysis
- Federal, State, local coordination
- Identify external entities and parties consulted
- EA's should address issues to which executive orders or specific legislation has been written. Floodplains, wetlands, air quality impacts, greenhouse gas impacts, threatened and endangered species, and cultural aspects should be addressed and reviewed, at a minimum; address all issues
- Community, agency, tribal involvement
- Pre-evaluation meeting with regulatory agencies
- Adequate Section 7 consultation; feasible and effective mitigation measures; adequate analysis of impacts resulting from project

- Agency coordination is conducted and explained in the EA
- Adequate consultation with resource/regulatory agencies
- Covers required regulatory areas (e.g. ESA, NHPA)
- Agency coordination; clear discussion of alternatives
- Complete 106 consultation
- Solid record of agency consultation
- Thorough documentation of Agency coordination; inclusion of cumulative impact discussion
- Identification of all federal permitting and other requirements
- Documentation of consultation
- Evidence of compliance with other environmental requirements
- Agency has conducted coordination with other agencies on issues regarding ESA, MMPA, NHPA
- Clear record of consultations and communication with other agencies
- Agency coordination; adequate radius search interpretation
- Coordination/consultation with resource and regulatory agencies
- Consultation with resource agencies and SHPO
- Shows agency consultation (Endangered Species, Section 106, etc)
- Consulting/coordinating with the "appropriate" parties for that action; considers all extraordinary circumstances; ability to recognize potential impacts and their real risks; well researched and coordinated with the agencies

Systematic Determinations of Significance of Impacts

- Delineation of impacts and their significance to the actions
- Well defined significance criteria and impact conclusions
- Clearly defined significance thresholds
- Up-to-date defensible data, logical analysis of impacts to demonstrate not significant and solid purpose/need and logical analysis of alternatives
- Clear linkage between the aspect, impact to the level of significance.
- Clear discussion of significance
- A stated threshold of significance for impacts associated with each resource, ecosystem or community analyzed so impacts can be clearly shown below the threshold; clear statements of impacts
- Clear statement on significance of impacts
- Clear identification of impact significance
- Clear significance thresholds for impact determination; well-organized agency correspondence appendix/appendices
- Well substantiated significance determinations
- Connecting the level of significance on a project-level basis to a specific, relevant, and applicable regulatory or human health/ecological threshold
- Focused on significant impacts (concise writing, not a data dump)
- Explanation of thresholds; impacts well documented
- Articulate explanation of impact significance; purpose and need
- Unambiguous; basis for determinations regarding significance

- Good application of significance criteria
- Clear significance determination
- Strong examination of impacts and relation to "significance"
- Clearly described significance threshold
- No potential for significant impacts expected prior to beginning
- Rationale for conclusions re impacts are clearly presented; effective mitigation measures
- Clear demonstration/conclusion that impacts would/would not be significant
- Clear explanation of impacts relative to a threshold of significance
- Impact significance rating
- Clearly defined significance criteria; clearly defined purpose and need; agency and public participation
- Reasonable definition of and application of some standard of significance
- Focus upon issues of importance; significance determination

Identification of Mitigation Measures and Related Monitoring

- Economical and effective mitigation measures that the lead agency agrees to
- Incorporation of sustainability principles as mitigation
- Clear indication how mitigation off-sets potential significant impacts leading to a FONSI
- Adequate mitigation; concerns regarding the implementation of impact mitigation measures
- Long term assurances for mitigation and monitoring, particularly funding
- Identification of mitigation required to reduce significant impacts to insignificant
- Incorporation of environmental compliance as mitigation
- Mitigation
- Clearly identified mitigation measures
- Clear avoidance/minimization/mitigation strategy, answering the who/what/where/when and how of implementation
- Commitment to mitigation
- Thorough evaluation of mitigation measures
- Ability to require implementation of mitigation
- Identification of adequate avoidance or mitigation measures
- Includes minimization measures to offset "significance"
- Analysis of mitigation effectiveness
- Inclusion of mitigation in project design
- Good discussion of mitigation
- Clear discussion of mitigation effectiveness and monitoring needs; clear, concise, but detailed, cumulative impacts analysis
- Clear discussion of any mitigation proposed
- Good discussion of mitigation measures
- Describing mitigation measures
- Clear process for mitigating significant impacts; good research

- Mitigation measure commitments and implementation details
- Thorough discussion of remediation measures
- Linkage between significant impacts, and non-significant but still potential impacts, to possible mitigation steps
- DOPAA linked to potential impacts, which are clearly mitigated by the applicant through permit conditions, BMPs etc.; therefore, the EA does not rise to the level of an EIS
- A good mitigation monitoring and reporting plan; clear rationale for eliminating resources from consideration; for mitigated FONSI, the mitigation necessary to get an EA
- Suitable mitigation
- Reasonable mitigation; unmitigated
- Responsibility for mitigation implementation
- Explanation of how/when mitigation will be implemented
- Follow-up, especially on mitigation
- Details on mitigation early in process
- Impact/mitigation summary

Preparation of FONSI

- Demonstration of no significant impacts; sufficient public participation and agency consultation
- Complete FONSI that adequately summarizes the scope of the project and the decision
- Lack of basis for significance determination; clearly defined and detailed project description; clear statement of scope of the project
- Reasonable explanation of the determination of non-significant impact
- Clear logic (in a FONSI), based upon adequate analyses, that impacts will not be significant in the context of NEPA and the CEQ regulations; identification and detailed discussion of alternatives; concise purpose and need
- Reasons given for non-significance
- Separate and defined alternatives; findings; well supported findings of NSI
- Clear explanation of lack of significance of impacts
- Prospect for FONSI; detailed facts of findings
- Ability to support FONSIs

Use of Adaptive Management

- Strong agency involvement; adaptive management plan for mitigation and monitoring
- Actual attempt to measure/quantify physical change
- Adaptive management during implementation underfunded and weak

Referencing of Source Materials

- The review must have source material rather than unsubstantiated statements
- Clear, concise description of resources, properly referenced
- Technical information incorporated by reference with reports available upon request, or included on a CD with the EA hard copy, or otherwise electronically available; good alternatives analysis; objective
- Well referenced

Application of Principles of Scientific Writing and Communication

- Clear reasoning and good writing
- Clear
- Defensible; clear, concise writing
- Comprehension
- Clear and concise documentation; organized and well written; easy to read
- Clear
- As short as possible
- Succinct; clearly defined and defensible purpose and need; supporting documents
- Clear writing
- Brevity
- Well organized, well written
- Well written, easy to understand
- Clearly defined purpose and need; clear and concise purpose and need; thorough public engagement program
- Clear writing; comprehensive
- Clearly and concisely written
- Concise and clear; honest description of resources affected; relevant and correct definition of project footprint
- Clear graphics denoting resources; public notification; clear writing (plain language) and organization that facilitates public review and comment
- Clear writing
- Clarity and brevity of writing; concise purpose and need; analyzes alternatives
- Well written
- Well written, well organized, w/ analysis focused on actions with the greatest potential for adverse impacts
- Good, concise, technical writing
- Clearly and logically written; project description
- Clear; focus on important resources/impacts
- Written well with graphics that are easily understood; good coordination; clear and concise
- Logically organized (good starting outline)
- Balanced
- Clear, concise writing
- Clear and concise; well written and organized; robust effort to seek public review and comment; good scientific basis for impact conclusions written in plain language.

- Clear and concise document
- Clear description of proposed action and purpose/need; clear, concise description of proposed action and affected environment
- Concise
- Concise
- Concise; impacts clearly described with magnitude; clear
- Well written and easily understood
- Objectivity; clear statement of direct, indirect and cumulative impacts
- Clear writing - customize to project (no boilerplate) and define methodology
- Clear, concise and easily understood
- Addresses issues only to a "just needed" depth; clear and concise impact analyses; public involvement; public input; clear list of alternatives to proposed project that may still meet the need; real world applicability
- Clarity of writing
- Good graphics; clear discussion of resources to be affected; clearly describes potential impacts
- Use of tables, graphs, figures, and maps to present complex information
- Concise writing; absence of public participation for large-scale EAs (“super EAs”); adequate identification and disposal of issues not warranting detailed analysis
- Well written and organized to the public with supporting documentation
- Good writing goes a long way
- Description of the program area for lay reader; adequate analysis of potential impacts
- Resources with little or no impact discussed in too much detail; clearly written and complete; lack of historical potential impact information
- Clearly and logically written
- Impact conclusion; well edited
- Clearly written
- Clear and concise
- Complete
- Good organization and readability; clear indication of resources that are not in concern
- Good use of maps and tables to discuss impacts
- Concise documentation, avoiding elaborating on all laws, etc.
- Adequate documentation; well-written
- Well written; use of true analysis to compare alternatives; costing and responsibility for mitigative measures
- Good graphics/ maps
- Readability, transparency, traceability
- Easy for public to understand: clear, concise writing and appropriate/useful graphics; good summaries/tables/figures; media education; adequate stakeholder/public involvement; solid documentation to support analysis/conclusions; adequate scoping and description of impacts.
- Definitions of jargon; mitigation clear and concise
- Illustrative materials (e.g. graphs, tables, maps, photos)

- Concise language and minimal extraneous information; cumulative impacts
- Adequate length for the nature of the topic--fifty to one hundred fifty pages is "normal" for EAs that address complex marine resources issues.
- Concise document
- Entire document represents a good summary of the environmental impact analysis, with a focus on issues of potential for significance to the exclusion of others, and the document is structured to improve readability and reduce length
- Clearly showing why there is not an impact instead of just dismissing it
- Written in a clear, concise and accurate manner
- Editing consistency so it appears to have one author
- Written at layman's level
- Conclusions are supported
- Well written documentation; good coordination with public/agencies/client...early input
- Logical and clearly written analyses; clear project alternatives discussion

Public Involvement

- Plain language; sufficient public involvement
- Excellent public involvement
- Adequately address legitimate concerns expressed by public and agencies
- Good public involvement
- True public participation
- Early and regular agency and public involvement
- Robust public and agency involvement; clear statement of findings
- Public engagement and responsiveness to public comments; solid science to support arguments relating to impact
- Public awareness
- Good public involvement
- Full public involvement of local, state and Federal authorities and project partners
- Adequate and appropriate public involvement
- Coherent public participation
- Early public involvement; projects that are clearly without significant impact, rather than trying to make it fit
- Public participation, including subject experts and special interests groups
- Effective stakeholder engagement; clear definition of alternatives' impacts/benefits
- Public involvement
- Sufficient local public involvement
- Adequate public and agency participation, including G2G consultation with individual Tribes; impact assessment; full disclosure; clear description of Env/Hisp impacts and coordination to examine and mitigate impacts (as necessary)
- Robust record of public participation/input
- Adequate public participation
- Public and agency coordination concomitant with the scope and impacts of the proposal; thorough discussion of impacts and significance

- Comprehensive stakeholder input
- Disseminating information to the public
- Consideration of stakeholder input
- Public input; agency/public coordination
- Good public presentations; the reviews should conclude before any steps are taken to commit to a project in any way
- Engage the public in scoping and allow comments
- Transparent public involvement process; clearly understood by the general public; adequate substantiation for consideration and mitigation
- Public participation
- Good outreach/public participation (as necessary)
- Solid, documented public involvement
- Adequately addressing concerns of interested parties
- Transparent public involvement process/adequate opportunities for public input
- Public involvement from the very start; adequate coordination with resource agencies
- Early public input, usually prior to alternative determination
- Thoughtfully designed, executed and documented public involvement program; exact location of the project action
- Appropriate level of public involvement
- Adequate public involvement and notice

Consistency with CEQ, Preparer Agency, and Other Agency Regulations or Guidelines

- Adherence to NEPA law and CEQ regulations with respect to process
- Following CEQ/Agency NEPA Guidelines
- Administrative process compliance
- Follows all statutory requirements of NEPA; succinct and justified database; concise
- Integration of other consultations, permitting requirements, etc.
- Ensuring that the EA will facilitate CWA permitting
- Early legal review
- Incorporation of environmental justice stakeholder assessment
- Compliance with other laws that fall under the NEPA "umbrella."; thorough understanding of action; good rationale in FONSI
- Read agency implementing regulations and follow direction

Response to Review Comments on Draft EAs

- Public review and comment procedures
- Letters / documentation from resource agencies, public, and scoping as individual appendices with RTC (response to comment) matrix

Preparation of Administrative Record

- Accurate administrative records

Examples of Inadequacies in EAs

- Inadequate consideration of cumulative impacts (not considering a great enough range of actions or not considering the actions in great enough detail)
- Poorly organized, muddy
- Inadequate DOPAA (Description of Proposed Action and Alternatives)
- Loosely written and undefendable purpose and need
- Insufficient design details to accurately determine impacts
- Misinterpretation of findings
- Poor quality control; resource sections authored by unqualified specialists; hard look
- Done after real decisions have been made
- Purpose and need not well defined; comprehensive; inadequate local agency communication
- Sometimes not enough science goes into the EA; topic expertise
- Lack of clear technical/scientific logic
- Inappropriate level of analyses and scoping of issues
- Poor support for selecting and eliminating reasonable alternatives
- Insufficient budget to adequately determine impacts
- No coordination of independent studies for a collective finding
- Mitigative measures or redesign not fully undertaken
- Inadequate project description, purpose, and need; properly identifying impacted resources
- Inadequate writing skills and poor presentation; quality writing
- Lack of real mitigation
- Inappropriate stakeholder engagement
- Deviation from standards
- Lack of understanding of how the proposed action would impact the natural environment. Lack of solid scientific information on impacts for specific actions; identifying appropriate stakeholders
- Unclear determination of the level of impact before/after mitigation; logical evasive property owners
- Sometimes too generic, "run of the mill" documentation

Observations on Responses

As noted above, the following 23 categories include positive features of EAs identified from the personal knowledge and experience of 269 respondees. As noted earlier, the large percentage of respondees have more than 10 years experience (Question 2), have a variety of responsibilities in EAs and NEPA compliance (Question 3), have backgrounds in the sciences, engineering, and policy (Question 4), and are primarily employed as private consultants or NEPA professionals within the Federal government (question 5).

The 23 topical categories could be used as a basis for developing specific BPPs by category. Conversely, a sub-set of the 23 categories could be used to identify BPPs for specific needs. The 23 topical categories are as follows. The first two relate to planning, while the latter 21 are arranged in the general pattern of the potential contents of an EA. The number of comments for each of the 23 topical categories are shown in parentheses as follows.

- Leadership and Membership of EA Preparation Team (3)
- Planning of EA (11)
- Executive Summary (7)
- Description of Purpose and Need (46)
- Description of Proposed Action/Activity and Alternatives (60)
- Scoping Process (14)
- Description of Study Area and Resources (16)
- Use of Traditional Knowledge (1)
- Description of Impact Prediction Methodologies (2)
- Comparative Impacts on Resources (107)
- Cumulative Effects Assessment and Management (16)
- Scientific Foundation for Study and Subject Matter Experts (17)
- Regulatory Coordination/Consultation/Compliance (30)
- Systematic Determinations of Significance of Impacts (28)
- Identification of Mitigation Measures and Related Monitoring (35)
- Preparation of FONSI (10)
- Use of Adaptive Management (3)
- Referencing of Source Materials (4)
- Application of Principles of Scientific Writing and Communication (73)
- Public Involvement (39)
- Consistency with CEQ, Preparer Agency, and Other Regulations or Guidelines (10)
- Response to Review Comments on Draft EAs (2)
- Preparation of Administrative Record (1)

Bottom Line

The numerous comments received on Question 7 could be used as the basis for prioritizing and delineating BPPs for up to 23 topical categories. Careful review of each of the 23 categories of comments would provide a useful foundation for the preparation of pertinent BPPs.

Question 8 – **The concept of EAs, as they were originally introduced in the 1979 CEQ regulations, was that they would be short in length (15 pages) and focused on delineating the significance of key impacts from the proposed action. If non-significance was determined, then a FONSI could be prepared. Conversely, if significant and non-mitigable impacts were found, then an EIS was needed. Over the years, many EAs which are hundreds of pages long have been generated, and assertions related to non-significant impacts have been included without documentation of analyses or significance criteria. Litigation related to inadequate EAs have dominated NEPA case law for over 30 years. Accordingly, a growing recognition is that several levels of EAs are now being prepared. This questionnaire refers to three such levels: (1) Super EAs – lengthy documents (several hundred pages) with potentially significant direct, indirect, and/or cumulative effects. They often appear to be EISs by another name. They could include mitigation requirements as appropriate. (2) Mitigated FONSI EAs – documents which are 50 to 200 pages in length, and which specify mitigation measures for specific types of impacts. (3) Small-scale EAs – these EAs are shorter in length and analogous to the original EA concept as introduced in 1979.Based upon the range of the levels, it seems appropriate that some BPPs could apply to all levels, while others would be specific for the unique levels. Does this approach seem reasonable?**

Agree with 3 Levels of EAs	Response Count	Response Percent
Yes	210	88.2
No	28	11.8
TOTALS	238	100.0

Comments -- Please list any comments on other levels or additional concepts you would like to introduce – 84 comments were received; they are divided into five groups as follows.

Support for 3 Levels of EAs

- Obviously, good writing and good graphics are needed regardless of length. Length is irrelevant. The project's effects on the human environment is what's relevant. We need to maximize use of public electronic distribution of EAs immediately, and 508 is blocking that entirely. Some compromise is essential.
- I think that BPPs may apply to all 3 of these types of EAs. But I also believe that CEQ should test alternative procedures to the structural EAs. Strongly recommend that any new CEQ guidance allows for creative and flexible solutions, alternative procedures, that meet NEPA compliance requirements and recent CEQ guidance such as mitigation/monitoring, public involvement/collaboration/transparency, EMS/NEPA integration, and adaptive management.
- I agree there are three types of EAs (although our agency really only does 2). I think however it would be best to leave flexibility to the departments, bureaus/agencies. Please allow us to customize as we need to; our agency produces better EAs than EISs because we don't have to adhere to the rigid CEQ format.
- You seem to have it. I know of none that fall into the small category.
- This is a good general approach. There are projects that result in a mitigated FONSI EA that will only have 2 alternatives.

Conditional Support for 3 Levels of EAs

- In all situations, the EA should be clear and concise. Too often the EA is full of boilerplate background information that has little or no direct relevance to the alternatives analyses.
- The issue is whether the EA is in fact a "decision" document. One may as well do an EIS if the EA is going to be too lengthy or controversial...An EIS discloses impacts that may or may not be mitigated or compensated to a FONSI level. A mitigated FONSI puts the burden on the lead agency to demonstrate that they have fully compensated impacts to de minimus levels. I would propose that the drivers for defining what level of NEPA one needs to do should be coupled to the type of permits one needs. For example, if the project qualifies for Nationwide Permits, has no Section 106 issues or T&E issues (among others), then one chooses the EA type...kind of the same as what you are proposing. One needs to develop what that "list" should be...
- I'm not sure what BPPs are, but yes it seems that there is often a mix of these types. Otherwise, the fear of litigation has resulted in more super EAs than needed. Furthermore, there are varying approaches to mitigation. In other words, measures may be taken as part of the project or as mitigation. There are differing opinions on the best approach, but it tends to lie with the enforcement of mitigation at the end of the project.
- I am a fan of small scale and mitigated FONSIs
- Assess and document the levels of risk and uncertainty associated with assessments of key environmental components, mitigation plans, review plans, project needs, project designs, project costs and construction schedules and subsequent monitoring assessments and/or adaptive management plans.

- While I say yes to this - that is based on the assumption that the 3 levels of EA's are appropriate. Why are the super EA's not EIS's? Might that be more efficient?
- In establishing levels of EA, the level/opportunity for public participation should also be defined
- We do not use "super EAs" but work predominantly with mitigated FONSI EAs.
- Not sure what you are getting at, BPP should be at all levels of what we do, regardless of NEPA document type, including documentation in support of CatEx.
- One BPP that should be adopted regardless of EA level is to address each/every resource impact question with a succinct but complete sentence. For example- Will the project impact any section 4(f) properties? Answer- No, the proposed project will not affect or impact any section 4(f) properties. There are no section 4(f) properties along or adjacent to the project.
- The three levels describe EAs that I am familiar with or have prepared. We strive to keep our U.S. Army EAs under 50 pages and as close to 15 pages as possible.
- You need a category of "maybe" - application at "all levels" would depend on a number of factors including the expertise and knowledge of the originators of the document along with a carefully crafted and logical guidance document.
- There is often a gray area as to what constitutes a BMP or a mitigation measure. Some BMPs are perfunctory, while others require more planning, funds, and possible further disturbance to other resource areas. Therefore, I do think some BMPs are appropriate for higher lever EAs, such as a Super EA, than for a regular EA.
- There is too little space to really go into much depth on this issue, but its been my contention that EA's still should be as imagined back when the regulations were published. I think its a lack of specific guidance on EA's, coupled with many court cases and the desire on the part of agencies to "bullet proof" their EA's have led us to these three kinds of EA's (and I'd argue that in number, the short simple EA's are the vast minority). I'd rather see firm guidance on how to construct an EA and try and get across the idea of the purpose of an EA which is to determine whether there are significant impacts. See if we can force some of the super-EA's to be done as EIS's, and trim much of the fat off of the mitigated FONSI EA's (though I still believe that this is a misnomer - many of these mid-range EA's meet the purpose of the regulations but have been bloated by fear of litigation, not as a way to avoid an EIS.)
- If it's a super EA, it should not exceed 150 pages. Anything more than that implies an EIS might be needed.
- Many small-scale EAs could in fact be CEs if the agencies secure or prepare adequate documentation to support the conclusion that no extraordinary circumstances exist.

Concerns Regarding 3 Levels of EAs

- First of all, the category "Super EA" is not something I'm familiar with; it sounds like a mitigated FONSI EA, but lengthier. Second, I'm generally leery about developing categories and associated requirements.

- Some EAs, e.g. for rulemaking, may need to provide specific information in greater detail, but would not fall in any of the 3 categories (super EA, mitigated FONSI, or small scale).
- Officially recognizing different kinds of EAs will just increase production time, labor and litigation. Focus on content -- not packaging.
- Keep in mind that different federal agencies have vastly different approaches to NEPA. One agencies CE activity can be another's EIS (ex, difference between FHWA and Park Service NEPA).
- While I see a range of EA lengths, I do not sense this type of 'categorization' occurring, but I may not be seeing the entire picture. This said, I think that setting these 'levels' is both artificial and moving away from the intent of NEPA when we should be striving to move closer. Also, are these total lengths? If so, this relates to my previous comment that significant extraneous information is often included in EAs when it could be made available electronically, incorporated by reference, or not included at all. Our agency is currently revising our NEPA implementing regulations, and moving to a single EA level, because the current categories have created confusion and have not resulted in better environmental reviews.
- CEQ regulations only discuss EAs in a single fashion. Allowing EISs to be produced under the guise of an EA defeats the purpose of an EA; reinforcing these types of "bad habits" with best practices is also not the way to go. The 15 page concept may be appropriate for site-based or other relatively simplistic federal actions, such as building a small addition on an existing structure, or supplementing an existing NEPA action for a relatively simple federal action (typically a facility action or a simple funding/grant action), however I disagree that 50-200 pages is some kind of "super EA." In my view it is helpful to think of EAs based on regulatory vs non-regulatory actions, and that for EAs that support regulatory processes it may easily take at least 50 pages to deal with the complexity of the regulatory issues in play. The complex nature of many federal regulatory actions and the inter-relatedness and complexity of the subject matter for EAs for federal agency regulatory actions requires far more than 15 pages--just a description of the affected environment may take 30 or more pages. For regulatory actions the NEPA document is often the vehicle that includes information addressed by many other statutes. For NOAA actions in the coastal and marine environment, we often need to address ESA, MMPA, and Magnuson-Stevens Act information (and other legal requirements) and analysis and we need to comprehensively link that information and analysis to the NEPA analysis. Regulatory actions often have time drivers (opening or closing the fishing season in response to emerging scientific information, issuing an MMPA or ESA permit or authorization so that on-the-water activities can proceed within a temporal window) that do not fit well with the EIS process; so in many cases EAs are used because they can be processed more promptly.
- We should get back to the original intent of 1979. * Super EAs should be EISs. * Perhaps formalize the concept of Mitigated EAs. *FONSIs are separate - not part of EA. * EAs should be used as originally intended - except for possible formal introduction of Mitigated EA.
- I don't believe the intent of the law was to have three separate types of EAs. "Super EAs" should probably be EISs if the agency is that unsure of the level of impacts.

They would be much easier to defend in court. Mitigated FONSI EAs and small-scale EAs should not be that different in content that they would require separate BPPs. The primary difference between the two is the agency is committing to mitigation measure(s) in the Mitigated FONSI EA, and not in the other. However, even with a small-scale EA mitigation measures are likely to be discussed. So, I don't really see a lot of differences in their content.

- The length of an EA should not be determinant of best practices. The main role of an EA is to justify why an EIS is not necessary. Sometimes it takes longer than others. We should not be promoting three arbitrary categories that do not exist in law or regulations. Rather, we should be reminding professionals about the role an EA plays. Most likely, a "Super EA" should be an EIS - and that is what we should be encouraging - I don't know what the difference would be between a "Small-scale" EA and the Mitigated EA/FONSI. This whole three document categorization is confusing and not consistent with NEPA. Regarding question 9 - there should not be different rules for each types - the number of alternatives should be reasonable under the facts and circumstances of the project.

Concerns Regarding Super EAs

- It seems to me that the idea of "super EAs" is not much more than an EIS with a lower level of public involvement. If the proposal is that complicated that it takes hundreds of pages to analyze, perhaps the agency should reconsider preparing an EIS?
- A super EA should probably be an EIS.
- I think there should be strong discouragement of the development of Super EAs. These are not consistent with the intentions of NEPA or CEQ regulations and result in inaccurate perceptions by stakeholders of the environmental review process.
- One of the objectives of the BPPs should be to help practitioners avoid preparing Super EAs.
- Super EAs should not be recognized. They are EISs, and should be treated as such. Instead, they are used by agencies as a means of avoiding scoping, public participation and decision hearings. Mitigated FONSI EAs are a means of making NEPA more efficient for common activities where mitigation or BMPs are standardized and should be formally as are general permits versus individual permits.
- Super EAs are ridiculous. They should be EISs. Mitigated FONSI EAs make sense if the mitigation reduces the impacts to a point where they are not significant.
- There shouldn't be a "super EA" they should be EISs.
- I am not a fan of so called "super EAs", and do not like the term. It actually denotes a wrong message. There is nothing "super" about them, and their undertaking is usually ill advised.
- Super EAs should be avoided. If it is an EIS then use the EIS process.
- I disagree with the concept, as written, of a "super EA". If a project rises to the level of having a significant impact on the environment, unless the applicant can mitigate down that threshold or avoid it, this would - as I was taught - trigger an EIS. It appears that the use of EAs for a combination of significant and non-significant

impacts are being allowed? This flexibility can only lead to confusion, and further error, in the environmental analysis of NEPA. This is a gray area already. Why muddy it further. Other than Super EA, I definitely agree that BPPs could be developed.

- I don't know where you are going with this. I think the use of "Super EAs" is suspect and needs to be called into question, by CEQ or agency NEPA authorities. But that's not really your question here.
- BPPs for the mitigated EA could be useful but the Super EA should discouraged / banned and agency(ies) responsible required to implement policy practice consistent with NEPA and call the super EA an EIS and 'do it right.'
- Super EA's should be eliminated and government agencies should adopt simple EIS procedures in order to just do an EIS on projects that are difficult to FONSI. Mitigated FONSI EAs could use some BPPs because there is no getting away from doing EAs on projects that should go on to do an EIS, but that just isn't practical to do these days.
- But super EAs should actually be EISs -- agency continues to avoid the EIS with super EAs, which proves problematic -- so that would leave only two classes of EAs that would apply.
- Don’t love it. Why introduce something that is essentially the same as an EIS. I hate the term Super EAs, please refrain from using it. Would you want to have super CEs, which could be something similar to an EA.
- I suspect a Super EA is necessary when there is controversy, which is also a trigger for preparing an EIS. So why not eliminate this category and prepare an EIS instead of a Super EA?
- Super EAs make EISs meaningless. If that level of investigation is needed then an EA is not appropriate. The category should be removed.
- Super EAs are merely a way to avoid doing an EIS when one should be required, allowing potentially significant impacts without appropriate depth of review. These should not be allowed. Mitigated FONSIs are potentially allowable, however criminal penalties as "knowing and willing violators" should be enacted if the mitigation is not carried out.
- The Super EA concept should be gradually returned to the short EIS. An EIS not an EA should be the usual approach for a major Federal action. An EIS for any but the largest actions need not be more than 50-100 pages.
- I say that we should eliminate all "super EAs" because they generally are farces, and that a "mitigated FONSI" EA is a bastardized term because the effectiveness of mitigation cannot be pre-ordained.
- Right-sizing the NEPA EA evaluations is the most important feature. Hiding EIS as "Super EAs" is the most significant common error.
- What's the point of having Super EAs? They are just EISs and should be done in complete accordance with CEQ regs.
- The Mitigated FONSI EA's and small-scale EAs make sense. The Super EA should be eliminated from the list, and simply call these documents EISs. Why not reap the benefits of completing an EIS rather than calling the document an EA.

Other Comments

- Alternatives not required in small EAs. More extensive use of CEs.
- My approach is to explain issues clearly, not with acronyms that are undefined.
- BPP is undefined and we are unable to answer the question.
- You need to look at the new CEQ Final Guidance - your questionnaire out of date regarding issues like length (03-12-12, 40 CFR Parts 1500...).
- I don't really understand the question; it appears to assume facts not in evidence. "Super EAs" are simply attempts to evade the clear intent of NEPA and the CEQ Regulations; they should be rejected by all concerned. "Mitigated FONSI EAs" are almost always inadequate in that they claim that proffered mitigation measures will reduce otherwise significant impacts, but there is little or no certainty that such measures will be carried out, and almost always no sustained effort to monitor an action to determine if such measure accomplish their goals. Small-scale EAs are the ONLY type of EA that is consistent with the CEQ Regulations. They are, and should be, preliminary analyses that form an objective basis for either preparing an EIS or issuing a FONSI. All other uses of EAs are attempts to limit public participation and evade the agency's responsibility to follow the law.
- CEQ should take a step back to the intent of Congress and the usefulness of the document. The NEPA was intended to highlight to the decision maker the pitfalls of a course of action. The EIS was intended to be a "STATEMENT", not a regurgitation of all known knowledge. The fact that you are talking about 200 page EAs shows that the process is out of hand. And NEPA is a procedural law. I have not seen a decision maker read a 200 page EA and I have not seen one read a 1000 page EIS. The process is broken and this will not fix it.
- Most EAs I've encountered are too long.
- I think that question # 9 below presumes a faulty premise that somehow the number of alternatives is what is most relevant. The number of reasonable alternatives is driven by the purpose and need and cannot be arbitrarily defined by the level of analysis that is going to be undertaken. The specific # is not what is most important. What is important is whether the reasonable range has been considered.
- It's important to not attempt to clarify the application of NEPA by adding further sub-layers to the process. While this may seem necessary from a process standpoint through the eyes of a NEPA practitioner, the bigger challenge will be to fashion the application of EAs by paring down the complexity which is typically not pursued by adding subcategories and additional processes.
- The only BPP that could apply to all levels is the reason for doing an EA in the first place; it is anticipated that there will be no potential significant impacts. Otherwise, an EIS would be prepared to avoid extra time delay in reaching a decision on a proposed action. Super EAs, and even mitigated FONSI EAs, are usually done to avoid an EIS process not because it is a proper NEPA tool for the proposed action. This problem exists because current standard NEPA practice has left the practitioner with a choice of an EA/FONSI (assumed to be quicker) or an EIS (assumed to be time consuming and lengthy) due to a lack of dealing with the potential for significant impacts. There are better proven methods for EIS preparation and the use of proper tiering such as RODs.

- Your question is too vague. You assume I agree with your characterizations of EAs- I think it's incomplete. It also assumes I have the same understanding of BPPs as the writer. I'm not sure I do.
- Keep EAs as originally intended, and divide EISs into the various types. I know of an example where a state agency lied to a federal agency to avoid NEPA because it was such a hassle.
- Suspect that people will just choose the easiest, least rigorous for their action. Don't think the # of alternatives is a very effective measure, it will lead to silly or not very well thought out alternatives.
- Sometimes - especially for agencies serving less literate populations - larger EAs are lengthy because the document uses significantly more graphics and pictures to assist a targeted audience in understanding the project and its potential impacts.
- Outside of EAs, I've also seen lengthy Records of Environmental Consideration documenting the use of CATEXs. It seems that BPPs could apply in this case as well and allow for more clear guidance on public involvement in CATEX'ed projects.
- It is not clear from this description whether the page lengths refer to the overall length of the entire document, or just the main body of the EA without appendices. To this matter, the benefit of producing a very long EA, rather than an EIS, is not clear. For example, why would it take 200 pages to support no significant impact - if the issues are that important wouldn't an EIS process be of greater benefit. In practice, many EISs are produced that identify no potential for significant impacts simply because of the precedence of a proposal or the unusually large size or scope relative to other similar agency actions.
- The Corps of Engineers has developed parameters for nationwide and regional permits under the CWA that allow Catexes for a given project; same for NHPA. I suggest someone also develop similar parameters for the CAA, ESA, and other resource laws to allow more catex actions. I don't have enough room or time here to go into detail on this, but the approach should be more resource based, not action category based.
- What is a BPP? Did you define this already? I don't remember seeing it. Thus can't answer this question.
- I'm not sure what the question is. What is meant by "while others would be specific for the unique levels". Others need to be defined.
- Super EAs are really mini-EISs with the intent to do an end run on the public process. The cost of doing EISs has also spiraled out of control and thus the reason for the end run on the public process. We also need to do a better job of tiering documents and right sizing the documents to the project. While there are many other reasons for the SR 520 Bridge replacement project turning into 3 separate documents (2 EISs and 1 EA), the approach of a program level document then tiering for projects makes a lot of sense...if the Tier 2 documents can refer to the program level document. This is similar to the programmatic EIS approach. The Tier 1 or Programmatic documents are where the broad ranging and long term impacts should be evaluated.
- Don't understand the question.
- Such a nuanced approach is good and needed, but there will have to be a concurrent increase in authority of the professionals who prepare the EA to actually

do this effectively. They will need the power to deflect and overcome political interference - which may not be realistic in some agencies and under some administrations.

- Is this related to streamlining, the most misused word in our profession?
- It is not clear what is meant by BPPs.
- For the below question - number 9. I do not agree that a specific number of alternatives should match a specific level. All EAs should look at reasonable alternatives, and the number of adequate alternatives will depend on the purpose and need and the project not on how big or what type of EA it is.
- How do professionals handle agency expectations when they want an EA for a project needing an EIS?
- If an EAs is less than 15 pages it should have already been covered by a CE!
- EAs should be focused and concise evaluations of whether an EIS is required. We should not facilitate lengthy EAs.
- All EAs of any size (EISs, too) are reviewed for adequacy under Sec. 706 of the Administrative Procedure Act. To this extent they are all the same no matter how characterized or labeled, no matter how many or few pages. It isn't their name that's important, it's their content and readability.
- I disagree with the approach suggested below (Q 9). The number of alternatives should be issue-driven or resource driven, NOT merely a factor of the length of the document.
- The hard part here will be to delineate a typology of EAs that works with the CEQ regulations. Sometimes large EAs are used in place of an EIS, which is contrary to NEPA's intent. The CEQ regulations have never been clear on what an EA actually consists of and the effort in this survey to try and pin it down is commendable.

Observations on Responses

A total of 238 respondees provided input on Question 8. The concept of three levels of EAs was agreed to by 88.2% of the respondees. A total of 21 comments directly supported the three levels (5 comments) and conditionally supported them (16 comments). Nine additional comments raised concerns about the three levels, particularly with regard to the term Super EAs. Further, 23 additional comments generally voiced disagreements with the concept of Super EAs. Further, some statements were included in relation to using Super EAs as a means to avoid public involvement and participation. Finally, 31 other comments were provided on a range of concerns relative to levels of EAs.

Bottom Line

Two levels of EAs are recognized and have been utilized for over 25 years – small scale EAs and mitigated FONSI EAs. The term Super EAs is more recent (within the last 5 to 10 years) and potentially problematic in the development of BPPs. Additional consideration is needed relative to the content of Super EAs , their associated public participation, if any, and the presumed requirements for mitigation of multiple impacts.

Question 9 – **In keeping with the spirit and intent of NEPA, it is assumed that alternatives will need to be included in all three levels of EAs. However, the extent of coverage could be matched to the level. To provide input to this concept, please check one of the following number of alternatives for each level of EA. Assume that one of the alternatives is the No-Action Alternative.**

Level of EA	Number of Alternatives			Total Responses
	2	3-4	>4	
Super EA	10.4%* (23)**	56.6% (125)	33.0% (73)	221
Mitigated FONSI EA	32.3% (72)	64.6% (144)	3.1% (7)	223
Small-scale EA	79.5% (178)	18.8% (42)	1.8% (4)	224

*percentage of total responses
** denotes number of responses

Observations on Responses

A total of 224 respondees provided input on the concept that alternatives should be addressed in all EAs. Further, the responses generally indicated that a greater number of alternatives should be associated with mitigated FONSI EAs and Super EAs. For example, 79.5% of the respondees indicated that two alternatives should be addressed in small scale EAs. For mitigated FONSI EAs, 64.6% indicated that three to four alternatives would be useful. Finally, 56.6% of the respondees indicated that three to four alternatives should be included for Super EAs, with an additional 33.0% suggesting that more than four alternatives be addressed. No comments were requested on Question 9. However, several comments on Question 9 were included in comments for Question 10 (please see Question 10 for this category of comments).

Bottom Line

The responses to Question 9 provided general support to the concept that more complicated EAs should incorporate more alternatives which are subjected to comparative analyses.

Question 10 – **Selection of pertinent issues and impacts for study within an EA, including potentially affected resources, should be a cornerstone of EA practice. Further, the selection process and outcomes should be appropriately described in the EA. Do you agree with these statements?**

Agree with Statements	Response Count	Response Percent
Yes	226	93.4
No	16	6.6
TOTAL	242	100.0

Comments – 70 comments were received; they are categorized into five groups as follows.

Concur with Statements

- Probable outcomes and the EA should be divided into three primary sections. First, primary problem and affected areas (including fauna/flora/environment) 2nd. How to mitigate/resolve/probable solutions/ resources needed 3. Desired and/or probable outcomes.
- The cornerstone is understanding the intent of the federal action: what the problem is and what data is available to demonstrate that the problem is real. This then feeds into another cornerstone: determining a reasonable range of alternatives and how appropriate alternatives are selected. The major purpose of NEPA is to support better-decision making; therefore, better decision-making must also be the fundamental purpose and cornerstone of EA's. Going into great detail on a minor issue within an EA may certainly be a waste of time and money, and should absolutely be avoided, but avoidance of such a waste isn't the cornerstone of an EA.
- If not, the process is failing.
- These are common sense statements.
- Absolutely, yes!
- Alternatives are the cornerstone of the EA, but practically speaking I agree with the statement.
- Appropriately and as briefly as possible. Put boilerplate methods into appendices.
- Yes, the selection of pertinent issues & impacts should be explicitly explained - what, why, how much, what if the proposed action didn't go forward would these impacts happen anyway, quantify whether the impacts matter and how much, how much benefit from alternatives.
- Yes, Similar to use of CEQA Appendix G checklist in California. Documentation demonstrating rationale for issues analyzed as well as for dismissal.

- Not only should the issues be clearly stated (i.e., a conflict or situation resulting from the proposal, but the issues statement should be written as a cause-effect relationship. How alternatives are formed in response to issues should also be clearly described.
- Focus EA on those resources most important and most affected.
- My yes response is to the idea that EAs need to focus on resources, ecosystems and communities that have the potential to be significantly impacted by the action. The EA should include a thorough description of the analysis done to determine the level of impact, and the use of thresholds to show how the impact is less than significant. It also needs to dismiss, with a short explanation, those resources, ecosystems or communities that cannot be significantly impacted by the action, but where there may be concern (e.g., dismissal of impacts to wetlands because a survey was done and no wetlands are present in the project area). Also, I did not respond to question #9 because I don't believe we should be setting a standard number of alternatives for any document. I think it needs to be determined on an action-by-action basis. Sometimes two alternatives is adequate and sometimes five alternatives is adequate. It all depends on the action.
- We include a Preferred Action and Alternative Action Selection Matrix in our EAs. This shows the criteria used for the selection and which courses of action met the criteria.
- This is like agreeing to the flag and apple pie as the cornerstones of liberty and freedom for all!
- Pretty well describes an EA as it should be.

Qualified Support for Statements

- This is usually a problem when scoping is inadequate.
- Outcomes should be treated with caution; the EA should be subject to revision after comments are received.
- The Agency has guidance documents for environmental reviews to explain the issues for study and impact resource areas covered in the documents. We refer to these documents in the EA but do not go into a detailed explanation of the selection process for these issues.
- If I understand the statement, it does seem that a new practice of 'customizing' the analysis using a checklist or initial consideration could help focus NEPA reviews. That analysis could be appended.
- It depends what the federal action is. For example, merely leasing a store in the inner city to provide homeless counseling services hardly requires analysis of natural resources. But it could affect HP Act compliance, particularly if the property is historic. I agree with the statements listed in #10, but only with the caveat that all EAs are preliminary documents per my comments on Question #8.
- Unsure what is meant by "outcomes". I assume this refers to impacts.
- I don't think the description of the selection process needs to be lengthy, but in the NPS EAs I typically work on, there's usually about a page describing the scoping process, which includes both internal scoping within the planning team (usually NPS and the contractor) and public scoping (degree of public scoping effort and response

varies widely by project). In some of the relatively simple cases, there may not be much to discuss and a paragraph or two would suffice.

- Clear process and outcome descriptions to provide opportunity for public involvement, review, and comment which builds trust and buy in to the project planning phases leading to implementation &/or construction.
- A thorough discussion for resource not studied is just as important as those affected resources which are covered.
- To the extent that there is reasonable agreement of the significance pertaining to that individual resource, I would agree with this statement. There would need to be adequate literature to support a quantitative level of significance that would be sufficient to illustrate the cause and effect between a project and the impact it would likely have to a resource. Without such information, the EA loses credibility and any mitigation steps wouldn't be implemented, since there is no convincing evidence to support said mitigation. To simply discuss potential impacts to the resources as an academic effort without a clear, bona fide causal connection is better left to research, educational institutions, not NEPA practitioners working on practical, real-world projects in real-time.
- Scoping is a requirement of the NEPA process.
- Scoping should be required for EAs. It is generally "highly encouraged."
- I think alternatives are the cornerstone. Issues and impacts are obviously important, but if the alternatives are not properly identified, a more fundamental problem exists.
- Analysis should be focused.
- Checked yes because reducing the focus areas of EAs is not useful, especially when personnel managing NEPA processes may not have the level of experience necessary to understand. Need to clarify "selection process and outcomes" . Not sure.
- In practice reviewing agencies always want to see everything. By the time you explain a process that described why a resource is not being looked at you have done the research. Have a resource report which is incorporated by reference, list resources which didn't result in impacts over minor. Discuss resources within the EA that have impacts over minor and attempt to explain why they aren't significant.
- However, the EA writer must be careful that the explanation for including or excluding areas for impact analysis does not get too lengthy. Otherwise, it can become more like the impact analysis itself.
- Should be brief and to the point with the majority of information be available in the record.
- This is where quality scoping is invaluable.
- Other resources potentially affected, or minimally affected resources, should be listed with a brief (one to two sentence) explanation.
- I believe that, all too often, we forget the conceptual modeling process that outlines the potential impacts both direct and indirect. We should emphasize the importance of this practice and the communication of the outcomes.
- A key part of scoping, and should be done with some level of public or stakeholder participation, even for small "in-house" EAs.
- For some routine actions (small scale EA) this may be overkill. However, a checklist to this extent would suffice.

- Do not believe it is necessary or required to document within an EA the selection process in more than the most cursory way, unless there was controversy - still may be appropriate for another method of documentation.
- Often several resources can be written off and not analyzed based on the proposed action or location of the resource in question.
- Analysis outcomes for selected resource areas should be documented but I don't believe that HOW the potentially affected resources were identified needs to be described, as long as the EA can document that appropriate agency coordination/consultation and some degree of public review occurred.
- In some cases should be able to state "No CR's in the area" or "no waterways in the area" and that should be adequate.
- Scoping should inform the identification of pertinent issues.
- Pertinence, cornerstone, selection process …are alien terms to the NEPA process. I would agree with this: "An EA should analyze all relevant matters -- those having a bearing on the 3 outcomes -- the question of significance, the question of compliance, and the question of which alternative to select at the time of decision."
- If this means "scoping" should be done for all projects - then "YES".
- These documents should all include a section that discusses why resources areas and impacts analyses for the resource areas are not addressed further in the document. The document should clearly state which issues are pertinent and which are not and why.

Concerns Related to Statements

- Unclear what "selection" means. Who does it? Documents must be responsive to public concerns... That is my understanding of "selection."
- Should be a cornerstone, but selection process and outcomes in the text adds too much bulk.
- The selection process is VERY important! Last year I sat at a conference table and watched hired consultants "vote" on the best alternative. My jaw dropped I am not kidding!! The selection process really has been neglected through the years. It's time for a framework to be provided when tax dollars are involved.
- The failing I see is that resources are not removed from further consideration appropriately in the EA but this is a critical factor in ensuring that the EA is concise and effort is spent on the resources that could actually be impacted. Also, there is so much boilerplate information required to be "legally defensible" that the length increased unnecessarily.
- I agree with the first statement. However, the second statement implies a long description of describing the selection process which is not generally part of an EA - the outcomes should be.

Other Comments

- You have forgotten what an EA should be and are trying to make it an EIS.
- Duh

- There should be no presentation of the scope of issues reviewed, but determined irrelevant. This only adds to EA length. EA is to document and gain public input on a determination of no significant impact. Agency determination on what issues were relevant or not is self-evident in the EA presentation. If documentation of all issues considered but dismissed is needed, it belongs in the administrative record and not in the body of the EA.
- It's too easy to go off on tangents and analyze issues because they are "politically correct." A perfect example is the potential of studying greenhouse gas emission impacts and carbon footprints for every EA or EIS being done. This is utter nonsense.
- NEPA documents should not be repositories for interesting resource discussions that are irrelevant to decision-making.
- Pertinent issues should drive the development of alternatives – something CEQ has never linked.
- Assume that the selection process is related to the selection of the preferred alternative.
- Often a laundry list of concerns is thrown into an EA with tons of non-pertinent information.

Follow-on Comments to Question 9

- Regarding question 9: The number of alternatives depends on the scope and nature of the project and the EA, not the length.
- Question 9 above is disingenuous. The number of alternatives for a specific EA does not necessarily conform to an arbitrary number. The document should focus on reasonable alternatives.
- And that will also help identify the reasonable alternatives - not a specific number as implied in Q9.
- Since I can't find another place for my comments on alternatives, I'll provide them here. The questions about alternatives earlier included specific numbers that may be required. It is not clear why that would be the case. Some projects may have few if any alternatives to assess, and others may have many (e.g. route alternatives or variations for a pipeline project). Requiring a specific number of alternatives may unduly add to preparation of an EA or may result in an inadequate evaluation of the range of potential alternatives.
- Question 9 above is a really stupid question, and I am appalled that NAEP or CEQ would relate the question of alternatives to the size of the document and not to the project and its impacts.
- Question #9 above is overly simplistic--we should not think that more alternatives means better NEPA even for longer EA documents. I agree that addressing pertinent issues and impacts in the EA should be a cornerstone of EA practice. Part of that process should be establishing criteria in each EA to narrow and select the alternatives and the reasonable range of alternatives.
- Question 9 needs a text box too: I find nothing in the law or regulations that requires alternatives for EAs. I can't find anything that requires a no action alternative in EAs.

- Regarding #9 above - the size or complexity of an EA should not directly relate to the number of alternatives evaluated - this often also is related to the context and the quality of the proposed action - I would not want to see a "number" assigned to alternatives.
- This is a comment on #9. I think the number of alternatives will vary depending on the proposed action, and should not be a prescribed number based on the length of the EA.
- On Question 9 above - since an EA is supposed to be to determine WHETHER there are any significant impacts from your proposed action, it has never been clear to me why any alternatives should be reviewed at all.
- As to Q.9, the issue isn't how many alternatives so much as addressing the totality of alternatives. To say that this level of EA has this many alternatives and another level has that many, is to invite litigation.

Observations on Responses

Out of 242 respondees, 226 (93.4%) agreed with the statement that pertinent selected issues and impacts should be described in EAs. Further, 70 comments were received and categorized into five groups. Fifteen comments concurred with the above statements, and an additional 31 indicated qualified support thereof. Five concerns related to the statements were also noted, and 8 other comments were provided. Further, because Question 9 above provided no opportunity for making comments on alternatives, 11 follow-on comments were provided within Question 10.

Bottom Line

Strong support was noted on the need for selecting pertinent issues and impacts for study in EAs, and also for documenting the selection process and outcomes.

Question 11 – The CEQ regulations contain a brief topical outline for EAs in Section 1508.9(b). The format for an EIS is in Section 1502.10. Please indicate your response to the following postulates.

Postulate	Agree	Disagree	Response Count
For a super EA, the EIS format in Section 1502.10 should be used.	71.0%* (164)**	29.0% (67)	231
For a mitigated FONSI EA, the EIS format in Section 1502.10 should be used; however, the topical coverage could be reduced.	54.3% (125)	45.7% (105)	230
For a small scale EA, the topical outline in Section 1508.9(b) could be used with slight modification.	84.8% (195)	15.2% (35)	230

*percentage of total responses
**( ) denotes number of responses

Comments – 77 comments were provided by the respondees; they are divided into five categories as follows.

Support the Postulates

- Vague, yet prescriptive... quite a trick.
- Our agency has guidance documents to cover this issue.
- Keep it simple.
- I suggest using the same format for all EAs and EISs. First of all, it eliminates confusion for readers, who may think the agency forgot to include information. Second, if the agency determines an impact is significant when doing an EA, they won't need to change their format.
- EAs should be formatted as EAs, and EISs should be formatted as EISs, per law.

Conditional Support of the Postulates

- Need better direction on 1508.9(b). Agencies are weary of litigation.
- Combining affected environment and environmental consequences for each resource section is easier to follow.
- If an agency ends up with a FONSI or mitigated FONSI, it may still want to call the document an EA. EISs have additional public participation and publication

requirements that EAs do not have. For these reasons, particularly if an agency is operating under a limited budget, it may want to describe the document as an "EA" (assuming it can reach a FONSI or mitigated FONSI).

- I dislike the 1502.10 format, preferring for all EAs to combine "existing environment" and "impacts" for each impact area.
- An EA, in all cases, should follow the same outline with varying levels of detail. If formatting the document as an EIS is necessary, then the document is likely an EIS.
- Mitigated FONSI often should be able to follow 1508.
- For a FONSI EA it really depends on the level of mitigation, some are very simple and may need no more than an additional sentence, the U.S. Army Alaska has done some very successful ones; middle comment could go either way
- Generally agree, but agencies should have flexibility to modify to meet project needs. See comment above in question number 8.
- EA should be EAs not "mini EISs" or "short-circuited EIS processes".
- The EA outline should depend on the project, its alternatives, and its impacts, NOT on the length of the document. The EA length should be closely controlled, but its outline is irrelevant to its length.
- A combination of the EIS outline to enhance the detail of section 1508.9(b) would be helpful. The CEQ has never defined the content of an EA so a formal BPP would be most helpful; most of my EAs have been super EAs, and I use, with some modification, the 1502.10 format.; if we are using the EIS format, we just as well call it an EIS.
- A small scale EA could be similar to a permit.
- Formats for EAs and EISs should be the same.
- An EA is an EA.
- Mini-EISs? Format should resemble the purpose of an EA - why impacts are not significant.
- Really, it depends on the scope, alternatives, and resources.
- The depth + breadth of analyses differs between an EA and an EIS
- Add Abstract, Exec Sum, and Ref/Biblio; drop Index. I also recommend use of hyperlinks for all docs to navigate inside the doc, few do this and it vastly enhances e-review. I would also combine "affected env" and "env conseq" into the same chapter for ease of reviewing a given resource and it's related impact. Also, clarify distinction between proposal and proposed action, many use these terms interchangeably and they aren't the same (idea vs action). Also recommend adding definitions for other commonly used "terms of art" to avoid misunderstandings (purpose, need, etc.).
- If anything, an EA leading to a FONSI should be better supported because it is making a finding that the project is suitable for implementation; if "super EAs" are really EISs, then they should be EISs.
- We combine Affected Env/Env Consequences. Flexibility is best, rather than mandating outlines.
- Except the 1508.9b format must include list of preparers.
- Modifications to any EA format should follow the guidelines of the oversight agency.

- There's nothing wrong with a 4 chapter approach (or a modified 3 chapter approach), and that is not contradictory to the proposal in 1508.9, with modification.
- EIS format should be condensed to meet super EA/mitigated FONSI EA needs.
- An EA at any length is NOT an EIS.
- Recommend format for all EAs be the same. The discussion of issues of lesser importance or impacts can be reduced if appropriate.

Concerns Regarding the Postulates

- 1502.10 generally works, but affected environment and consequences should be merged along with cumulative impacts. Mitigated EA should be its own format as well as a small EA and 1508.9 doesn't give good enough guidelines to follow.
- CEQ regulations describe substantive content requirements, not the EA format. Format should not be standard, rather adaptable to the proposals under review to permit summary, brevity, and clarity of presentation of impact analysis.
- I think the outline is completely outdated for both.
- The Army is not big on super EAs. However, an EIS cannot be prepared without approval from the highest levels of the Department of the Army.
- Dependent on the number of alternatives and mitigation required the EA format could still be appropriate. Some may need to use the EIS format if the mitigation is complex. This section should include no opinion.
- I disagree only because this is getting confusing.
- The recommended format in 1502.10 doesn't even need to be followed for an EIS so it certainly shouldn't be the standard for an EA. Presumably you're preparing an EA because there are only certain issues that require assessment of whether they rise to the level of significance. So your format and corresponding analyses should be what makes sense, not just some cookbook approach that you can point to as having been used before.

Other Comments

- I have a feeling that my responses and comments are not going to be helpful. I'd prefer be part of the discussion to better understand the need for new recommendations.
- Not an authority on this.
- You have forgotten what an EA should be and are trying to make it an EIS.
- We already have standardized agency-wide templates for EAs that address the format issues and information to be included consistent with NEPA and CEQ regulations.
- I oppose establishing 3 kinds of EAs.
- See comment of the need for CEQ to allow/encourage alternative EA procedures that are NEPA compliant but could require more than "slight" modification of 1508.9(b) to EIS format requirements.
- Herein lays the problem I expressed in question number 8. Using an EIS format for a Super EA is senseless; it is an EIS at that point. Again, this seems, and is likely to

be perceived by the public and special interests, as a ploy to avoid the EIS process but use the EIS document. Also, the reason for this proposal appears grounded in the lack of innovation to deal with the potential for significant impacts in an expedited manner with public process. The mitigated FONSI EA is another less drastic step at avoiding an EIS process because of potential for significant impacts. If the intent of a mitigated FONSI EA is to be used, it should really just be a small EA with different alternatives that have the mitigation built into the design of the different alternatives not an after the fact determination. Thus, no need for a mitigated FONSI but rather choosing an alternative with built in and committed mitigation. The small scale EA was what was envisioned with CEQ NEPA Regulations and minor tinkering with format and content is probably acceptable. If NEPA practitioners, as well as CEQ, continue to significantly alter the regulations the call for opening the CEQ NEPA Regulations in general and/or NEPA could be at stake. Many Congressional proposals have suggested just such action. EA topics should always be tailored to the scope of the project.

- I still have premise problems with this question, and I don't know what "slight modifications" or "reductions" are so I cannot agree or disagree.
- The important thing is a clear analysis of impacts rather than the format used.
- Proforma prescriptions will not lead to better analyses.
- No opinion.
- Even for an EIS, chapters 3 and 4 should be combined.
- I am not completely comfortable with the concept of 3 levels of EAs. It seems that this is moving outside of the CEQ regulations, and creating new categories of NEPA documents. It also seems to contradict CEQ Guidance that encourages concise EAs and EISs.
- Do not ever use EIS and EA requirements in the same sentence. Slippery slope.
- An EA should meet the requirements of an EA.
- EA is an EA, no matter how small.
- Answer is given: The following standard format for environmental impact statements should be followed unless the agency determines that there is a compelling reason to do otherwise.
- The content of the reports should be relative to the nature of the project and potential impacts.
- This question pre-supposes the answer you are looking for and hence is biased.
- This is the subject of pending CEQ guidance.
- These are, at best, generalization. The content of an EA/EIS need not follow the format to address the pertinent issues.
- The "recommended format" for EISs is an atrocity, and the "topical outline" for EAs is far short of adequate.
- Again this whole artificial distraction is confusing
- The only real guidance for an EA is the definition found in 1508.9. This has often caused practitioners to default to Part 1502, the EIS, for guidance, which has confused things over time.

Comments on Super EAs

- Again - seems that the idea of a "super EA" might be better as an EIS. If it walks like a duck and quacks like a duck...
- I think people use the "super EA" instead of the EIS to bypass public participation required by the EIS.
- I do oppose term Super EA so this is hard survey to fill out.
- Again, super EAs should be strongly discouraged.
- Super EAs should probably be EISs.
- Super EAs should not exist; the lead Federal agency should be required to perform an EIS.
- I think the super EA's should be EIS's - as well as some of the mitigated FONSI EA's
- A super EA is an EIS...and writing a super EA to avoid having to address alts, public review/hearings, etc. is unethical and counters the context and purpose of NEPA...it is 'work around' that some Agencies have implemented and others (CEQ) have allowed...it should be stopped.
- The difference between a Super EA and an EIS must be specified.
- Super EAs should not be allowed. Period. If a project is big enough to require this level of documentation, an EIS should be required.
- Why not just call super EAs an EIS?
- If a super EA requires documentation equivalent to an EIS, it argues that it might as well be an EIS.
- For a "super EA," an EIS should be prepared.
- I disagree with the concept of Super EAs.
- No Super EA's.

Observations on Responses

A total of 231 respondees provided their reactions to the three above postulates. There was a general agreement (71.0%) that Section 1502.10 could provide an outline for Super EAs, along with its intended use as an outline for EISs. For small scale EAs, 84.8% of the respondees indicated that the brief outline in Section 1508.9(b) could be used and modified (expanded) as needed. For mitigated FONSI EAs, the responses were almost equal – 54.3% for using a subset of the Section 1502.10 outline, and 45.7% disagreeing. The 77 received comments were divided into five categories, with the first two (31 total comments) either supporting or stating conditional support for the three postulates. Several concerns related to the postulates were identified in the third category (7 concerns); along with 24 other comments, generally opposed to the postulates, in the fourth category. Finally, 15 comments on Super EAs were in the fifth category; these comments were generally in opposition to Super EAs.

Bottom Line

While support was expressed for the appropriate use of outlines from both Sections 1502.10 and 1508.9(b), further consideration of appropriate topical outlines for EAs should be considered. Any generated topical outlines should be sufficiently flexible so that modifications could be made on an as-needed basis.

Question 12 – Should a range of page limits be established for the three levels of EAs?

Establish Range of Page Limits For Three Levels of EAs	Response Count	Response Percent
Yes	71	29.6
No	169	70.4
TOTAL	240	100.0

Comments -- If your answer is Yes, please indicate a range of page limits for each EA level – 101 comments were received; they are categorized into three groups as follows.

Identified Ranges of Page Limits

- Greater than 100 pages, 50-100 pages, less than 50 pages.
- Small Scale >50, Mitigated FONSI >200, Super EAs - As much as needed but, with appendices, >500.
- One to infinity... that is, as many as needed.
- 50 -100 for Super EA's; 25-50 for FONSI EA's;10-15 for small scale.
- The limit should clearly exclude text not subject to the page limits such as is done with the EIS. Pages excluded include table of contents and appendices for example.
- Small <15, medium, <100, large, as needed.
- Super EA - 200 pages maximum; mitigated FNSI EA - 100 pages maximum; small scale EA - 50 pages maximum.
- Brevity and plain language should be encouraged.
- Less than 200 pages – super EA, less than 100 pages – mitigated EA, less than 50 pages – small-scale EA.
- 15 page max for what you call a mitigated FONSI EA and a small scale EA. Your super EA should not exist. It needs to be an EIS with a maximum page limit of one hundred so a decision maker will read it.
- The shorter the better.
- Super EAs - 75-150 pp, mitigated FONSI EAs - 50-100 pp, simple EAs - 15-50 pp.
- Super EA/EIS + 100, mitigated FONSI/EA <100 but >15, small scale EA <15.
- Keep it simple.
- But EAs should strive to analyze the impacts in consideration with brevity.
- Super EA 100-150, FONSI EA 50-75, small scale EA 25-50.

- Super: same as standard EIS requirement or less; mitigated EA/FONSI: maximum 50 pages, small-scale EA: maximum 25 pages.
- First, there should be no Super EA - the concept is ridiculous, and when put in practice, Super EAs typically seek to skirt the public involvement component associated with EISs. Small EA - 25 pages, mitigated FONSI EA - 75 pages. I have seen an FTA EIS that is 149 pages. It can be done.
- Once again, the premise of this question suggests that by adding further process to an already process-burdened system we are actively helping NEPA execution, outcomes. It's hard to imagine that the way to resolve too much process is by stipulating further process, rules. Super EA - greater than 200 pp, mitigated FONSI EA - 50-200 pp, small scale EA - < 50 pp.
- Page limits will go a long way to screen out filler material and encourage agencies to clearly document why more detailed analyses were not conducted for some VECs. available to public, Super EAs: 200 pages plus appendices.
- Super EA - 200 pages, mitigated FONSI - 100 pages, small scale - 75 pages; but what about technical reports?
- Super 50-100, mitigated 20-50, small <20.
- "Super" EA and Mitigated FONSI <150, small scale EA <75.
- Super EA - 75 pages, mitigated FONSI EA - 25 pages, small EA - 15 pages; this should be dependent on the type of project, range of alternatives, etc. and not an arbitrary number.
- Small scale 5-15, mit. FONSI EA 15-100, large scale EA 100-250.
- Super EA 300 pages, mitigated FONSI EA 150 pages, EA 100 pages.
- Only a page limit for the small scale EAs - less than 30 pages; small scale < 50; mitigated FONSI >50 but <100; super - no more than 150.
- Super EA – 300, mitigated FONSI EA – 150, small-scale EA – 50.
- Again, I think this is somewhat dependent on the action. However, I think we need to start setting page limits so specialists are forced to take their full reports and summarize them, rather than simply inserting them in the NEPA document. So, speaking somewhat arbitrarily, I think an EA could range from 15 to 100 pages.
- Super - 100 - 150 core pages, exclude cover page, Abst, Exec Sum, T of C, Ref, etc.; mit FONSI - 75 – 100; small scale - 15 – 25.
- Super: 150 pgs max, mitigated: 30-50 pgs, small-scale: 20-30 pgs.
- Encourage brevity.
- Unless there is a requirement under penalty of law this will never be followed. Super EA should be 50 or less for the main document, Mitigated should be 30 or less for the main document, and Small EA should be 15 for the main document. These limits are for text and do not include graphics.
- Super EA 100 to 150 pages, mitigated FONSI EA 50 to 100 pages, small scale EA 15 to 50 pages. But, whatever is recommended, there will be EAs that supersede the established limits. You know this will happen!
- Ranges would exclude attachments.
- <50, 50-100, >100.
- Super 150-300, mitigated FONSI 50-150, small scale 20-50.

- Small scale EA- not to exceed 20 pages, mitigated FONSI EA- not to exceed 50 pages, super EA- not to exceed 100 pages.
- Super- 50 to 100, Normal- 15 to 50, a mitigated EA should be for one resource only and should not be more than 50 pages.
- "Super-EA", 150 pages, "Mitigated FONSI EA", 75 pages "Small scale EA", 35 pages.

Concerns Regarding Ranges of Page Limits

- This seems dangerous. Content has nothing to do with the number of pages. We need to focus on content.
- NEPA lacks specificity in many areas which allows for flexibility and interpretation. Good or bad, that is the case and has led to much discussion over the last 40 years. But one detail that is in there that is given too much weight is page limit. Looking at an early 80s EA or EIS versus one today highlights vast differences. Page limits should not be specified, but concise and focused analysis should be encouraged with guidance (as is out now).
- Although it sounds like a good idea - page limits could have the unintended consequence of minimizing the ability of the author(s) to describe the action and potential impacts resulting in sub-optimal documents.
- Some proposed actions are more complex and require additional text for relevant resource sections to adequately describe impacts.
- While I certainly agree that EAs should be as concise as possible, I would not want to place an arbitrary page limit on them.
- Only defining Super EA's by page limits is OK.
- The relative merits of the project situation and resources should continue to determine the size of the document. Present rules provide sufficient guidance to scope project EA/EIS.
- It's quality not quantity.
- It should be about adequately characterizing the project, not about a specific number of pages.
- This is tricky. Before establishing page limits, I believe a trigger question or series of questions must be set to ensure a project "meets" a BPP for a type of EA. Otherwise, you may have planners or applicants trying to fit rather large projects into 10 pages or less for the sake of time and simplicity. Once you have those triggers set, you can get a better understanding of what your page limits would be. Also, need to do a review of these "Super EAs" - the average page # - perhaps use it as an upper limit for those types of documents.
- We should focus on good writing and organization that appropriately addresses the issues, not on arbitrary page lengths.
- Proforma prescriptions will not lead to better analyses.
- The documents should be as concise as possible. There should be an easy to understand (decisionmaker/public accessible) summary with separate technical analysis concisely supported with facts -- not encyclopedic or boilerplate analysis of information.

- One should strive to be brief in all levels of EA by focusing on important resources
- Page numbers are irrelevant, particularly when a lot of maps and figures, other graphics are used.
- No, the subjects should be adequately covered and use whatever length necessary to do this.
- There should be recommended page limits, but saying every EA must be 15 pages or shorter seems a bit arbitrary and there could be some that really do need to be 20 or 25 pages. I think it would be good to require a 1 or 2 page summary that incorporates a list of every required mitigative measure or conditionality up front so no one would have to go looking.
- Each project is unique and a set of page limits may not be appropriate for all projects.
- We should be able to include as much content as we think we need to. Mandating page numbers really doesn't work, because we add pages in response to litigation.
- As guidance, recognizing that there may be case-specific reasons to deviate.
- Recommendation yes, mandatory limit no. It should also be noted that there is no direct correlation between the number of pages and the number of hours to collect data, review potential impacts and prepare the report.
- Guidance should be provided, but strict limits should not be imposed.
- I don't believe in page limits, however, concise EA's should be encouraged.
- We need as many pages as necessary to show that we took a "hard look."
- Page length should reflect complexity of decision, not an arbitrary threshold,
- Without page limits, scope creep is too common.
- Consider the definition of success given in APA sec. 706. Consider the role of relevance. Consider the wide variety of projects and programs subject to NEPA.
- I feel a target maximum should be recommended. To say a range implies a minimum number of pages and a NEPA document should be as short as possible to comply with the needs of the Act.

Other Related Comments

- Or separate the document into section. Paper divide into primary section done independently.
- See comment above regarding new CEQ guidance under 1500 issued 03-12-12...making questionnaire dated...more interesting to see how different agencies are implementing...maybe ask which federal agencies we are primarily dealing with .... FTA new guidance issued as draft on 03/15/12 re: 23 CFR 771
- But....good luck with enforcing that. What is more important is the presentation of the material. TRB led an effort to make NEPA docs "readable" to varying degrees of success. I have written EAs that in effect were EISs...in the end one may as well do the EIS because it will end up there anyway (if one cannot do mitigated FONSI, or the FONSI is challenged).
- I am opposed to giving any legitimacy to "Super EAs, “therefore I would limit their pages to that of the other two types of EAs. The purpose of EAs is to address in CONCISE terms the issue of significance of potential impacts. If this cannot be

done in 30 pages or less, it cannot be done in an document of two to ten times that length.

- No one will ever follow it and if they do, they will just send readers and reviewers off to a technical report/special study to include everything else.
- Concept of Super EA is flawed - emphasis should be on helping practitioners avoid these regardless of complexity of project or potential impacts.
- It wouldn't make a difference if you did or didn't - people will do what they think is right. When's the last time you saw a 15 pg EA?
- Yes, although I don't really understand the point of the Super EAs. I think that we should be moving away from this practice and back to the original intent which was to use an EIS for these types of actions. Fear and misunderstanding of the EIS process has resulted in production of these Super EAs. We should be looking at improving the EIS process and using it when appropriate rather than creating/condoning yet another tier of analysis and associated best practices.
- Page limits are for people who do not know the process. Too many pages indicates the project team could not address the key issues and worked under the assumption that verbose equates to intelligence.
- Unless CEQ intends to revise its regulations to include three levels of EAs I think we need to revisit why three levels have become common and to work towards the original guidelines.
- Stupid question. An EA for my agency is a planning document, not a litigation brief. It should be developed by good planners. All of the attorneys at CEQ should be fired. The length depends on the project.
- Question asked and answered in the CEQ 40 Questions about NEPA. Adding an exorbitant number of pages to the concept of a very short EA as originally intended loses the integrity of the EA. It just becomes an EIS in disguise with a very thin façade.
- When I prepare EAs, even Programmatic EAs, I know not to allow it to balloon into hundreds of pages and I won't allow that. It's a sign either that there is too much superfluous information that needs to be cut or put in an appendix, or the document should be an EIS. If NEPA is being done well, the number of pages will be what is appropriate for the action under review.
- Should have one standard for EAs. By putting out best practices for types of EAs not covered by the CEQ regulations, I feel will reinforce bad habits. CEQ should first survey agencies to see why they are doing "super EAs" and why they are not, then, doing EISs instead. I would also recommend a survey on application of mitigations implementation follow-up.
- Page limits have never mattered.
- As stated above, I think the super EAs and mitigated FONSI EAs should be considered EISs to keep it clear what an EA is, and should be.
- I can’t because I don’t agree with the levels.
- Answer is given in Sec. 1502.7 Page limits: The text of final environmental impact statements (e.g., paragraphs (d) through (g) of Sec. 1502.10) shall normally be less than 150 pages and for proposals of unusual scope or complexity shall normally be less than 300 pages. Is the CEQ irrelevant? NO

- The EA should be able to be covered in the 15 pages originally suggested. If the level of complexity or number of impacts is significant (the Super EA), those projects should be upgraded to EIS status and use the Section 1502.10 format.
- You need an EA that is the correct length for the subject matter, which CANNOT be prescribed across all subjects.
- Unenforceable. What will you do if poor writing (or editing in the case of multiple component authors) or major issues require an additional page...disregard the conclusions?
- The length of the document is dependent upon many factors, not only including the level of impacts or complexity of an action, but also the reviewers of a document, the agency the document is for, legal requirements, and others.
- It would be difficult to do this given some projects are more complex than others. The key is quality control to ensure the document is concise and accurately summarizes impacts without extraneous information that is not applicable to the analysis.
- Blindly assigning number of pages is unreasonable.
- Too many variables, too many people with too many opinions. The rules should focus on producing good, substantive documents, written well and with meaningful graphics; technical details in separate reports (but available as part of the EA), relevant topical discussions, etc. The documents should be as long as they need to be.
- There should be guidelines, but there are times when an adequate description of the situation or potential impact requires a level of detail that cannot be captured within page limits, especially when working with Traditional Knowledge or when working on projects with the potential to impact Native lands or peoples.
- It wouldn't be followed anyway.
- Most "super EAs" probably should've been an EIS. A "Mitigated FONSI" EA is really a bastardized term because often you can only guess as to how effective the mitigation will be. Let's just say that an EA could range from 25 to 100 pages, but any more than that is either irrelevant information or an EIS-scale project masquerading as an EIS.
- I disagree with this question in principle. Limiting the size of the EA may leave out critical information necessary to complete the NEPA process. If a document is unusually large, it should be up to the reviewer to trim unnecessary information during the review process. Typically, the large size of a EA is directly related to the documentation of the supported studies.
- "Established" could be a requirement--the length of the EA analysis needs to be driven by the action, alternatives, and resources potentially affected. I'm concerned that a page length "requirement" is arbitrary (page length is the basis of the "super EA" or "small EA" designation discussed here) and will succumb to the law of unintended consequences
- NONE of these important matters are informed by any notion of "page limits." Focus on what is important, instead, a range of page limit goals should be established.
- Projecting a range of pages is meaningless, how many EISs meet the prescribed number of pages in 1502.7. Over the years more issues are being integrated in NEPA analyses making page limits of little value.

- We need a standard naming convention for the typology of EAs.

Observations on Responses

A total of 240 respondees provided yes or no answers to Question 12. Approximately 70% of the respondees indicated “no” relative to ranges of page limits for the three levels of EAs. Conversely, 71 respondees (29.6%) indicated “yes” to the use of ranges of page limits. A total of 40 comments indicated ranges of pages, with the typical pattern involving smaller page limit ranges for small scale EAs, and larger page limit ranges for mitigated FONSI EAs, and Super EAs, respectively. A total of 28 concerns were identified in the category entitled “Concerns Regarding Ranges of Page Limits”. Many of the concerns related to the uniqueness of proposed projects and their location and study requirements. A total of 33 “Other Related Comments” was also provided. These comments provide a range of perspectives and opinions on the subject.

Bottom Line

The “ranges of page limits” topic is important; however, the first priority for BPPs should be focused on the substantive contents of EAs, including the clear delineation and rationale for concluding “no significant impacts”.

Question 13 – **Section 1508.27 of CEQ's regulations defines both context and intensity considerations (10 topical issues) relative to determining the significance of impacts on bio-physical and socio-cultural resources. Many EAs include assertions regarding no significant impacts; however, related analyses may not be described, nor referrals be made to Section 1508.27. Accordingly, please check the importance of documented analyses in the following types of EAs.**

Level of EA	Low Importance	Medium Importance	High Importance	Total Responses
Super EA	2.6% *(6)**	10.2% (24)	87.2% (205)	235
Mitigated FONSI EA	3.0% (7)	26.4% (62)	70.6% (166)	235
Small EA	19.1% (45)	36.2% (85)	44.7%(105)	235

*percentage of total responses
**denotes number of responses

Observations on Responses

A total of 235 respondees addressed the importance of using Section 1508.27 as a framework for documenting impact significance determinations for all three levels of EAs. If the medium and high importance responses are added together, the Super EA level totals 97.4%, the mitigated FONSI level totals 97.9%, and the small EA level totals 80.9%. These responses clearly demonstrate the value of Section 1508.27 as a process for determining impact significance within EAs (and also, EISs).

Bottom Line

Preparers of EAs should document the use of Section 1508.27 as a means to conclude a Finding of No Significant impacts. Reviewers of EAs should note the usage or non-usage of Section 1508.27, and recommend/require, as needed, its incorporation.

Question 14 – **Some federal laws and regulations contain impact significance criteria which could be used in the preparation of EAs. Examples of such laws and related regulations include the Clean Air Act, Clean Water Act, Endangered Species Act, and the Marine Mammal Protection Act. Would it be useful to develop a composite report of such laws and criteria, and then make this available to all federal agencies?**

Composite Report	Response Count	Response Percent
Yes, it would be useful	207	85.5
No, it would not be useful	35	14.5
TOTALS	242	100.0

Comments – 82 comments were received; they are categorized into four groups as follows:

Concur with Composite Report

- This is what I was getting at in an earlier comment.
- Because many of the regulations, as they are today, and permit requirements were not around when NEPA regulations were written, this could help clarify what types of coordinated consideration/consultation, etc. should be applied and further ways to simplify the process.
- It would be useful to have such a composite report tailored to agency programs, and in fact some agencies have prepared such information.
- Yes - would help make the connection between the EA (now) and compliance later...
- Absolutely would be helpful as guidance. That general guideline would help agencies/consultants develop specific local/regional significance criteria. Too many NEPA documents state violation of a federal or state law triggers significant impact. That does not appear to be a good measurement of significance in all cases. For example, a RCRA violation may only be a paperwork filing issue that is easily corrected.
- Since "significance" is such a touchy word, I think this would be helpful as a reference.
- This would be highly useful. It does not seem appropriate to redefine significance in each new EA.
- Templates are always good.
- I prepare several EAs each year. I would find such a composite report very helpful.
- It should be available to Tribes and consultants as well.
- This would help in consistent application of the laws in NEPA.
- Developing standards and guidelines will cut down on redundancy and errors.

Qualified Support for Composite Report

- Most of the laws and regulations noted in your question require consultation with the appropriate federal agency to reach concurrence on impacts.
- This should only be used as a reference and not replace consultations.
- Often these are included/overlap with NEPA documents.
- However, I'm not sure what this might be implying. Is the author of this question implying that in the case of the NHPA section 106, an adverse effect determination would then mean a "significant impact" leading to an EIS; I would hope not, but that would be worthy of more discussion.
- Please remember that NEPA also addresses "H" and the array of historic preservation laws--NHPA, ARPA, NAGPRA, etc.
- Perhaps useful unless the composite report becomes unwieldy.
- Yes, it would be useful, but I don't think these criteria should automatically be carried through as "standard" significance thresholds for all EAs. Often compliance (the outcome of the consultation) with these laws lessens the environmental impact to less than significant. Successful compliance and completion of consultation under different environmental laws can result in the ability of a proponent to prepare an EA vs. and EIS.
- Useful if the agencies of jurisdiction agree with contents of the report.
- Marginally useful. Doing so could provide a way to undermine the definitions in 1508.27 of the CEQ regulations. These definitions should be the minimum basis for any more specific criteria or examples regarding "significance."
- A simple list with a short paragraph would suffice. However, there would need to be a commitment of resources to update the list on a regular basis and as important new legislation occurs.
- Depends on how it’s done. There is risk that there are situations where these standard criteria should not be used. But as a general resource and if these situations were identified, could be a useful resource.
- In this era of increasing collaboration and joint projects, often including co-funding of projects, and /or coordinating, it would be increasingly important to have such "cross walks" available among CEP's, and the various CEQ/EA/EIS agency, private and public stakeholders.
- You could add the significance criteria for NHPA also.
- The answer to this would depend on the practical manner in which such a document were to be developed. If it is developed with an eye towards what would provide the greatest utility to the NEPA practitioner, then "yes". If, however, it is conceived as a 100 + pages of theoretical information, the answer would be "no".
- Useful as information, but should not be interpreted to define 'one-size-fits-all' criteria.
- Useful yes; however, different agencies have difference significance criteria, so I think it should be tailored to specific agencies (e.g. criteria list for BLM, another for USFS, etc.).

- Something should be provided that clarifies that if mitigation being provided is consistent with other requirements for "adequate mitigation" than impacts are adequately mitigated and thus there are no significant impacts.
- Consistency for interpretation between agencies would be a definite advancement!
- Criteria used to determine compliance with strict regulatory-based resources such as air or water, or to determine potential effects to listed species are based on specific chemical, biological, or physical factors and do not generally 'translate' to use in determining overall impact significance.
- It would also be useful to mandate completion of the relative consultations under these laws and regulations in a fashion that allows for “results" to be included in EAs.
- Maybe - each agency deals with a very specific type of impact and thus tailored criteria. For similar types of agencies, i.e. DOD, the compiled report could be useful.
- It would save $ and time for agencies, and standardize the discussion. However the application of each to a given project should not be encouraged to be standardized.
- EAs should indicate whether impacts in all the areas are significant or not, clear calls supported by facts.
- But, each agency should modify the impact significance criteria as it is related to the agency's own mission.
- But, as with all these kinds of helps, the user must understand the limitations.
- A website with regular updates to these laws/criteria would be very useful! Printed reports just aren't used any more.
- It must also be clear which significant criteria laws apply in which situations, and how to resolve conflict when there is overlap, i.e. a Clean Water Act and ESA.
- This is one of the areas that is most difficult for clients and consultants to gauge what needs to go into a document. Having a checklist or decision tree would be useful. How would this be used?
- Perhaps prima facie significance thresholds could be established for certain resources based on these other legal drivers. Presumably, there would be caveats about specific circumstances warranting additional analysis (similar to CATEXs).
- Webinar and formal training sessions should also be provided.
- More important would be a compilation of significance thresholds, which I don't believe any of the statutes listed above contain, with the exception of the Clean Air Act and associated National Ambient Air Quality Standards.
- But, many standards (clean air, water, etc.) are set by states under delegated programs. Not entirely sure an easy-to-use composite report would be possible, but it would be useful.
- USDA-NRCS has a simplified version of this in their site specific Environmental Evaluation Form NRCS-CPA-52.
- Yes - we should be developing typical "thresholds" of significance for different impacts - that would be helpful even though most federal agencies don't like them.

Concerns Related to Composite Report

- One size rarely fits all.

- Guidelines and criteria from CEQ are also needed.
- There are countless EISs with summary information for the laws and regulations, and it would be necessary to indicate how each law/regulation applies to the proposed action being considered. The latter cannot be provided in a composite report.
- But it would be extremely time consuming and the implementation of the laws differs by region and by state.
- A good idea but preparing and maintaining an up to date document would be impossible and would be re-done for every document anyway.
- However, it would have to be updated to keep up with changes.
- It couldn't hurt. However, it will only be useful for as long as the laws/regs. remain the same. They do change occasionally.
- Having set significance criteria has not worked well for us. Trying to define impact intensities has only resulted in more litigation and judicial concern.
- The NEPA context and use of the term "significance" is different than the contexts of CAA, ESA, NHPA, etc. You cannot make hardline threshold limits around Federal resource laws when a balancing of context and intensity is required with things such as socioeconomic impacts. NEPA compliance is not a quantitative formula.
- Significance criteria under one law (e.g., NHPA) should not automatically denote significance under NEPA.

Other Comments

- Might be useful... Can't say a priori.
- This was already done and issued in the Federal Register several years ago and can just be updated.
- It would likely be challenging to keep such a report up to date.
- Agencies would not use it.
- Laws and regulations are constantly changing. Such a report would be obsolete before it was published. Better to include guidance instructing preparers to conduct the appropriate due diligence for applicable regulations and laws each time they undertake a NEPA effort. There is also the Executive Orders to consider as well.
- In a perfect world that would be giving them their own information with which, presumably, they should be guiding us.
- Negotiation works fine, as long as resource agencies are flexible. Question 13 is a stupid question, whose answers depend on the project, not its length.
- Formal books on Environmental Laws are published annually, that include the laws and their updates. This is extremely valuable information to planners and policy makers.
- Creating specific criteria for what is already in 1508.27 to resemble CAA or ESA would only reduce NEPA's flexibility and undermine the GENERAL or umbrella nature of the CEQ Regulations. The intent was to encompass the essence of all human environment issues and allow an agency to see the big picture in making its decisions. That will be difficult, if not impossible, to write tight enough to account for

all human environment possibilities. It has been NEPA's flexibility that has allowed it to be defined and redefined through common law over the years.

- We usually prepare EA's for the Corps of Engineers. They are already well versed in the federal regulations.
- It would be helpful for in terms of public understanding of the process as well.
- I work for NOAA/NMFS so I work on a lot of EAs that address ESA and MMPA issues. The federal agencies responsible for implementing the laws listed in this question have plenty of information available both internally and externally on these laws and the criteria used to address impacts to resources covered by these mandates. We do not need additional composite reports.
- You have to be kidding?
- I would hope have something similar to this already. Of course, the threshold of significance will depend on the current condition of the resource, so it will vary. I'm not sure you can have one report that covers this for all resources in all areas. I would like to clarify my response to question #13 - The analysis for determining if a resource, ecosystem or community has the potential to be significantly impacted may reside in the Administrative Record, and only a brief summary of it would be in the EA.
- Also, see previous comment about COE and parameters they set up for NWPs and doing CATEXs.
- The Act should be the primary reference for significance criteria if provided; a separate summary is not necessary.
- This composite report should also be made easily available to professionals performing EAs and EISs. Sadly, NAEP would have to do this since Federal agencies seem unable to do so. However, as a former Fed I can tell you the possibility of getting such a document approved for use is slim to none.
- Poor question. It might be useful to somebody but at what type of cost? Are you trying to get some project work out of this? Sounds like it. This is not a yes or no type of question.
- Most Federal Agencies already have this list.
- Always useful, but be sure to preface that they are not necessarily to be used as significance criteria (SC) for NEPA. Context could preclude their use as SC.
- I think most of us are aware of them.
- NEPA practitioners can and should have read these laws. Compliance with other laws is not necessarily a threshold for significance in NEPA.
- Already have this.
- One would have to assume that the agencies involved are interested in what the other agencies have to say. Good luck with that.
- It might be interesting, but not "useful." Compliance with all these mentioned statutes is highly important to the success of any outcome, but equally irrelevant as "impact significance criteria." Even "significant" impacts comply with these statutes, and non-compliance is not an option.
- Not essential. More of an FYI.

Observations on Reponses

The above tabular information demonstrates that the large majority of the 242 respondees (207 respondees, or 85.5%) thought that a composite report on Federal laws containing impact significance criteria and information would be useful in preparing EAs. The Concern with Composite Report group, along with the Qualified Support for Composite Report group included 44 of the 82 comments. It should be noted that such a composite report would also be useful in the preparation of EISs.

Bottom Line

A composite report of laws and impact significance criteria, which should be periodically updated, would be useful for preparers and reviewers of EAs and EISs.

Question 15 -- An issue which can arise during the preparation of an EA is associated with incomplete or unavailable information regarding the significance of adverse effects from the proposed action (preferred alternative) or alternatives. Section 1502.22 of CEQ's NEPA regulations describes a procedure for addressing this issue in EISs. Should this issue be ignored at the EA level?

Should Section 1502.22 be Ignored for EAs?	Response Count	Response Percent
Yes	32	13.2
No	210	86.8
TOTALS	242	100.0

Observations on Responses

The responses to the above question are overwhelmingly in favor (86.8%) of not ignoring but applying the four-step process described in Section 1502.22 of the CEQ's NEPA regulations. The process can be used to address, on an as needed basis, incomplete and unavailable information at the EA level.

Bottom Line

The four-step process described in Section 1502.22 provides a structured approach for identifying and documenting how an agency should address incomplete and unavailable information at the EIS level. As appropriate, the process can, and should be, used at the EA level. Further, the responses to Question 16 (a follow-on question for those 210 persons who checked no in Question 15), indicate favorable response to the application of the four-step process when considering the level of EA.

Question 16 -- If your above answer (to Question 15) was "No", which of the following would you recommend for incorporation in a BPP for this issue?

Level of EA	Yes	No	Response Count
For a "super EA", apply the Section 1502.22 procedure and carefully document the findings	95.6%* (195)**	4.4% (9)	204
For a "mitigated FONSI EA" apply and document the Section 1502.22 procedure with regard to information on the effectiveness of the mitigation measures	88.7% (181)	11.3% (23)	204
For routine "short EA", briefly document the completeness of available information regarding the non-significance of adverse effects	82.0% (168)	18.0% (37)	205

*percentage indicates the percentage of respondees that checked yes or no for the answer
**( ) denotes number of yes or no responses

Observations on Responses

It is interesting to note that 210 respondees recorded "no" answers to Question 15. The response count in Question 16 indicated 204 persons were largely in favor of applying the Section 1502.22 process, if needed, to "mitigated FONSI EAs" (88.7%) and to "Super EAs" (95.6%).

Bottom Line

The four-step Section 1502.22 process for addressing incomplete and unavailable information could be useful in preparing EAs wherein such information could be problematic and necessary for informed decision-making.

Question 17 -- Should public and agency scoping, as well as the preparation of scoping reports, be included for:

Level of EA	Yes	No	Response Count
Super EAs	86.0%* (202)**	14.0% (33)	235
Mitigated FONSI EAs	67.9% (161)	32.1% (76)	237
Small-scale EAs	35.6% (84)	64.4% (152)	236

*percentage of total responses
**( ) denotes number of responses

Observations on Responses

The above responses demonstrate a definite pattern; that is, Super EAs need to incorporate public and agency scoping (86.0%), while lesser percentages of support for scoping are displayed for mitigated FONSI EAs (67.9%) and small-scale EAs (35.6%). With these percentages of support for the higher two levels, it appears that public and agency scoping should be definitely planned. For small-scale EAs, and depending on proposed action features and locations, such scoping activities should be considered, as appropriate.

Bottom Line

Public and agency scoping should be considered for all three levels of EAs, with potential greater needs associated with the first two levels listed above. Section 1501.7 of the CEQ's NEPA regulations contains useful information on planning scoping activities and documentation of the findings. No unique scoping activities, nor analyses are envisioned for EAs.

Question 18 -- Should the following types of draft EAs be circulated for solicitation of public reviews and comments; with the final EAs including responses to the received comments?

Level of EA	Yes	No	Response Count
Super EAs	87.8%* (209)**	12.2% (29)	238
Mitigated FONSI EAs	68.6% (164)	31.4% (75)	239
Small-scale EAs	38.0% (90)	62.0% (147)	237

*percentage of total responses
**( ) denotes number of responses

Observations on Responses

Out of a total of 238 responses, 87.8% indicated that Super EAs should be subject to public reviews, solicitation of comments, and the preparation of responses to the comments. For mitigated FONSI EAs, 68.6% of 239 responses indicated similarly relative to public reviews, and solicitation and responses to received comments. For small-scale EAs, less than half (38.9%) of 237 responses indicated a similar need. However, depending upon the proposed action and its location, it may be useful to consider a public and agency review program.

Bottom Line

Public reviews and responses to comments should be considered for all three levels of EAs, with anticipated greater needs associated with the first two levels listed above. Part 1503 of CEQ's NEPA regulations describe how to invite comments (1502.1) and respond to comments (1503.4). Further, Section 1502.19 addresses the circulation of EISs. Since the focus herein is on EAs; it should be noted that the above Part and Section could also be applied to EAs.

Question 19 -- Cumulative impact (effect) is defined in Section 1508.7 of the CEQ's regulations. Relative to the three levels of an EA, do you agree or disagree with the following statements:

Statement	Agree	Disagree	Response Count
Due to the large geographical and impact scales of a "super EA", careful attention must be given to the use of CEQ's 11-step Cumulative Effects Assessment and Management (CEAM) process for key resources.	91.4% (213)	8.6% (20)	233
For small-scale EAs with minimal identified impacts, only cursory consideration needs to be given to CEAM; however, the consideration should be appropriately documented.	72.8% (169)	27.2% (63)	232
For medium level EAs which include mitigated FONSIs, CEAM should be considered for key resources potentially subjected to adverse cumulative effects. In addition, documentation of the applied CEAM process should be included in the EA.	82.8% (192)	17.2% (40)	232
	Answered question		233

Observations on Responses

The 233 respondees to this question related to the extent of coverage of cumulative impacts (effects) within the three levels of EAs were consistent. For small-scale EAs, 72.8% of the respondees indicated that only cursory considerations of CEAM would be needed, and documentation would be required. This perspective was probably based on the inclusion of cumulative impacts as one of the 10 intensity factors to be considered in determining the significance of impacts (Section 1508.27). A total of 27.2% of the respondees disagreed with this perspective for small-scale EAs. It is not possible to ascertain the implications of this disagreement. One possibility is that the respondees did not perceive that small-scale EAs need to address cumulative impacts. Conversely, the meaning could be that some to all of the 27.2% thought that cumulative impacts should be given more attention in EAs, including small-scale ones.

Regarding mitigated FONSI EAs, 82.8% of the respondees agreed that CEAM should be considered for key resources, and the results appropriately documented. A total of 17.2% of the respondees disagreed. Again, it is not possible to ascertain the implications of the disagreement. One possibility might be that the respondees assumed that required mitigation measures could address the incremental impacts of the preferred alternative, thus no CEAM analysis would be required. Conversely, the meaning could be that some to all of the 17.2% thought that additional commitments to mitigation measures should be addressed along with local to regional resource-related management measures involving multiple agency or private sector contributors to cumulative effects.

The highest agreement percentage (91.4%) was for the statement for a “super EA”. This is probably based on the perceived physical scale and range of effects on resources for projects requiring “super EAs”. The smaller disagreement percentage (8.6%) is probably a result of a perceived lower scale and range of effects.

Bottom Line

The above high agreement percentages for CEAM inclusion within the three levels of EAs reflect the importance of including such appropriate considerations in all EAs. Further, plaintiff claims in numerous EA cases involving Federal courts have focused on inadequate considerations of cumulative effects. Plaintiffs may use these inadequacies as one item of evidence supporting the need for EISs. Accordingly, a BPP for addressing CEAM in EAs would be useful. Supporting information for this BPP could be extracted from CEQ’s 1997 guidance entitled “Considering Cumulative Effects Under the National Environmental Policy Act”.

Question 20 – **Addressing climate change in NEPA compliance documents has been increasing, particularly regarding EISs. In some cases, e.g., for super EAs, it may be expedient to develop greenhouse gas emissions inventories and also to consider the effects and consequences of climate change in the area wherein preferred alternatives will be located. Further, some mitigated FONSI EAs may need to address both inventories and locational climate change effects and their implications for the preferred alternatives. However, small-scale EAs will probably not require any specific analyses of climate change. Do you agree with the above statements?**

Agree with Above Statements	Response Count	Response Percent
Yes	130	55.1
No	106	44.9
TOTALS	236	100.0

Comments on climate change analysis in EAs – 110 comments were provided; they are categorized into four groups as follows.

Support for Climate Change Analysis in EAs

- A small scale EA should still address GHG emissions and/or pertinent adaptation strategies that may impact the project.
- Climate change may play an important role in small scale water projects. Just an example.
- I do not think this information is necessary if the proposed action has a no significant impact on resource areas related to climate change. Any guidance on this topic should clarify this point.
- Yes, however a statement of consideration should be included documenting that proposed activities would be de minimis or well below CEQ thresholds.
- GHG emissions, while contributing to global CC, should have little impact locally. However, other air pollutants would be more likely to have local impacts.
- CEQ's February 2010, draft guidance memorandum, and guidance put forth in CEQ's draft regulations entitled: "ACTION: Notice of Availability, Request for Public Comments on Supplemental Draft Guidance on Consideration of the Effects of Climate Change and Greenhouse Gas Emissions for Land and Resource Management Actions" is reasonable, and should serve as the analytic benchmarks for climate change analysis in EAs.

- This is a qualified yes, I think the level of analysis on the "small-scale EAs" can be significantly less than analysis needed for their larger counterparts. A simple "plug in the numbers" based on the FEMP guidance for scope 1 and 2 should be sufficient.
- To ignore climate change in any NEPA document allows potential challenges. I think a discussion of the small-scale EAs relationships to climate change may be adequate even if a specific analyses is not completed.
- Climate change should be addressed like all issues. If it's relevant to the proposed action than it needs to be addressed at the appropriate level.
- Small-scale EAs should also analyze climate change.
- In the Army we do address greenhouse gas emissions in small scale EAs. However, they are usually so minimal that it is probably not worthwhile to perform the analysis.
- All EAs need to consider the alternative's effects on climate change processes and how climate change might add to the cumulative effect on the impacted resources; need to be parallel with California CEQA GHG treatment.
- Climate change should be a consideration in all environmental assessments.
- Even smaller EAs should include a brief summary of climate change considerations.
- Discuss climate change as applicable to the project, whatever details and length is appropriate.
- GHGs should always be addressed.
- Yes, assuming the definition of small scale excludes projects with significant GHG emissions.
- Climate change needs to be addressed wherever it will be impacted (added to, or changed) by the proposed action, it doesn't matter what level environmental document is being completed.
- I would agree with this: "The first step is to determine the relevance of GHG emissions and climate change to any of the outcomes. If these are not relevant, the EA should say so, and say why. If these are relevant of course they must be given a hard look, alternatives must be compared, and significance must be determined."

Qualified Support for Climate Change Analysis in EAs

- Unless in an EPA designated Clean Air Act area. This is how documents get so bloated that no one reads them.
- The issue should be the potential for the generation of significant climate change impacts from or on the proposed action, not the type of EA.
- Should be done during regional planning...not a major difference between alternatives at this point.
- Discussion of potential greenhouse gas emission impacts change may be appropriate in some cases, but the decision to consider/report such findings should not be tied to the 3 EA groups defined in this survey.
- It is not clear in the above question but the consideration of adaptation should be included - however, until the science is improved, project level analysis of greenhouse gas increases or reductions should be avoided.
- Depends what you mean by "specific analyses". Small-scale EAs still need to justify why climate change is not an issue for that particular proposed action.

- It seems absurd to consider an EA-level projects' impact on a global issue like climate change. It is much more appropriate to consider these issues on the regional level (i.e., MPO/MTP) or state level (i.e. SIP) as opposed to with individual environmental documents.
- All "super EAs" should be EISs, and should address potential climate change impacts as all other impacts are addressed: analyze objectively if potentially significant, or explain why not if preliminary studies indicate that the action would not have significant climate change impacts.
- Depends on the emissions of the action in the small EAs. Plus what about climate change effects on the project or if climate change could exacerbate project impacts otherwise insignificant?
- Unless small-scale EAs are defined by their lack of impacts, there seems to be the potential for small-scale projects to still benefit from use of any inventories that have been developed. The main restriction to analysis of greenhouse gasses right now seems to be the lack of inventoried data.
- It should be applied to Super EAs solely.
- Greenhouse gas emission inventories--especially costly, detailed inventories--seem beyond the scope of most EA's, even super-EA's. Perhaps if there were some EPA database to check on potential emission sources, similar to a preliminary, Phase 1 Superfund assessment based on existing public records? Only in the case of an EA for a substantial emission sources should they even need to be considered. That is, continue to scope the EA/EIS based on the nature of the project and the potentially affected resources, and public info about the existing/future without project condition in the potentially affected area.
- It truly depends on the mitigation and type of action in the FONSI EA.
- This should be qualified - climate change should only be considered if it is an important "issue" associated with the proposed action and its environmental effects, regardless of the EA type.
- Global climate change impacts need not be addressed; only an inventory of an activities contribution and immediate impacts.
- Evaluation of resource areas cannot be prescribed ahead of time, it has to be left to the outcome of proper scoping of issues.
- Smaller scale EAs should still consider this issue with respect to cumulative impacts, but need not do an analysis of every individual project alternative.
- There are substantial uncertainties associated with the practice of linking global climate change even to projects where an EIS is required to meet NEPA requirements based on air impacts. While global climate change is occurring and has a direct causal link to human activities, establishing a tenuous connection to specific projects undermines the public's trust in the application of science to federal decision-making. With that said, all NEPA documents should discuss the potential emissions of greenhouse gases and provide some estimation of the emissions if fuel-burning equipment is involved. By implementing this requirement and having a clearinghouse of the quantitative estimates, CEQ would be helping to create an inventory of GHG emissions on a project-level basis. Once the science catches up to our aspirations of what we'd like science to be able to do today in this regard, this information could serve as a useful repository of information. Until such time;

however, where the mass balance of GHGs can be better understood and the connections between project-level GHG emissions and global climate change can be quantitatively characterized with an adequate degree of confidence, GHG quantification must be relegated to being an informational component of NEPA documents.

- This depends on the project. It is difficult to analyze climate change impacts for localized projects.
- Should provide at least a limited amount of analysis information on proposed action in small-scale EA's GHG emissions even if climate change effect is negligible.
- This statement, and the previous one (small-scale EAs may not need to do cumulative effects analysis) are flawed in that small scale EAs may be the most numerous in kind of the three, based upon ease and cost. Currently shorelines in Washington state are dying a "death of a thousand cuts" because legislators did not think a "small, residential recreational dock" had much of an impact. Years later, and thousands of exempt docks later, we are seeing the cumulative impacts along our shorelines, as shade increases and drift cells are altered. So...beware about assuming that "small" projects do not need cumulative impact assessment or consideration under climate change analysis. What's the greatest contributor to greenhouse gases? Those single, small cars we drive….Probably only applicable to transportation projects, or in a few other cases.
- If climate change is relevant at all to the EA no matter small or not it should be addressed. A small EA does not dismiss agencies from looking at impacts they don't want to include because it may influence their outcome.
- It depends - is it a key issue? Scoping should determine to what degree emissions, climate change, carbon, etc. should be considered.
- I agree, except that a small-scale EA may also require specific analyses of climate change depending on the project for which the EA is being prepared.
- It depends on the type of project - maybe GHG is the only impact of a small project and needs to be addressed.
- Small-scale EAs should include specific analyses of climate change, even if small. Some EAs analyze activities (e.g., installation of photovoltaic or hot water heating solar arrays) that may result in a positive effect on climate change
- Issues addressed in EAs should be dealt with consistent with their level of potential impacts.
- The nature of the proposed federal action should dictate how much consideration the document gives to greenhouse gas emissions and climate change. Many complex EA documents deal with issues with very little or no impacts to GHG or climate change. This issue is a red herring for many EA documents and we need to be careful that we do not create an affirmative responsibility for EAs to address GHG/climate change when those issues are not relevant to the NEPA analysis for the specific proposed action.
- Keep small scale EAs as simple as possible.
- Climate change effects and consequences for the location of the preferred alternative should be emphasized over estimating a precise GHG footprint for the project.

- No climate change analysis belongs in an EA, unless it is directly relevant to the proposal being analyzed.
- Again, this needs to be considered on an action-by-action basis. Saying climate change never needs to be addressed in a "small-scale EA" would be inappropriate.
- Rather than using blanket statements like these criteria should be developed regarding GHG. GHG analysis is an area vulnerability, and often requires engagement of experts which can be very expensive. GHG analysis should only be done for very large scale actions. And, if you need an EIS, DO ONE. I do not believe we should give people additional rational for 'super EA' when and EIS is more appropriate. Do not legitimize super EAs.
- Be careful to address only those impacts that are germane to the project. Global warming is an all-inclusive term and care should be exercised in addressing "global issues".
- Databases and assessment tools are needed for greenhouse gas analyses. I would like to see us get to where GHG analysis in the small scale EAs is similar to what is currently done for Cat Exs.
- It should depend on whether climate change is even a relevant issue to the proposed action. Super EA's shouldn't automatically require this analysis. The level of climate change analysis should be commensurate with level of potential impacts.
- A small scale EA could have a "mitigatable" climate change impact. In an effort to manage true cumulative impacts small-scale EA may require more robust analysis. It should be based on the nature of the project, not the size of the document.
- I agree with the Super EA and small EA assessment. For the FONSI EA I think that inventories would probably not be needed, but locational climate change effects should be documented. If these locational effects are very significant then inventories might be needed.
- Perhaps, this will lead to a better understanding of the issue itself.
- Although I think it's important to discuss greenhouse gases, I don't think an action would be large enough on its own to generate anything but a minor impact. For this reason, I believe GHGs should be discussed in cumulative impacts as well as air quality.
- Need CEQ guidance.
- While small scale EAs do not necessarily require greenhouse gas emissions inventories, an analysis of climate change effects and cumulative impacts should be considered in a small-scale EA, especially when dealing with vulnerable locations (e.g., Alaska and coastal areas, increases in wildfire in arid regions, etc.) or when working with Indigenous peoples or other vulnerable populations.
- The idea of preparing specific guidance on these different levels of EAs is really unnecessary. Why don't we have one set of requirements and allow agencies to deal with as their departmental and agency guidance suggests?
- Maybe. Not sure I can answer that. Depends on what action is in the small scale EA.
- Depends on what the small-scale EA is for. For short-term or minor emissions (construction or normal operation on minor emission sources), they wouldn't need the analysis, but should mention why.
- The small scale EA probably involves something without many new emissions.

- It should be treated like any other effect - gather the data and analyze - the level of effects determine what needs to be done.
- All potential impacts should be equally and appropriately identified and assessed. It should not be scaled based upon the size of EA.
- The above statement is too cut and dry; each project has unique studies and documentation. The need for studies and documentation should occur during project scoping.
- It really depends and needs to be derived by the scope of the action. For example, the proposed action might be installing a series of backup generators on previously disturbed land. The only resource affected might be air quality so the EA could be small/focused but due to the action will require more robust GHG analysis.
- Unless the project can demonstrate a clear QUANTIFIABLE climate effect, this should be irrelevant.; it depends on the project and the location of the project relative to existing air quality.
- If a small scale EA has the potential to significantly impact GHG, it may require specific analysis.
- While I personally agree that small-scale EAs should probably not require specific analyses of climate change, failing to include a sufficient level of analysis will open an avenue for litigation.
- GHG may have to be studies depending on the nature and location of the project - not the artificial name that NAEP is trying to give to different types of EA.
- GHG evaluation and local climate change are fair topics for an EA; however, I believe that large-scale analysis or "global" climate change is outside the scope of most EAs.

Concerns Related to Climate Change Analysis in EAs

- This is challenging. I don't care to spend a lot of time and money quantifying emissions only to do some conceptual hand-waving of the findings. I'd prefer to avoid the additional expense of quantifying emissions until there other requirements are established that serve as measures to gauge what the quantified emissions might imply. I'd really like to streamline efforts and reduce costs of preparing EAs.
- Until there is a predictive model that one can actually use (i.e., one that actually reflects reality), this will remain a controversial issue and unresolved. I have been to countless conferences and I hear the same hogwash on how to handle GHG and climate. It is lip service at best and pure speculation at worst. Unlikely to affect the level of NEPA documentation or the selection of a preferred alternative.
- Addressing climate change with any degree of accuracy or relevance for many projects is difficult at best. Generally the information provided is not useful to the decision-maker since the impact is typically extremely small, even on a regional scale.
- Most of the climate change language is cookie cutter/qualitative. It does not mean anything.
- Finding it hard to see value in climate change discussions for most topics. Most text is going to be vague.

- Not enough clarity in the cause and effect to clearly address. Most of us agree that there is a human-caused change; but to measure, assess alternatives, and generate a clear preferred alternative based on an unknown does not add clarity to the process.
- The use of the words 'not require any specific analyses ' for small-scale EAs is too limiting. Suggest changing 'any' to a less absolute term.
- The current science is mixed and definitive effects and consequences are not possible. Climate change is too difficult to predict to be included in EIS's or EA's.
- The issue of climate change is difficult, the science of the nature and exact effects of changes is uncertain. This needs to be disclosed as an area of "incomplete and unavailable" issue. Many current NEPA documents include conclusions relative to climate change that are purely theoretical.
- The EA is a threshold determination document. The science of evaluating long-term impacts from greenhouse gas emissions has not yet matured. Would the results of the analysis based on what is currently an inexact science push the project into an EIS? I do not believe that is the case, so the analysis is inconsequential to the EA process.
- For the scale of individual NEPA projects we deal with (EA or EIS), I think any analysis of climate change is a waste of time, money, and effort and is utter nonsense!!!
- I have no knowledge of climate change being a local impact that could mitigate or worsened by a project in one particular area. I would characterize emissions impacts as an air quality concern. A project that would have no significant impact (i.e., a project not requiring an EIS), should have no impact on climate change and there would be no need to address it.
- However, NEPA documents should not be used to compile irrelevant, speculative, etc. information.
- The whole greenhouse makes the grossly errant assumption/presumption that human actions can beneficially alter our actions to benefit the climate (reduce or mitigate human impacts to the climate) on a continuing basis. However, on a geological scale, the probability of such an outcome hovers at zero. We are at the backend of an inter-glacial period, and with geologic climate cycles a known fact, anyone who thinks that there will not be another large-scale global cooling cycle won't occur is ignoring geologic history. Additionally, scientists don't really know what triggers an ice age, much less when the next big cooling downturn will occur. This doesn't mean that we shouldn't be sensitive to the impact to the ambient environment in the geological short-term. But it does mean that the impacts should be properly characterized as to their short-term geologic effects as a matter of intellectual and scientific honesty.
- The need for climate change analysis should be dependent on its relevance to the specific decision. Whether climate change is attributable to human activity is still unproven and NEPA should not be tailored to the "controversy of the month."
- I don't think climate change should be addressed in any level of EA documents,
- I would agree that some larger environmental documents would likely need to take into account climate change, and lots of small scale projects are unlikely to have an impact on factors affected by climate change. But I can conceive of situations where

the reverse may be true. I'm not in favor of building different requirements into processes that should proceed at the same level of effort. In other words, just because you have a budget big enough to produce several thousand pages of documentation doesn't mean you have to, or that you should make your document something that it shouldn't be just because we've changed the requirements making a big EA into a small EIS OK.

- Climate change not needed, simply apply adaptive management to climate change and the proposed action
- By definition these actions will not have a significant effect on the human environment. Adding these kinds of analyses in EAs contributes to the futility of asserting page limits. For EISs it is absolutely appropriate to address CC.

Other Comments

- The length of an EA is determined by the subjects it must address. The subjects are not included or excluded based upon whether they can fit within a prescribed page limit.
- Climate change in NEPA should be addressed in federal policy documents, not try to force it into EAs. CEQ needs to step up and take the lead requiring that all major policy documents created by federal agencies, as part of their NEPA compliance address how specific actions/ policies are going to be taken to address climate change.
- Your super EA should not exist. It is an EIS. If there is a impact worthy of setting out all this for the other two EAs, go to an EIS.
- With currently no agreed upon methodology for studies and results analysis, there is concern with making judgments not based on regulations due to potential lawsuits.
- Stupid question. Read the Clean Air Act in the transportation context. For NAAQS, impacts are evaluated at the metropolitan or State level. Why would we do a more global pollutant at a much smaller scale, the project scale? Regarding questions 17 and 19, scoping and cumulative impacts depend on the project, not the EA length.
- I agreed with this, but really, what scale are you talking about?
- The EA / EIS is not the place to deal with climate change. Compliance with Clean Air Act is pertinent and sufficient. A single project's impact upon climate change is insignificant and obtrusive to the proponent; however, policy changes that affect entire industries / ways of life should advance for climate protection. Thereby, the EA would evaluate the proposed action / alts in regard to the policy / laws for climate protection.
- The level and detail of analysis, if at all, of any resource or issue will vary with the scope and complexity of the proposal. I would suggest that a definitive exclusion or inclusion of climate change should not be attempted.
- I think too much emphasis is being put on climate change discussions within NEPA. The variables are way too extensive to get a true inventory of a project. What is all the work getting us? What does it change? I think the answer is "nothing".
- I think we should deal with climate change but I don't know how to do it with rigor yet be practical.

- All these questions are very leading and provide no alternative perspectives -- as example, I find the CEAMs process for cumulative effects inadequate, yet your questions focus on this approach as a principle technique. You assume that climate change is proportional to the level of EA documentation--not true, it depends on the nature of the climate change issue, not the level of EA documentation.
- A framework for CC analyses is sorely needed!!
- Can CEQ just give us a prima facie level of significance for GHG emissions?
- Mitigated FONSIs and small-scale EA should be exempt for review.
- Greenhouse gasses are produced on a global basis. How a project contributes to GHG emissions is immaterial if the rest of the world is emitting GHGs right and left. It is a hollow and meaningless effort to try and tease GHG impacts out of a proposed action because there is no central accounting or authority for global releases of GHGs. However, it would be wise to anticipate how climate change might impact a project in the future.
- Climate change is to political and unscientific and not specifically foreseeable and projectable for either short or long term affects and should not be required at any level.
- We really need final climate change guidance from CEQ to put everyone of the same sheet of music.

Observations on Responses

As shown in the above table, 236 respondees addressed the incorporation of climate change in EAs. The overall response was positive for including change (55.1%); however, 44.9% indicated a negative response. The fact that CEQ has not finalized its draft guidance entitled “Consideration of the Effects of Climate Change and Greenhouse Gas Emissions” (published on February 18, 2010) may have influenced the overall percentage responses noted above. The 110 received comments were divided into groups entitled Support for Climate Change Analysis in EAs (19 comments), Qualified Support for Climate Change Analysis in EAs (55 comments, with many of them noting the need for additional information), Concerns Related to Climate Change Analysis in EAs (19 comments), and Other Comments (17 comments). Again, the majority of comments were favorable; informational needs and other issues were identified.

Bottom Line

Support for climate change analysis, as appropriate, for all three levels of EAs was noted. The concepts in the CEQ’s February 18, 2010, draft guidance on climate change analysis, primarily for EISs, could be extended for use in EAs. The issuance of final guidance on climate change analysis could also inform its relevance to EAs.

Question 21 – Section 1502.9(c) of the CEQ's NEPA regulations indicates that agencies "…shall prepare supplements to either draft or final EISs if: (1) the agency makes substantial changes in the proposed action that are relevant to environmental concerns; or (2) there are significant new circumstances or information relevant to environmental concerns and bearing on the proposed action or its impacts." Further, it is noted that agencies "…may also prepare supplements when the agency determines that the purposes of NEPA will be furthered by doing so." Based on the above, should the concept of supplements be considered for the three levels of EAs?

EA Level	Yes	No	Response Count
Large-scale (Super EAs)	92.8% (219)	7.2% (17)	236
Mitigated FONSI EAs	83.1% (196)	16.9% (40)	236
EAs for small-scale projects	65.3% (154)	34.7% (82)	236

Other comments – 41 comments received; they are categorized into three groups.

Favorable Comments Regarding Supplemental EAs

- If the situation changes, those changes need to be addressed. You need to prevent a "bait and switch" EA approach that some Agencies would love to do to hide their actions.
- If the circumstances have changed, supplementary analysis and documentation is still necessary, regardless of the document type.
- A supplement should be done only when the changes, or new the information, would change the level of impact to being considered significant in a resource area. The agency should still document their analysis for the agency files when the change, or new information would not result in a significant impact on a resource area.
- Adequate documentation/environmental review is appropriate at all levels. Clarity on different options depending on the type/amount of change would be helpful.
- Even if it is a small scale EA, if the project changes, it should be considered.
- As NEPA is often addressed (and should be addressed) at the early stages of a project, it is not unusual for a project to have changes for a variety of reasons. Supplementation is a cost and time-effective method of addressing those changes for ANY size document.
- Given the small scale and effort required for the small-scale project EA, it seems prudent just to start over. The mitigated FONSI EA's would more likely involve some monitored results and/or adaptive management which would be more likely to result in changed situations; although the adaptive management plan should anticipate the subsequent action(s) needed.

- If the substantial changes change the impacts then yes on all three. If the project effects are not changed, then no.
- Should always revisit previous EAs when supplementation is a possibility, otherwise the tendency may be for an agency to propagate an EA for decades without updating the analysis.
- I am not clear on this question. If the lead agency has been questioned on their EA (at any level) and determines that a supplemental is necessary, either because there was a lack of material disclosure in the original document or their NEPA document does not meet state standards and will not be adopted until the information is provided, then a supplemental should be at the agency's discretion - "when the agency determines that the purposes of NEPA will be furthered by doing so."
- Supplements and reviews are helpful tools for avoiding unnecessary paper work and implementing adaptive management.
- If the project changes, then the environmental study (EA / EIS / CE) needs to be re-assessed to determine if the changed project is in line with the impacts / mitigations outlined in the original project's environmental document. The "Supplement" doesn't need to be overbearing (which seems some agencies/proponents contend) but a detailed review of the original project environmental document compared to the changed project plans handled in a letter and tabular comparison is not overbearing.
- Keep small scale EAs as simple/small as possible. If there is a change, make a new EA.
- Small EA - do it over if things have changed. Mitigated - do it over if mitigation is how you got to FONSI, then the project is likely a mess if changes have occurred and you should do it over. The super EA is basically an EIS, so sure, supplement.
- We need supplemental documentation and analyses when they are called for. None of the "types" of EAs should be exempt from the need to consider supplemental information.
- This may give an agency an avenue for updating an old EA with new information; without having to create or revise an entire document.
- It is in the public interest to do supplements when needed.
- The nature of any changes could be significant. A small scale document could become a large project based on changes to project purpose, need and alternatives. The supplement requirement should be driven by the nature of the change, not the size of the document.
- EAs for Department of Defense testing often need to be supplemented because of the dynamics on the battlefield and other requirements. For major tests we have prepared up to three supplements to cover new requirements for a major new system. So, yes, should be considered --and we are already using EA supplements to address changes and new circumstances.
- Even a small scale project can develop significant effects. For example, the addition of the use of a particularly dangerous pesticide.
- Though I don't believe perpetuating the three levels of EA's is valid, I do believe supplementing an EA should be allowed in some limited contexts.
- Any change in project scope and/or scale or changes in the surrounding regulatory or political environment of material impact should be documented as a supplement.

- This is a great way to update a EA when new information may come to light or when some time has went by since the development of the original EA prior to funding or permitting and a simplified supplement would be all that is needed and is much more cost effective.
- Again - the law should apply equally for all EAs

Opposition Comments Regarding Supplemental EAs

- A supplemental EA is almost a contradiction in terms. If the agency's original EA is inadequate, it should be withdrawn and an new one issued (or an EIS should be prepared instead). This supplement concept is too often abused as a way to patch up a poor initial analysis and avoid public scrutiny.
- The outcome of an EA is either a FONSI or an EIS, a single action not "continuing? action. Supplementing EAs has the potential to kick the can down the road for actions that should be addressed in an EIS.
- The supplemental process for EIS is complicated, confusing and generally not well implemented. You really wouldn't want to do that in an EA.
- Our agency has specific guidance that we do not supplement EAs, we prepare new ones.

Other Related Questions and Observations

- A re-evaluation should be adequate.
- Does a supplemental EA need to be prepared, or, in the case of the Army regulations, can just a Record of Environmental Consideration be prepared explaining the "substantial changes" or "significant new circumstances"? Use of a REC would be particularly useful when considering EAs for small scale projects and mitigated FNSI EAs.
- Currently there is no set method for reassessing impacts once the EA has been sent out for comment, but a FONSI has not been issued. This makes it difficult to determine regulatory requirements if something on the project changes, and there is no consistency to how this is handled.
- How many EAs would have to be re-written because new information is available? How many old EISs for that matter? Some serious boundaries would need to be added to this BPP.
- For substantial changes in the proposed action that are relevant to environmental concerns, CEQ should allow/encourage alternative procedures, other than ONLY EA document supplements, to consider changes to action, effects, and mitigation; re-evaluate effects; inform affected/interested public/agencies; inform decision makers; adaptively manage; document (e.g. ISO 14001 EMS); and monitor.
- There is no reason to consider supplements outside the tiering process. If CEQ and agencies insist on using Super EAs then they should consider whether tiering is more appropriate. This means they would have to use a tiered Super EA or just do an EIS. The same is true for mitigated FONSI EAs. Regular small EAs could use either another tiered EA or possibly a CE since both are clearly without significant impacts that need mitigation to avoid the potential for significant impacts.

- These are not EIS's.
- Too often supplements are done solely out of fear of lawsuit, so to "further NEPA" a supplement is done. Should develop a good understanding of "substantial changes" and "significant new circumstances" before doing a supplement.
- Some people call these revised EAs.
- No Super EAs.
- This is a REAL issue. We struggle with determining what constitutes a "substantial change relevant to environmental concerns." For some projects, detailed design comes (sometimes years) after the NEPA process is started and the engineers/ construction companies propose changes to save money. There can be a lot of pressure to approve the changes without a supplemental document because delays might result in cost overruns.
- For an EIS, a supplement is necessary when changes are "significant." Nothing is said about what to do when changes are "not significant." For an EA, "significant" changes cannot be the trigger because if those exist an EIS would be necessary. The UNASKED question is the trigger for an EA supplement.
- For a small project "substantial" or "significant" changes probably warrant starting over rather than supplementing -- especially if you have to re-scope.

Observations on Responses

Based upon input by 236 respondees, the summary table above clearly indicates support for applying the concept of document supplementation to EAs. The yes responses were highest for Super EAs (92.8%) and lowest for small-scale EAs (65.3%), with mitigated FONSI EAs being in between (83.1%). Twenty-two favorable comments were received on Supplemental EAs, with four opposition comments also noted. The third group of comments raises some questions and concerns regarding supplementation of EAs.

Bottom-Line

Support exists for appropriate supplementation of EAs. The principles and considerations for supplementation of EISs is in Section 1502.9(c), and they could be extrapolated and used as the basis for supplementing EAs.

Question 22 -- Assume that a series of BPPs for EAs is developed based upon the results of this questionnaire survey. Even though such BPPs could be articulated, institutional or financial barriers could occur regarding their implementation. If such barriers are identified, it could be possible to develop a national implementation strategy for addressing them. Accordingly, please list two barriers you think could be the most difficult to overcome.

Barriers – 302 barriers were identified by 190 respondees; they were divided into 8 categories as follows.

Institutional Barriers and Concerns

- Agency regulations and precedent
- Time
- Issued as guidance, not policy (lack of enforceability)
- Differences between federal agency objectives
- Needs to be a regulation, not guidance
- Institutional inconsistencies on EA analyses and documentation; agency awareness and acceptance
- Institutional inertia - we've always done it this way
- Agency capacity limitations
- Authority
- Unjustifiable federal agency comments. Commenting agency staff often make unreasonable and unscientific comments which bog down the NEPA process. The costs of some of the BPP for mitigation could cause conflicts with the project's mission.
- Funding
- Lead agency culture
- Agency buy in with all reviewers, legal, environmental, biological, etc.
- Concern that you are increasing NEPA requirements
- Cost to implement
- Financial - if it costs significantly more to implement the BPPs
- Cross agency agreement/consistency on BPPs
- Difference in EA prepared per federal agencies
- Resistance of agencies to incorporating BPPs that may be inconsistent with current agency practices, no matter how much sense it might make to do so.
- Agencies don't believe in pro-active NEPA
- Funding for applicants and federal agencies to identify and implement changes to existing policy and procedure
- Agency to agency differences in NEPA process
- Probably any costs
- Possible financial barriers without an implantation waiver
- Federal lead agency resistance

- Corporate incalcitrance
- Updating all federal agency regulations to match these BPPs
- Agency differences of opinion
- Changing current practices would require training, preparation of agency guidance documents, etc.
- Different federal agencies have vastly different ways in which they implement NEPA
- Ingrained, agency-specific methods for preparing EAs will be difficult to change
- Financial feasibility
- Some agencies have implementing regulations that may or may not mesh well with the BPPs.
- Wide range of project types
- Institutional -- agencies would need to incorporate them into their implementing regulation or guidance.
- Regulatory agency agreement
- Institutional--too much process
- Bureaucracy
- Unqualified "professionals" doing the work; agency-specific requirements; time to implement BPPs; infringement on a federal agency's right to implement NEPA the way they see fit; in accordance with CEQ guidance
- Some agencies delegate the preparation of NEPA documents to grantees
- Time
- Lack of agency staff to implement practices; identifying triggers of significance for other laws (NHPA, ESA, etc.)
- Understanding the value of NEPA as a process to making informed decisions - practical usefulness in the workplace
- Agency pressure; inordinate amount of data collection
- Dissemination of new BPPs to state agencies; old habits die hard; agencies will need to be re-educated; financial
- Agency and applicant buy off to implement the BPPs
- Cost
- Institutional - Many federal agencies are "stuck in their ways" in terms of NEPA documentation and the benefits of applying the BPPs will need to be very obvious.
- Institutional bias against fully implemented NEPA; inconsistencies between agencies on NEPA processes
- Incompatibility with other laws
- Existing agency practices (do not want to change); GOP partisan policy
- Cross-agency consistency
- Diverse mission, focus and application of NEPA by agency
- Interagency coordination
- Insufficient funding of contracts
- Agency institutional knowledge on how to do EAs counter to BPPs
- Determination of significant effect on qualitative terms
- The cost to prepare environmental documents
- Push back by agencies--perception that each agency is unique

- Agency staffing limitations due to workload; institutional
- Insufficient budgets, especially in the current economy.
- Increased costs of conducting the analysis and producing NEPA documentation
- Existing agency practice
- Funding
- Making them generic enough to be applied to the many users with different needs
- They conflict with the agency's NEPA regulations
- Agencies' varying interpretations for implementing NEPA
- Requiring comprehensive scientific surveys/studies/documentation for all EA types.
- Prerogative of the lead agency's role
- Author bias that they know how to do these and their process cannot be improved.
- Consistent application within and among agencies.
- Institutional paralysis to change
- The varying nature of each agencies projects. You might not find enough commonalities to generate BPPs
- Increase in cost
- Time; agreed upon standards and practices; nay sayers
- Poor link between environmental/project planning and implementation (knowing about the imposed BPP)
- You first need agreement on the problem. Not all agencies will agree.
- Agency differences; financial support
- Project schedules do not permit time for necessary analysis
- Resources; it represents a departure from the status quo
- Institutional prejudice against recognizing the value of the Traditional Knowledge of Indigenous Peoples; additional costs
- Agencies understanding of NEPA in relation to Agency Mission is a barrier to even complying with the intent of NEPA.
- We already have enough guidance on document preparation in departmental/agency regulations/guidance
- Financial
- Too many different agencies following the beat of their own NEPA drum
- Management expectations
- Education from FHWA down to DOTs, MPOs and local agencies in a proper manner
- Few EA topics are suitable to a "one-size-fits all" approach.
- The issues and hot buttons are often very different across projects.
- Additional costs
- Some agencies are opposed to public participation/transparency with respect to EA's but I see this as a critical BPP
- Resistance from the Army Corps Mobile NEPA center
- Too many scattershot proposals to improve NEPA
- Money
- Cost; political; adjusting how Federal agency NEPA implementing procedures address EAs
- Keeping BPPs sufficiently flexible, since actions differ greatly

- Agency culture
- Regulatory limitations on implementation
- Quality control
- Incorporating BPPs into existing NEPA guidebooks or handbooks for agencies
- Finding professionals
- Interpretation will vary widely
- Slowness of Federal Agencies to adopt new practices
- Time to complete
- Length of time for regulatory change
- Adding yet more burden to the already burdensome process opens new avenues of attack and levels of complexity
- Strains resources agencies
- Multi-agency agreement
- Reduced agency staffing levels
- There could be resistance to a more standardized approach to significant thresholds and impact analysis; individual agency EA development protocols
- Agencies might not want to change from the current CEQ regulations concerning EAs
- Acceptance
- BPPs open to interpretation
- Industry and public funding
- Implementation
- Differences between state and federal objectives
- Lack of interest in public involvement
- When local contexts suggests that BPPs are inappropriate
- Funding
- Environmental justice if treated fairly
- Financial constraints on level of effort available for EA preparation.
- Time restraints for funding can sometimes limit analysis to the level of legally adequate as opposed to the BPP.
- Time
- Resource agency culture
- Agency implementation
- Resources in agencies to fully engage in early scoping for likely FONSI projects.
- Approval timelines
- Lack of agency personnel with NEPA training or experience
- Consistency in implementing
- Institutional - if it is a paradigm shift from common practice
- Requirements for climate change analysis could be challenging for many projects unless specialists are on board.
- Consistent application of BPPs on all possible projects
- Funding and time constraints
- Cost and time constraints
- Agencies aren't willing to fund NEPA adequately.

- Streamlining BPPs with existing regulations to improve the efficiency while increasing effectiveness of the NEPA document.
- Agencies with established policy may conflict
- Training the existing workforce in the Fed government in the correct enforcement of new regulations
- A national implementation strategy would no doubt add to the cost of preparing an EA and agencies/applicants may balks at that
- The need to have a long lead time for implementation so that EAs begun before a certain date would not have to be rewritten right before a FONSI is to be issued.
- Adding public review/comment of draft documents is going to add time and money to an already burdened process; political backing
- Training for correct interpretation of the BPPs; cost of new procedures for any project in the lowest tier
- Cost
- Small EAs will be seen as too costly
- Cooperating agency requirements; resources to implement BPPs
- Money
- Difficult to changing agency culture ("This is the way we've always done it.") for improving NEPA
- Lack of agency budget to implement practices; the integration of evaluations and consultations under other laws.
- Dissemination of new BPPs to federal agencies
- Institutional
- Agencies too slow to change or adapt BPPs
- If BPP's increase reporting requirements or created duplicity in any aspect of the NEPA process
- Financial/staff power - many federal agencies perceive themselves to be so under-funded and under-staffed that they can't spend the time to apply BPPs. This perception may or may not be true. Either way, it is a barrier to overcome.
- Only doing enough to protect the agency from perceived legal vulnerability, thereby falling short of full NEPA or "good" NEPA; continued excessive paperwork in NEPA process
- Failure to include BPPs with contract documents for contracted EAs; GOP partisan policy
- Preparers taking advantage claiming will cost more, take longer to prepare a BPP-compliant document.
- Agency acceptance; additional costs
- Establishes very gray area in EA "no mans land"
- Uniform application across agencies
- Funding
- Cooperating / review agencies not onboard
- Government resources to produce or review additional work
- Lack of understanding / training for budget constrained agency staff
- Lead agency funding limitations
- Resistance to new regulation, especially in the current political climate.

- Longer timeframe for NEPA analysis leading to potential project delays
- Introduction of new process
- Agency not accepting BPPs
- Failure to adhere to regulatory guidance regarding NEPA procedural requirements
- Perception of timeliness of the EA process
- Agency implementation
- Increase in time required for preparation
- Sustainability
- Money; reviewing agency resources and protocols; it's not law
- Enforcement (making sure the BPP is actually implemented)
- Consistency with implementation from various state and federal agencies
- Old habits; agreement among agencies
- Scope of impacts
- $
- Institutional; agency guidance (good) mistaken as legal requirement (bad)
- Lack of staff resources
- Lack of funding
- Funding
- Not in my backyard critics that simply do not want to see any changes to their environment
- Additional time
- Resistance from contractors, used to the old way.
- Cost
- Time
- Geographic variability; cost; getting eventual 'buy-off' (positive rulings) from the courts
- Budgetary constraints on imposing BPPs
- Resistance because "this is how we do it."
- $
- Reluctance on the part of practitioners to adopt new practices
- Cost of completion and fair compensation (price wars should be eliminated or avoided)
- Agency coordination and acceptance
- Consistency, some agencies might not adopt this approach
- Broad scale application across the country with various landscapes and issues
- Adding more complexities, i.e., 3 kinds of EAs
- Individual agency EA review protocols
- NEPA practitioners might have a vested interest in protecting the status quo of the current EA system.

Development and Agreements on BPPs

- Change/understanding of BPPs
- Writing the BPPs that would be applicable to all agencies w/o hindering progress

- Poorly written BPPs- keep it simple
- Inappropriate requirements in the BPPs; justifying implementation varying across tiers
- If BPP's did not clearly improve efficiency, quality, public participation
- Professional/technical disagreement on applicability
- NGO comments
- Clear triggering delineation between EAs and EISs
- Giving sufficient rank and authority to EA professionals to implement this, sufficiently free from political interference to achieve the results.
- Deciding on a list of exemptions, exclusions, etc. to the set of standards
- Potential for BPPs to result in longer, more complex EAs rather than helping make them shorter and more concise
- BPPs need to be focused on real EAs such as what has been referred to as Small EAs.
- One size does not fit all; the BPPs may not be applicable to all EAs. Suggest the opportunity to adopt them for an EA or not.
- Coordinating adoption and implementation of BPP's on a large (i.e. national) scale
- Money to develop and implement the BPPs
- There would be too many exceptions to the "rule."
- Special interest financial support to prevent implementation
- Education on their use and abuse would be needed.
- Clarity of BPPs; implementation without legislative directive.

Legal Ramifications and Lawsuits

- Litigation
- These BPPs would need to have judicial support. I think the reason EAs have become so large is fear of litigation. Federal agencies spend a lot of $ avoiding litigation and its cheaper/easier to add a few hundred pages to an EA than end up in court.
- Legal challenges associated with changing NEPA
- DOD legal
- Issues and resources vary drastically by region; legal
- Agency fear of lawsuit
- Courts would have to uphold it
- The fear of litigation
- Judges & NGOs who constantly require NEPA redo's because of personal bias and use legal technicalities to do such
- Fear of lawsuits, overzealous suing
- It's complicated enough; why add more ways for others to legally challenge documents?
- Fear of litigation
- The absence of liability shields for NEPA practitioners at the lower levels of EAs

Political Influence and Concerns

- Political barriers - threats to remove EPA or, worse, NEPA support
- Political direction of outcome makes implementation useless.
- Politics and the struggle to implement the new regulations
- Current political climate of increase in environmental costs; agency acceptance
- Manipulation of NEPA documents for political purposes
- Lack of political support
- Political interference in the decision making process of the use of BPPs
- Republicans
- Private industry pushback at Congressional lobby level; professional development to understand changes
- Politics
- Budget and schedule; political pressure against proposed development
- Political/economic perception
- The growing political imperative in both parties to demonize environmental assessment - this is severe in one political party but it is also present to some degree in the other.
- Politics

No Need for BPPs

- BPPs should not be developed.

Comments on Super EAs

- A BPP should be to discourage the use of Super EAs - but there will be resistance to bumping what is essentially an EIS to an actual EIS as it is seen as an automatic delay.
- Any "BPP" for "Super EAs" should be rejected by the public, the agencies, and the courts.
- Super EAs are an inappropriate use of the EA process under CEQ Regulations and could jeopardize the Regulations themselves and possibly the reopening of NEPA in Congress; therefore, having BPPs addressing Super EAs would be imprudent.
- Getting agreement to establish a super EA (just do an EIS)
- Legal challenges to circumventing EIS w/ "Super EAs"
- The concept of a "Super EA" is antithetical to the NEPA and the clear intent of the CEQ Regulations
- Formally adopting Super-EAs - more work for those who review these documents, issues with CEQ Reg 1500.4, does not reduce delay but institutionalizes it
- Pressure to allow Super EAs as a "streamlined" environmental process rather than doing proper analysis under an EIS; additional time in schedule

Federal-State Relationships

- States rights

- Regional/state habits and nuances

Other Comments

- Sacred sites disturbance
- NEPA being used as a NIMBY tool
- Requirements for supplemental analyses could be difficult to uniformly enforce, particularly when agencies had written very well documented decision records.
- Self-serving interest groups
- Too much creative invention of procedures will confuse people
- Failure to recognize the complex nature of NEPA documents, especially regulatory vs. non-regulatory
- Applicability to disparate projects
- People will take advantage of the levels and use them to not be rigorous, explicit, or thorough
- Public not accepting BPPs
- Mandated approach/framework for alternative selection (when public dollars are being expended); should paid contractors make the selection or recommendation?
- Faltering economy
- EAs are more often specific to a local area and I believe national implementation strategy is not possible to prepare in a useful manner.
- Page limitations
- Shared-decision making with the public
- This is not streamlining; this is, once again, making things more confusing; readily available data; relevance of general BPPs to local context
- It is the agency's determination on the level of impacts not the publics
- Agencies might not be willing to adopt guidance from NAEP without CEQ backing; funding for project
- The proposed changes must come with potential cost savings or there will be resistance
- Achieving agreement within the profession about what is best; consistency and quality / technical content; financial
- Lack of communication/training; cost of implementing BPPs
- CYA
- Need for methods to cover adaptive management and sequential decision-making under NEPA in a rapidly changing environment with new information coming to bear.
- I would want to see the supporting data on the BMPs rather than just accept whatever was handed to me.
- Preparers unaware (not ignorant) of the requirements
- Narrow minded practitioners
- Getting CEQ to adopt them
- Large scale property access and rights
- No easy way to keep all stakeholders happy with new process
- Forced results, i.e. knowing the answer and making the document fit the need

- Showing exorbitant number of pages as a limit, excessive mitigation requirements, and other similar principles highlights the improper use of EAs to skirt an EIS and could draw unwanted attention to EAs and other areas currently downplaying the potential for significant impacts.
- Acceptance by clients
- CEQ is out-of-touch with project-level implementation and needs to get in the trenches with practitioners to see why some requirements are not implementable in reality.
- A one-size-fits-all approach to GHG and climate change issues when they may not be relevant to the proposed action.
- Because of Barrier 1, CEQ is not likely to endorse
- Writing styles and grammar by consultant-prepared products is terrible. We need a system that checks this before contracts are awarded. This system should require a PEER review by contractor before document is released to government agency
- Allowing participation from the public or agencies that have no jurisdiction or are affected by the project.
- Consultants will bear the financial and time brunt of implementing the changes to the process as agency budgets are not intended to "train" consultants.
- You're talking about NEPA. You're proposing an action. What's your purpose and need?
- Inability of comprehending the "big picture" and understanding the role of the NEPA review process
- Business lobbyists
- Agency personnel age
- Scoping
- Resources to implement a strategy to get BPPs to agencies; financial resources
- General lack of awareness of the BPP from companies that do not have much experience in EA preparation; consensus among agencies -CEQ would have to distribute
- Communicate to the stakeholders the differences between the EA and EIS

Observations on Responses

The first category on Institutional Barriers and Concerns was extensive (included 200 barriers and concerns), and numerous agency-related issues were noted. If BPPs are promulgated by CEQ, it will be necessary to develop an implementation strategy which recognizes such barriers. The second and third categories (Development and Agreements on BPPs, and Legal Ramifications and Lawsuits) also raise issues for consideration by CEQ in conjunction with the affected agencies. Comments on Super EAs were also included as a barrier, and these coincide with earlier similar comments on Question 8 and several other questions herein. The Other Comments listing included 45 items, and they should also be reviewed if CEQ decides to develop BPPs and guidance for EAs.

Bottom Line

The large number of barriers should be considered by CEQ and Federal agencies if there is a decision made to provide guidance and BPPs for the preparation of EAs. Because of similar concerns in multiple comments, careful review of the listed barriers and issues could yield a reduced list of items for more detailed consideration.

<u>Question 23</u> -- Identify positive actions that could be taken by federal agencies, NAEP, and consulting firms relative to implementation of anticipated BPPs for EAs. Please add your suggestions to the following list.

- **Include BPPs in contractual scopes of work for the preparation of EAs.**
- **Federal agencies and/or consulting firms should develop training courses to further explain anticipated BPPs and their application.**
- **Conduct special studies of case law or other subjects that could be used to support BPPs for EAs.**
- **Other suggestions:**

<u>Suggestions</u> – 95 suggestions were received. They are categorized into nine groups.

<u>Suggestions on Above Bullets</u>

- Bullet two states "anticipated BPPs and their application". Training courses should address only the required BPPs. Federal agencies, NAEP, and consulting firms should work with CEQ during development of the BPPs to ensure that they are clearly defined, fully explained, and are not open to wide interpretation.
- Contracts are signed before scoping, so specification of BPPs in a contract would be premature. Training is always needed. Do good planning and good mitigation, and give litigation a back seat where it belongs.
- Good list! These three actions would go far in implementing the BPPs.
- I think you've covered the best ones.

<u>Suggestions on CEQ Activities</u>

- CEQ take an active role in identifying good practices
- Address the extent of scoping (public & agency) anticipated to be required for the level of NEPA review.
- CEQ needs to institute page limits & look for cost reductions instead of expanding costs.
- Have CEQ promote BPPs as a way to improve efficiency per their most recent guidance (assuming they would accomplish that goal).
- Urge and/or assist Federal Agencies to incorporate the BPPs into their implementing regulations and guidance.

- Assist Federal agencies in fully integrating NEPA earlier into their planning and decision-making processes so that EAs are used as true decision-making rather than compliance documents.
- Do not add process to clarify processes. While this may seem like a productive way to resolve NEPA application and strategy, it will serve to further distance NEPA from its stated purpose and the real-world consideration of environmental impacts in federal decision-making. Efforts here will be better spent on establishing what is / what is not significant and clarifying when and where CATEX, EA, and EISs ought to be used rather than sub-dividing EAs into 3 categories. Adequate discretion must be left to the NEPA practitioner to make these subdivisions on their own without having to call it by a separate name or treat it differently. Furthermore, the more that sub-categories arise, the greater the potential for legal challenge, since one could argue that a Super EA ought to have been prepared versus a Short EA. I'd recommend instead of perpetuating terms that imply EA subcategories, CEQ focus on providing a Plain English NEPA Guidance Document that synthesizes the best of what previous NEPA documents have set forth with practical applications from a multitude of federal agencies (not just park service) and candidly dispel the worst of NEPA implementation. This guidance document would be a living document that would have a name like the NEPA Green Book and would supersede all previous CEQ guidance documents. Couple this Guidance document with a suite of on-line calculators to quantity media-specific environmental impacts on a project-level basis, and CEQ would be getting closer to attaining a more unified, consistent and defensible application of NEPA for the real-world.
- Mandate the changes through CEQ.
- Conduct a demonstration project that meets or exceeds NEPA EA legal requirements and that creates alternative procedures that integrate and consolidate existing EA requirements with ISO 14001 EMS, EO 13514, LEED, master planning/comprehensive planning, and other environmental/sustainability/natural resources requirements.
- Develop NEPA implementation guidelines that all federal agencies must follow, rather than allowing each agency to adopt individual policies/procedures. Encourage early/ open coordination to ensure NEPA includes discussion/disclosure of all conditions likely to be imposed in future permits/approvals. Reconstitute the NEPA modernization efforts CEQ started a few years ago.
- Develop new BPP-conformed scoping documents for each level of documentation; provide appropriate examples or outlines of each level of EA with annotated comments and suggestions.
- Develop an appropriate monitoring and evaluation system for the BPPs to determine their effectiveness. Create a method to quickly discontinue use of ineffective or simple wrong BPPs and a way to correct such errors with new replacement BPPs. Create a computer access point to provide continued and up-to-date information of the use and experience of other agencies.
- Provide real-world examples of the level of analysis that is required for each discipline to be covered by NEPA-update visual quality guidance, provide better guidance on what is not to be covered by NEPA.

- Establish support from CEQ to evaluate and adopt BPP's -- Utilize inter-state working groups to develop/refine and implement BPP's.
- Get CEQ on board.
- CEQ should publish additional guidance about the BPPs or update its regulations. This will allow agencies to justify expanded scopes and better NEPA documentation and analysis.
- Solicit feedback on the success of BPP implementation from various user groups. Review for update on a regular basis (5 years?) based on feedback. If they are not easy to use, they won't be used.
- Provide examples of where and how BPPs are used.
- Establish a forum of highlighting use of BPPs in practice.
- CEQ regulations contain BPPs - read and follow them!
- Identify, assemble, and assess practical value of field-practitioner BPP. If EAs are, in fact, to be categorized as small, medium, and large, then develop specific guidance for what constitutes a small, medium or large EA.
- Provide guidance documents on BPPs.
- Implement the substantive recommendations of the NEPA Task Force as outlined in the report to CEQ titled "Modernizing NEPA Implementation."
- Make it clear that not all BPPs will be applicable to all EAs.
- Revise CEQ regulations to further address EAs.
- Standing Committee to discuss/implement BPP modifications to address changes in policy or case law in a timely manner.
- Provide examples of minimum standards of each document (Super EAs, FONSI EAs, small-scale EAs). Determine how much labor (time) is needed to complete each to establish a baseline, if at all possible.
- It would be good to have some pilot studies first before implementation.
- CEQ would need to issue final guidance on the use of BPPs for EAs in order to set the tone for changes in how we do business.

Suggestions on Agency Activities

- Federal agencies could promulgate regulations on implementing the BPPs.
- Consistency of BPPs across agencies.
- Incorporate the BPPs into their Administrative Orders/Env. Guidance documents.
- Do test runs for BPPs; see how they are accepted. Don't make them a requirement until they have been test run.
- Federal agencies could issue short-term (3-5 year) contracts for staff support to implement BPPs. There would be a training/organization component to these contracts such that at the end of the contract period agencies are "self-sufficient" in terms of applying BPPs, etc.
- Federal agencies include specific BPPs in their regulations and guidance.
- Publish 'Go-By' matrices and checklists for the preparer to use. Educate the User (agency signature person / department) on the BPP vs. the 'work arounds' often in-place to avoid EIS. Include shorter review time.

- Include results of consultations in draft EAs – Staying focused on concise EAs – not EISs in EA clothing. Focus on mandated tracking of mitigations and making sure mitigations are in place prior to taking an action.
- BPPs should focus on categories of EAs for different "bins" of federal actions (including reg vs non-regulatory) such as facilities, real estate, land management, fisheries management, aquaculture, scientific research, coastal and marine spatial planning, traditional and alternative energy production, habitat restoration, transportation, agriculture, military training and homeland security, and other federal activities. The challenge and pitfalls of providing broad NEPA guidance to federal agencies that is applicable across the full range of actions that agencies may take should be recognized as BPPs are discussed and developed, and consideration should be given to developing BPPs focused on specific subject areas rather than more generic areas.
- Incorporate appropriate and practical BPPs into the project's design.
- Focus BPPs for like, typical agencies and projects. Conduct periodic reviews of the effectiveness of the BPPs.
- Glean from the lessons learned of case studies to prioritize key BPP within agency preview and work scope.
- There seems to be a bias towards generally requiring more information in an EA, adding to its length. Any of the BPPs should not be applied in a "one size fits all" manner. It would be more appropriate to use BPPs as generally accepted practice to be applied, as appropriate, to each EA. Agency discretion regarding their use should be maintained.
- While I think it would be useful for CEQ to give guidance on what they think constitutes a "hard look" for an EA, I think you need to be careful about establishing these categories and having specific practices that apply to them. NEPA documentation needs to be flexible to meet the requirements of the action and the area it is taking place in. I think agencies should be using EAs to show the analyses done to determine the level of impacts their action will be having on the resources, ecosystems and communities in their project area. They should focus the information in the EA on those issues where they truly have the potential for significant impacts. They should also reinforce CEQ's Regulations, Section 1500.4, of setting page limits, preparing analytic rather than encyclopedic documents, discussing only briefly issues other than significant ones, and reducing emphasis on background information.
- BPPs should be developed specific to project type, i.e. roads vs. small structures vs. new operations plans vs. maintenance or replacement and betterment not previously evaluated, vs. extraction and so on.
- Scoping sessions early in the process help define project actions and difficulties.
- Develop streamlined techniques and processes to avoid an outcome of extended EA schedules due to implementation of BPPs -- that would run counter to current efforts to expedite environmental reviews and elicit opposition.
- Seek more input from subject matter experts who write NEPA analyses, not just managers. Do not seek immediate and radical change through some announced fiat. Promote improved EAs one at a time, providing models of excellence. Today's

NEPA practices are the result of a 40-plus year maturation process. Steer the process but avoid sudden lurches.
- Coordinated regulatory change (across agencies)and training.
- More collaboration within the federal community. Ensure that the preparation of environmental documents is by qualified, certified, environmental professionals!

Suggestions on Training

- Training!
- Cut out all of the lengthy and unnecessary information. Train staff to write clear and concise documents based on realistic application of scientific knowledge.
- Develop a special training program for grant recipients.
- NAEP should provide training on BPPs for EAs Stepwise triggers for finding EA thresholds BPPs should guide planners through the writing of the document with a series of questions, asking them about applicable regulations in each section. Their Y/N answer will allow them to finish the section, skip it or move on. BPPs must include training in how to write in Plain English for the public BPPs will include key information on how permits relate to the environmental analysis - e.g., if your project has endangered salmonids, and your client is undergoing a section 7(a)(2)ESA consultation, what information can you use to determine if there is a potential significant impact? Where is the information located? What if the consultation is not over yet? Should NEPA be finalized before federal permits? Etc.... I would like to see action taken by CEQ to back up Project Managers who may believe such things as GHGs should be included.
- Training courses should be tied into a national NEPA certification program that needs to be developed.
- Training courses could also be offered by professional organizations like NAEP, or AWWA, councils of governments and universities and college extension programs. Technical writing courses specific to EIS, EA and BPPs should also be encouraged.
- Training and case studies I agree with; a GIS system that contains descriptions (which are updated as necessary) of the affected environment that can be used by all agencies. We are constantly redoing work completed by others. The first place to reduce this duplication is in descriptive sections of NEPA documents such as affected environment. The second developing scoping procedures with appropriate input from affected parties; sell the concept through CEQ.
- The practitioners know what has to be done. It is the project sponsor who wants waivers. Training for project sponsors is the key.
- CEQ endorsement. NEPA and BPP training to agency legal staff who might be reluctant to risk doing something new.
- Training courses would be great, but they cost $. Unless a significant cost savings could be demonstrated by implementing BPPs then it will never happen.

Suggestions on Information Dissemination

- Make best practice guidance available online on agency websites and Nepanet where appropriate.

- Revise the public guide to NEPA to include these. Develop a website/webpage that reviews these with training, Q&A, and a forum or posting board to see how others are implementing/using the BPPs.
- Clear guidelines/flow charts on line.
- Develop a website that addresses the nuts and bolts of document prep for NEPA. Have website maintained by professional staff made up of federal staff employees (not contractors).
- Offer to have a meeting with agencies before developing EA to talk about BPPs - Add sessions/workshops on BPPs to local conferences that agencies/consultants attend regularly. Post BPPs on the Internet.

Suggestions Related to NEPA Attorneys

- Have federal agency legal staff responsible for the review of NEPA documentation coordinate with each other for better consistency in how they interpret NEPA and provide comments on draft documentation.
- Have federal agency legal staff responsible for the review of NEPA documentation coordinate with each other for better consistency in how they interpret NEPA and provide comments on draft documentation.

Other Suggestions

- How do you change the culture of an Agency? If all they want to do is, say, "get out the cut" (Forest Service), the structural problems of money and political influence can provide a lot of motivation to corrupt the NEPA process.
- Studies to determine classes of BPPs for proposal classes and context types; Capacity building initiatives. Best practice dialogue with other jurisdictions.
- Survey and work with traditionally underserved communities to define BPPs.
- Incorporate use of BPPs into other environmental fields, not just NEPA, so that the concept is consistently following by all Subject matter Experts within an organization. For example, when a cultural resource person is evaluating a “Significant impact” to cultural resources, their definition of “significance” is the same definition used by the NEPA staff.
- These actions should only be applied to the practice of preparing EAs as they were originally intended -- as preliminary decision documents.
- None
- License Environmental Professionals; EA practice would be better if more specific and proscriptive guidance were produced.
- BPP's should address paperwork reduction and encourage the NEPA process to be paperless to the degree possible.
- I think BPP are fine, the 3 levels or types of EAs worry me
- Give this idea up completely.
- Embrace the concept that "less is more" when preparing NEPA documents for actions without significant impacts.
- There should be a greater focus on environmental ethics in the NEPA process.

- Each "lesson learned" from a federal court case would require MORE pages in an EA, but there's little we can do to prevent that.
- Fully implement NEPA.
- Perhaps a better working definition of significance and a codified method of compensating private property owners for public takings of ancillary property rights - views, resale potential, etc.
- BPPs for EAs as well as the use of super EAs and adaptive management in conjunction with site specific simplified analysis for extraordinary circumstances could streamline the NEPA process and often produce a more meaningful document and process beneficial to the environment at the implementation level.
- This whole survey is enhancing the misleading distinction between the three alleged types of EA's . While I agree we should be developing ideas for BPPs we should make them general and not based on size of EA.
- Raising to the attention by the White House on political appointees as to the importance of supporting environmental staff and adequate staff levels.

Comments on Super EAs

- Discontinue use of super EAs. These projects should utilize an EIS approach.
- Have EPA review super EAs or mitigated EAs like they do EISs.
- Have examples of each level – Consider just preparing an EIS rather than going through flips and twists to prepare a Super-EA.

Critiques of BPPs Study

- The second half of this survey appeared to have a hidden agenda--e.g., trying to justify a work product you hoped to have funded. Therefore, I didn't feel comfortable answering these types of questions. Seemed self-surviving.
- I suggest you rethink this whole thing of multiple EAs, more layers, more regs, varied guidance, etc. I cannot see how this would reduce the already numerous lawsuits.
- State agencies that are joint leads with a Federal agency are at the whim and fancy of the Federal agency and their desires for NEPA process and documentation. Federal agencies can artificially inflate the size and scope of an EA in order fight off potential lawsuits. I call this risk aversion. So when it is more important to a Federal agency to fight against windmills than to strictly comply with NEPA and the CEQ regulations, yeah, you're going to get "super EAs." To me, this approach is complete overkill. If anything comes out of this survey, I would hope it would speak to Federal agencies who think they can build a wall of EA documentation to protect themselves from legal action, when they should've either (1) just gone ahead and prepared an EIS, or (2) should've been concise within their EA and devoted attention only to the factors that contribute to significance.
- Consider the possibility it's already been done. Have the writers of this survey actually seen the materials called "Writing the perfect EA/FONSI or EIS"? Who is the arbiter of "best"? Who has the knowledge or power to appoint such an arbiter? And if such an arbiter is self-appointed, where is the recourse? What if it turns out

there is no "best" ..... that multiple solutions actually work ..... at what point will you recognize this enterprise is folly? How will you know it is? Or isn't?

Observations on Responses

A total of 106 respondees addressed Question 23. This was the lowest response rate for all of the 23 questions. The question itself referred to four suggested positive actions. A total of 95 additional suggestions were received and divided into nine groups. The first group above included positive responses on the four suggested positive actions. A number of positive suggestions were noted for CEQ and Federal agencies in general. Additional topical groups included suggestions on training, information dissemination, and coordination within and between Offices of Counsel in Federal agencies. Finally, the last three topical groups included other suggestions, comments on Super EAs, and critiques of this BPPs study.

Bottom Line

If CEQ and Federal agencies decide to proceed with the development of BPPs and guidance for EAs, reviews of the suggestions could be useful in developing an appropriate implementation plan.

APPENDIX F
BACKGROUND INFORMATION ON SCIENTIFIC WRITING

Information used to support development of best practice principles for Scientific Writing and Communication was based primarily on the survey results and pertinent sections of the 1978 CEQ regulations implementing NEPA (40 CFR 1500-1508), augmented by selected federal, state, and non-governmental guidance.

INSIGHTS FROM THE SURVEY RESULTS

Responses to Question 6 (inadequacies in EAs) identified three inadequacies of notable concern to the survey respondents:

- Lack of clear delineation of impact significance received an average rating of 1.52, between first and second on the importance scale and the highest importance rating among all noted inadequacies;
- Minimal information on the scientific basis for stated impacts received an average rating of 1.77, approaching second on the importance scale; and
- Poor writing and editing received an average rating 1.95, approximately second on the importance scale.

Comments in response to Question 6 included two explicit statements under Minimal to No Scientific-Based Writing regarding (1) concise writing, plain language, and overuse of jargon and (2) need to identify preparers. Comments under other headings included six additional statements that contained the following phrases: (1) “[i]nadequate explanation,” (2) “poor description,” (3) “insufficient detail,” (4) “poorly stated,” (5) “not clearly defined or too technical to understand,” and (6) “ability to use a standard format.”

Responses to Question 7 included 73 comments pertaining to principles of scientific writing and communication. A tally of the 73 comments found, on the basis of the analyst’s judgment, 11 recurring features pertaining to scientific writing and communication which respondents identified as typically associated with adequate EAs (Table F.1). In order of frequency of comment occurrence (numbers in parentheses), the 11 features were:

- Clarity of definition and description (28)
- Conciseness and brevity (27)
- Readability, simplicity, and consistency of style (21 responses)
- Evidence-based analysis and conclusions with supporting documentation (11)
- Logical organization (8)
- Graphics and tables – relevance and clarity (8)
- Relevance of subject matter (6)
- Appropriate level of detail and length (5)
- Comprehensiveness and completeness (4)
- Balance and objectivity (2)

- Accuracy (2)

Although the frequency of occurrence of the topics listed above is based on the survey responses, the analyst does not interpret lower-frequency topics (e.g., balance and objectivity, accuracy) as less important than higher-frequency topics (e.g., clarity, conciseness). Rather, the context of survey questions 6 and 7 indicates that higher-frequency topics reflect the respondents' concerns about EA attributes which in their opinion are most in need of improvement and therefore are noted more frequently.

Many comments received in response to questions about other topics were also relevant to scientific writing and communication. For example, in response to Question10, which concerns the selection of pertinent issues and impacts for study within an EA, one respondent stated, "Not only should the issues be clearly stated (i.e., a conflict or situation resulting from the proposal), but the issues statement should be written as a cause-effect relationship. How alternatives are formed in response to issues should also be clearly described." The analyst systematically reviewed the responses to all of the survey questions to identify comments pertinent to scientific writing and communication. Based on the analyst's review, insights relevant to scientific writing and communication touched on in responses to other questions were captured in the 11 topics identified in Table F.1.

GUIDANCE IN THE CEQ REGULATIONS

The 1978 CEQ regulations implementing NEPA (40 CFR 1500-1508) address scientific writing and communication in six places. Section 1500.1, Purpose, speaks to conciseness and clarity, stating that "Environmental impact statements shall be concise, clear, and to the point, and shall be supported by evidence that agencies have made the necessary environmental analyses."

This directive is restated in Section 1502.1, Environmental Impact Statement: Purpose, as follows: "Agencies shall focus on significant environmental issues and alternatives and shall reduce paperwork and the accumulation of extraneous background data. Statements shall be concise, clear, and to the point, and shall be supported by evidence that the agency has made the necessary environmental analyses."

Section 1502.2(c), Implementation, states that "Environmental impact statements shall be kept concise and shall be no longer than absolutely necessary to comply with NEPA and with these regulations. Length should vary first with potential environmental problems and then with project size."

Section 1502.8 explicitly addresses Writing. It states in full that "Environmental impact statements shall be written in plain language and may use appropriate graphics so that decision makers and the public can readily understand them. Agencies should employ writers of clear prose or editors to write, review, or edit statements, which will be

Table F.1. Tally of Question 7 Comments Relating to Principles of Scientific Writing and Communication (App. E herein)

Note: Comments expressing multiple ideas were included more than one time in the tally, as indicated by parentheses.

1. Clarity of definition and description: 28 responses

- Clear
- Clear and concise documentation; organized and well written; easy to read (3)
- Clear
- Clear writing
- Clearly defined purpose and need; clear and concise purpose and need; thorough public engagement program (3)
- Clear writing; comprehensive (2)
- Clearly and concisely written (2)
- Concise and clear; honest description of resources affected; relevant and correct definition of project footprint (3)
- Clear writing
- Clarity and brevity of writing; concise purpose and need; analyzes alternatives (3)
- Clear; focus on important resources/impacts (2)
- Clear, concise writing (2)
- Clear and concise; well written and organized; robust effort to seek public review and comment; good scientific basis for impact conclusions written in plain language (6)
- Clear and concise document (2)
- Clear description of proposed action and purpose/need; clear, concise description of proposed action and affected environment (2)
- Concise; impacts clearly described with magnitude; clear (2)
- Objectivity; clear statement of direct, indirect and cumulative impacts (2)
- Clear writing - customize to project (no boilerplate) and define methodology (2)
- Clear, concise and easily understood (3)
- Clarity of writing
- Good graphics; clear discussion of resources to be affected; clearly describes potential impacts (2)
- Description of the program area for lay reader; adequate analysis of potential impacts (2)
- Resources with little or no impact discussed in too much detail; clearly written and complete; lack of historical potential impact information (4)
- Clearly written
- Clear and concise (2)
- Easy for public to understand: clear, concise writing and appropriate/useful graphics; good summaries/tables/figures; media education [not addressed here]; adequate stakeholder/public involvement; solid documentation to support analysis/conclusions; adequate scoping and description of impacts (6)
- Definitions of jargon; mitigation clear and concise (2)
- Written in a clear, concise and accurate manner (3)

2. Conciseness and brevity: 27 responses

- Defensible; clear, concise writing (2)
- As short as possible
- Succinct; clearly defined and defensible purpose and need; supporting documents (2)
- Brevity
- Clearly defined purpose and need; clear and concise purpose and need; thorough public engagement program (3)
- Clearly and concisely written (2)
- Concise and clear; honest description of resources affected; relevant and correct definition of project footprint (3)
- Clarity and brevity of writing; concise purpose and need; analyzes alternatives (3)

• Good, concise, technical writing
• Written well with graphics that are easily understood; good coordination; clear and concise (3)
• Clear, concise writing (2)
• Clear and concise; well written and organized; robust effort to seek public review and comment; good scientific basis for impact conclusions written in plain language (6)
• Clear and concise document (2)
• Clear description of proposed action and purpose/need; clear, concise description of proposed action and affected environment (2)
• Concise
• Concise
• Concise; impacts clearly described with magnitude; clear (2)
• Clear, concise and easily understood (3)
• Addresses issues only to a "just needed" depth; clear and concise impact analyses; public involvement; public input; clear list of alternatives to proposed project that may still meet the need; real world applicability (5)
• Concise writing; absence of [interpreted as support for] public participation for large-scale EAs ("super EAs"); adequate identification and disposal of issues not warranting detailed analysis (3)
• Clear and concise (2)
• Concise documentation, avoiding elaborating on all laws, etc.
• Easy for public to understand: clear, concise writing and appropriate/useful graphics; good summaries/tables/figures; media education [not addressed here]; adequate stakeholder/public involvement; solid documentation to support analysis/conclusions; adequate scoping and description of impacts (6)
• Definitions of jargon; mitigation clear and concise (2)
• Concise language and minimal extraneous information; cumulative impacts [not addressed here]
• Concise document
• Written in a clear, concise and accurate manner (3)

3. Readability, simplicity, and consistency of style: 21 responses

• Clear reasoning and good writing (2)
• Well written, easy to understand
• Clear and concise documentation; organized and well written; easy to read (3)
• Clear graphics denoting resources; public notification; clear writing (plain language) and organization that facilitates public review and comment (3)
• Well written
• Well written, well organized, w/ analysis focused on actions with the greatest potential for adverse impacts (3)
• Written well with graphics that are easily understood; good coordination; clear and concise (3)
• Clear and concise; well written and organized; robust effort to seek public review and comment; good scientific basis for impact conclusions written in plain language (6)
• Well written and easily understood
• Clear, concise and easily understood (3)
• Well written and organized to the public with supporting documentation (3)
• Good writing goes a long way
• Impact conclusion; well edited (2)
• Good organization and readability; clear indication of resources that are not in concern (3)
• Adequate documentation; well-written (2)
• Well written; use of true analysis to compare alternatives; costing and responsibility for mitigative measures [not addressed in BPP 14] (2)
• Readability, transparency, traceability (3)
• Easy for public to understand: clear, concise writing and appropriate/useful graphics; good summaries/tables/figures; media education [not addressed here]; adequate stakeholder/public involvement; solid documentation to support analysis/conclusions; adequate scoping and description of impacts (6)
• Entire document represents a good summary of the environmental impact analysis, with a focus on

issues of potential for significance to the exclusion of others, and the document is structured to improve readability and reduce length (2)
• Editing consistency so it appears to have one author
• Written at layman's level

4. Evidence-based analysis and conclusions with supporting documentation: 11 responses
• Succinct; clearly defined and defensible purpose and need; supporting documents (2)
• Clear and concise; well written and organized; robust effort to seek public review and comment; good scientific basis for impact conclusions written in plain language (6)
• Well written and organized to the public with supporting documentation (3)
• Description of the program area for lay reader; adequate analysis of potential impacts (2)
• Impact conclusion; well edited (2)
• Adequate documentation; well-written (2)
• Well written; use of true analysis to compare alternatives; costing and responsibility for mitigative measures [not addressed in BPP 14] (2)
• Readability, transparency, traceability (3)
• Easy for public to understand: clear, concise writing and appropriate/useful graphics; good summaries/tables/figures; media education [not addressed here]; adequate stakeholder/public involvement; solid documentation to support analysis/conclusions; adequate scoping and description of impacts (6)
• Conclusions are supported
• Well written documentation; good coordination with public/agencies/client...early input [not addressed here] (2)

5. Logical organization: 8 responses
• Clear and concise documentation; organized and well written; easy to read (3)
• Well organized, well written
• Clear graphics denoting resources; public notification; clear writing (plain language) and organization that facilitates public review and comment (3)
• Well written, well organized, w/ analysis focused on actions with the greatest potential for adverse impacts (3)
• Logically organized (good starting outline)
• Clear and concise; well written and organized; robust effort to seek public review and comment; good scientific basis for impact conclusions written in plain language (6)
• Well written and organized to the public with supporting documentation (3)
• Good organization and readability; clear indication of resources that are not in concern (3)

6. Graphics and tables – relevance and clarity: 8 responses
• Clear graphics denoting resources; public notification; clear writing (plain language) and organization that facilitates public review and comment (3)
• Written well with graphics that are easily understood; good coordination; clear and concise (3)
• Good graphics; clear discussion of resources to be affected; clearly describes potential impacts (2)
• Use of tables, graphs, figures, and maps to present complex information
• Good use of maps and tables to discuss impacts
• Good graphics/ maps
• Easy for public to understand: clear, concise writing and appropriate/useful graphics; good summaries/tables/figures; media education [not addressed here]; adequate stakeholder/public involvement; solid documentation to support analysis/conclusions; adequate scoping and description of impacts (6)
• Illustrative materials (e.g. graphs, tables, maps, photos)

7. Relevance of subject matter: 6 responses
• Clear; focus on important resources/impacts (2)
• Clear writing - customize to project (no boilerplate) and define methodology (2)
• Addresses issues only to a "just needed" depth; clear and concise impact analyses; public involvement;

public input; clear list of alternatives to proposed project that may still meet the need; real world applicability (5)
• Concise writing; absence of [interpreted as support for] public participation for large-scale EAs ("super EAs"); adequate identification and disposal of issues not warranting detailed analysis (3)
• Resources with little or no impact discussed in too much detail; clearly written and complete; lack of historical potential impact information (4)
• Good organization and readability; clear indication of resources that are not in concern (3)

8. Appropriate level of detail and length: 5 responses
• Well written, well organized, w/ analysis focused on actions with the greatest potential for adverse impacts (3)
• Addresses issues only to a "just needed" depth; clear and concise impact analyses; public involvement; public input; clear list of alternatives to proposed project that may still meet the need; real world applicability (5)
• Resources with little or no impact discussed in too much detail; clearly written and complete; lack of historical potential impact information (4)
• Adequate length for the nature of the topic—fifty to one hundred fifty pages is "normal" for EAs that address complex marine resources issues.
• Entire document represents a good summary of the environmental impact analysis, with a focus on issues of potential for significance to the exclusion of others, and the document is structured to improve readability and reduce length (2)

9. Comprehensiveness and completeness: 4 responses
• Comprehension (interpreted as comprehensiveness)
• Clear writing; comprehensive (2)
• Resources with little or no impact discussed in too much detail; clearly written and complete; lack of historical potential impact information (4)
• Complete

10. Balance and objectivity: 2 responses
• Balanced
• Objectivity; clear statement of direct, indirect and cumulative impacts (2)

11. Accuracy: 2 responses
• Concise and clear; honest description of resources affected; relevant and correct definition of project footprint (3)
• Written in a clear, concise and accurate manner (3)

based upon the analysis and supporting data from the natural and social sciences and the environmental design arts."

With respect to EAs specifically, Section 1508.9, Environmental assessment, emphasizes conciseness and brevity. It states in part that an EA "(a) Means a concise public document… which serves to… [b]riefly provide sufficient evidence and analysis for determining whether to prepare an environmental impact statement or a finding of no significant impact" and which "(b) shall include brief discussions…."

Section 1502.10, Recommended format, states in part that "Agencies shall use a format for environmental impact statements which will encourage good analysis and clear presentation of the alternatives including the proposed action." Finally, none of the March 1981 "Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations" explicitly addresses principles of scientific writing and communication in NEPA documents.

OTHER FEDERAL, STATE, AND NON-GOVERNMENTAL GUIDANCE

A substantial body of additional guidance on clear technical writing is publicly available, including guidance for NEPA practitioners. Because a comprehensive review is beyond the scope of this summary, three prominent examples are discussed here: the *Federal Plain Language Guidelines* (PLAIN 2011) pursuant to the Plain Writing Act of 2010; the Washington State Department of Transportation (WSDOT) *Reader-Friendly Document Tool Kit and Appendices* (WSDOT 2008); and the May 2006 report prepared by the American Association of State Highway and Transportation Officials (AASHTO) and the American Council of Engineering Companies (ACEC) in association with the Federal Highway Administration (FHWA) titled *Improving the Quality of Environmental Documents* (AASHTO/ACEC 2006). The AASHTO/ACEC report is included not only because of its widely recognized excellence and pertinence to scientific writing and communication, but because its recommendations are based in part on the results of a comprehensive survey of the NEPA practitioner community conducted jointly by AASHTO and ACEC in 2003-2004, providing a comparative context to our 2012 NAEP survey.

FEDERAL PLAIN LANGUAGE GUIDELINES (PLAIN 2011)

The Plain Writing Act of 2010 (Public Law 111-274) is a brief law which in Section 4(b) requires federal agencies to "use plain writing in every covered document of the agency that the agency issues or substantially revises." Section 3(3) defines plain writing as "writing that is clear, concise, well-organized, and follows other best practices appropriate to the subject or field and intended audience." As required by Section 4(c)(1) of the Act, the White House Office of Management and Budget issued guidance to federal agencies on April 13, 2011. Included in that guidance was the official designation of a previously unofficial interagency working group called the Plain Language Action and Information Network (PLAIN). In 2011, PLAIN issued a

comprehensive guidance document, the *Federal Plain Language Guidelines* (PLAIN 2011), which presented recommendations within five functional topics:

- Identifying and writing for the appropriate audience,
- Organizing the document effectively,
- Writing the document,
- Designing the document for easy website access and use, and
- Early testing with the target audience before issuing the document.

The *Federal Plain Language Guidelines* provide many recommendations relevant to improving the effectiveness of NEPA EAs. For example, organizing the EA from its inception (pp. 6-9) helps to avoid costly revisions, and early testing (pp. 100-112) of draft language with target audiences can be accomplished through public meetings with stakeholder groups such as neighborhood associations and through informal preview sessions with agency representatives.

THE WSDOT READER-FRIENDLY DOCUMENT TOOL KIT AND APPENDICES (WSDOT 2008)

WSDOT (2008) encourages preparers of NEPA and Washington State Environmental Protection Act (SEPA) documents to follow its *Reader-Friendly Document Tool Kit,* including the *Appendices*. In its guidance, WSDOT references and builds on the AASHTO/ACEC (2006) report, the Federal Plain Language Action Network, Washington Governor Gregoire's 2005 Executive Order 05-03 on Plain Talk, and Washington state regulatory requirements for SEPA documents [WAC 197-11-400(3)]. The WSDOT guidance is a comprehensive assemblage of recommendations and examples based on four overarching principles (p. 2-4):

- Tell a story,
- Engage the reader,
- Make it visual, and
- Make it brief.

Each of these themes is developed in detail with abundant guidance and examples augmented by appendices which include templates for text, tables, and graphics. For example, to tell a story, the Tool Kit provides tips and examples organized around these four concepts (p. 2-7):

- "Organize your document and develop an outline.
- Explain the problem and why people should care.
- Write clearly and use simple language.
- Highlight benefits associated with your project."

An aspect of the WSDOT guidance particularly relevant to EA best practice principles is its recognition that different approaches may apply to NEPA documents prepared for small, medium-size, and large projects (p. 3-3):

"Reader-friendly concepts can be used to develop documents for small, medium, and large WSDOT projects. This tool kit is a good example of a reader-friendly document developed on a small budget and tight timeline. Notice the techniques used throughout this document to engage the reader:

- This document makes limited use of graphics, though they are provided where needed.
- Graphics are integrated with the text.
- The document is written using question-and-answer headings.
- Sidebars are used to highlight key concepts.
- Footnotes are used where they are helpful.
- Examples are provided in an appendix, and other technical resources are referenced.
- The writing is clear and easy to read."

The Tool Kit (p. 3-3) notes further that "For large and complex projects, there are additional opportunities to apply reader-friendly concepts, especially as they relate to graphic design and document layout."

IMPROVING THE QUALITY OF ENVIRONMENTAL DOCUMENTS (AASHTO/ACEC 2006)

The Introduction to the AASHTO/ACEC (2006) report explains (p. 1) that "In 2003 and 2004, an AASHTO, ACEC, and FHWA work group conducted a survey of state Departments of Transportation (DOTs), the engineering consultant community, and the FHWA to assess the current quality of NEPA documents and inform its future activities." In summary, "AASHTO and ACEC survey respondents identified a range of problems related to writing quality and format of NEPA documents:

- Too large, wordy, repetitive, complex, and cumbersome
- Lack of consistency in format, approach
- Lack of a coherent story with a logical progression
- Too much focus on legal "air-tight" document versus writing for the public
- Too much focus on "the look" of the document vs. usability for decisions
- Lack of communication among multiple authors."

On the basis of these and other findings, the AASHTO/ACEC/FHWA work group reached consensus on the following three "core principles" as the basis for quality NEPA documents (p. 4):

"Principle 1: Tell the story of the project so that the reader can easily understand the purpose and need for the project, how each alternative would meet the project goals, and the strengths and weaknesses associated with each alternative.

Principle 2: Keep the document as brief as possible, using clear, concise

writing; an easy-to-use format; effective graphics and visual elements; and discussion of issues and impacts in proportion to their significance.

Principle 3: Ensure that the document meets all legal requirements in a way that is easy to follow for regulators and technical reviewers."

CONCLUSIONS

The 2012 questionnaire survey identified 11 broad topics regarding scientific writing and communication in EAs (Table F.1). The survey results provide insight into the concerns and values of public and private sector NEPA practitioners which can guide the development of best practice principles for scientific writing and communication. In addition, the 1978 CEQ regulations implementing NEPA (40 CFR 1500-1508) address scientific writing and communication in six places, emphasizing conciseness and brevity, clarity, relevance of topics, and use of supporting evidence.

Three prominent guidance documents – the *Federal Plain Language Guidelines* (PLAIN 2011), the WSDOT *Reader-Friendly Document Tool Kit* and *Appendices* (WSDOT 2008), and *Improving the Quality of Environmental Documents* (AASHTO/ACEC 2006) – all cover, in various ways, the 11 topics identified by the 2012 NAEP survey respondents (Table F.1). The main reason for reviewing the three guidance documents, however, was to see if they identified additional topics which could contribute to best practice principles for scientific writing and communication. Here are the key additional features, beyond those in Table F.1, which the analyst found to be recommended by one or more of the three guidance documents:

- Tell a story (AASHTO/ACEC 2006, WSDOT 2008, PLAIN 2011).
- Identify and write for the appropriate audience or readership (AASHTO/ACEC 2006, WSDOT 2008, PLAIN 2011).
- Before starting the document, understand its requirements for legal sufficiency and how to meet them in a simple, direct way (AASHTO/ACEC 2006, WSDOT 2008, PLAIN 2011).
- Consider alternative formats for different audiences and for different parts of the document package (AASHTO/ACEC 2006, WSDOT 2008).
- Test an early draft version the document, or a portion of the document, with a cross-section of intended readers to see how they would improve its clarity and readability (PLAIN 2011).
- Design the document for easy website access and use (PLAIN 2011).

The BPP 14 information in Section 5 recommends BPPs for scientific writing and communication. The principles are based on the 11 topics identified by the 2012 NAEP survey respondents and the six additional topics and three sources listed above. The survey results and reviews showed that excellence in scientific writing and communication involves two dimensions: not only how the document is written but also how the project is managed. The best practice principles address both dimensions.

Each principle is written as a single sentence on which a best practice procedure can be based, tailored to the user's particular agency or project.

APPENDIX G
REVIEW OF ENVIRONMENTAL ASSESSMENT REGULATIONS AND GUIDANCE IN SELECTED AGENCIES

The purpose of this Appendix is to describe the Council on Environmental Quality's (CEQ) EA regulation and six federal agencies' guidance on EAs. The agencies are:

1. Department of the Army
2. Department of Agriculture, Forest Service
3. Department of Energy
4. Department of Transportation, Federal Highway Administration
5. Department of Interior
6. Department of Interior, Bureau of Land Management

- **CEQ Regulation (40 CFR Parts 1500 – 1508) on EA's**

The following is CEQ's regulatory guidance concerning EA's:

Sec. 1508.9 Environmental assessment.
"Environmental assessment":
(a) Means a concise public document for which a Federal agency is responsible that serves to:

1. *Briefly provide sufficient evidence and analysis for determining whether to prepare an environmental impact statement or a finding of no significant impact.*
2. *Aid an agency's compliance with the Act when no environmental impact statement is necessary.*
3. *Facilitate preparation of a statement when one is necessary.*

(b) Shall include brief discussions of the need for the proposal, of alternatives as required by section 102(2)(E), of the environmental impacts of the proposed action and alternatives, and a listing of agencies and persons consulted.

- **Department of the Army (DA)**

DA's EA procedures are specified in 32 CFR 651.20 (7-1-06 Edition) and Subpart E, 651.32 through 651.39. The discussion in Section 651.20 tracks closely with 40 CFR 1508.9 (above), whereby an EA is defined along with its purposes and format. In addition, DA states "*An EA is substantially less rigorous and costly than an EIS, but requires sufficient detail to identify and ascertain the significance of expected impacts associated with the proposed action and its alternatives.*" DA also says that, "*The EA can often provide the required 'hard look' at the potential environmental effects of an action, program or policy within 1 to 25 pages, depending on the nature of the action and project-specific conditions.*"

At Section 651.24, DA discusses supplemental EAs and EISs, stating that, "*If conditions warrant a supplemental document, these documents are processed in the same way as an original EA or EIS.*" "*If the review indicates no need for a supplement, that determination will be documented in a REC.*" [Record of Environmental Consideration]

Subpart E, Environmental Assessment is extensive in its guidance. Section 651.32 lists five criteria listed for determining when an EA will be prepared and a 1 to 25 page limit is reiterated. Section 651.33 lists 19 actions normally requiring an EA. Section 651.34 lists nine EA components, which is more inclusive than the language in 40 CFR 1508.9(b). Sections 651.35 and 651.36 discuss in detail Decision Process and Public Involvement, respectively. Section 651.37 discusses Public Availability while Sections 651.38 and 651.39 discuss Existing Environmental Assessments and Significance, respectively.

- **Department of Agriculture, U.S. Forest Service (FS)**

FS EA procedures are specified in 36 CFR Part 220 (7-1-11 Edition), specifically in Section 220.7.

This guidance begins by referring the reader to Section 220.4(a), which has four subparts that act as a screening device for when NEPA is triggered. The guidance then states, "*An EA may be prepared in any format useful to facilitate planning, decisionmaking, and public disclosure as long as the requirements of paragraph (b) of this section are met.*" Paragraph (b) states that an EA must contain the following: (1) need for the proposal or project and (2) the proposed action and alternatives that meet the need for the action. No specific number of alternatives is required or prescribed. In addition, the guidance states that "*When there are no unresolved conflicts concerning alternative uses of available resources (NEPA, section 102(2)(E)), the EA need only analyze the proposed action and proceed without consideration of additional alternatives.*"

Furthermore, this section states that an EA *may* document consideration of a no-action alternative, may include descriptions of modifications and incremental design features, may include adaptive management, may discuss direct, indirect, and cumulative impacts, and may incorporate by reference other information.

Additionally, these procedures state that an EA *shall* comply with 40 CFR 1508.9, shall disclose the impacts of adaptive management adjustments, and shall describe the impacts of the proposed action and any alternatives in terms of "significantly" as per the CEQ regulation 40 CFR 1508.27.

If the EA supports a Finding of No Significant Impact, than a separate decision notice must be prepared. This notice has twelve parts including the responsible official's signature and date signed.

- **Department of Energy (DOE)**

DOE EA procedures are specified in 10 CFR Part 1021 (1-1-12 Edition), specifically in Section 1021.321.

The first DOE guidance concerning EAs states " *As required by 40 CFR 1501.4(b), DOE shall prepare an EA for a proposed DOE action that is described in the classes of actions listed in appendix C to subpart D of this part, and for a proposed DOE action that is not described in any of the classes of actions listed in appendices A, B, or D to subpart D, except that an EA is not required if DOE has decided to prepare an EIS.*"

DOE EAs *shall* serve the purposes identified in 40 CFR 1508.9(a) (above). If appropriate, a DOE EA *shall* also include any floodplain/wetlands assessment prepared under 10 CFR 1022 and *may* include analyses needed for other environmental determinations. DOE EAs shall comply with 40 CFR 1508.9 (above) in terms of content. In addition to other alternatives, DOE *shall* assess the no action alternative in an EA, even when the proposed action is specifically required by legislation or court order.

Appendix C to subpart D of Part 1021 lists 13 classes of actions that normally require EAs but not necessarily EISs. For example, Upgrading, Rebuilding, or Construction of Powerlines; Vegetation Management Program; and Particle Acceleration Facilities are part of the list.

- **Department of Transportation, Federal Highway Administration (FHA)**

FHA EA procedures are specified in 23 CFR Part 771 (e-CFR August 13, 2012), specifically in Section 771.119.

FHA's EA regulatory guidance is general in nature and discusses in broad terms applicant consultation and coordination with FHA. EAs are subject to FHA approval before they are made available to the public. EAs need not be circulated for comment but the document must be made available for public inspection. EA notice of availability shall be sent to affected units of Federal, State, and local government. Notice shall also be sent to State intergovernmental review contacts under Executive Order 12372.

When a public hearing is held as part of an application for Federal funds, the EA shall be available at the public hearing and for a minimum of 15 days in advance of the hearing. Comments shall be submitted in writing to the applicant or the FHA within 30 days of EA availability unless FHA determines that a different period is warranted.

When the FHA expects to issue a FONSI for an action described in Section 771.115(a) [EIS], copies of the EA shall be made available for public review for a minimum of 30 days before the FHA makes its final decision.

If the FHA decides to apply 23 USC 139 [Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users, Pub.L. 109-59, 119 Stat. 1144, codified as 23 USC §139(l)] to an action involving an EA, then the EA shall be prepared in accordance with the applicable provisions of that statute.

- **Department of Interior (DOI)**

DOI EA procedures are specified in 43 CFR Part 46 (October 2008), specifically in subpart D, Section 46.300 to 46.325. There are six parts to the guidance covering the following subjects:

- Purpose of an EA (46.300)
- Public Involvement in the EA process (46.305)
- Contents of an EA (46.310)
- Format of an EA (46.315)
- Adopting another agency's EA (46.320)
- Concluding the EA process (46.325)

The DOI EA regulations state that purpose of an environmental assessment is to allow the Responsible Official to determine whether to prepare an environmental impact statement or a finding of no significant impact.

Furthermore, bureaus *must* ensure that an environmental assessment is prepared for all proposed Federal actions, except those:

(1) That are covered by a categorical exclusion;
(2) That are covered sufficiently by an earlier environmental document as determined and documented by the Responsible Official; or
(3) For which a bureau has already decided to prepare an environmental impact statement.

(b) A bureau *may* prepare an environmental assessment for any proposed action at any time to:
(1) Assist in planning and decision-making;
(2) Further the purposes of NEPA when no environmental impact statement is necessary; or
(3) Facilitate environmental impact statement preparation.

The bureaus *must*, to the extent practicable, provide for public notification and public involvement when an environmental assessment is being prepared. However, the methods for providing public notification and opportunities for public involvement are at the *discretion of the Responsible Official*. Although scoping is not required, bureaus *may* apply a scoping process to an environmental assessment. Publication of a ''draft'' environmental assessment is *not* required. Bureaus *must* notify the public of the availability of an environmental assessment and any associated finding of no significant impact once they have been completed.

At a minimum, an EA *must* include brief discussions of: The proposal; the need for the proposal; the environmental impacts of the proposed action; the environmental impacts of the alternatives considered; and a list of agencies and persons consulted.

When the Responsible Official determines that there are no unresolved conflicts about the proposed action with respect to alternative uses of available resources, the EA need only consider the proposed action and does not need to consider additional alternatives, including the no action alternative in accordance with section 102(2)(E) of NEPA.

However, an EA *may* describe a broader range of alternatives to facilitate planning and decision-making. A proposed action or alternative(s) *may* include adaptive management strategies allowing for adjustment of the action during implementation. If the adjustments to an action are clearly articulated and pre-specified in the description of the alternative and fully analyzed, then the action *may* be adjusted during implementation without the need for further analysis.

The level of detail and depth of impact analysis should normally be limited to the minimum needed to determine whether there would be significant environmental effects. However, an environmental assessment *must* contain objective analyses that support conclusions concerning environmental impacts.

An environmental assessment *may* be prepared in any format useful to facilitate planning, decision-making, and appropriate public participation. An EA *may* be accompanied by any other planning or decision-making document. The portion of the document that analyzes the environmental impacts of the proposal and alternatives *must* be clearly and separately identified and not spread throughout or interwoven into other sections of the document.

Upon review of the EA by the Responsible Official, the environmental assessment process concludes with one of the following: A notice of intent to prepare an EIS; a FONSI; or a result that no further action is taken on the proposal.

- **Department of Interior, Bureau of Land Management (BLM)**

BLM's EA procedures are specified in the BLM *National Environmental Policy Act Handbook* (Public), H-1790-1, January 30, 2008, Rel. 1-1710. Chapter 8 specifically deals with Preparing an Environmental Assessment. There are six parts to the guidance covering the following subjects:

- Preparing to write an EA
- Public involvement
- EA format
- Determination of significance
- The decision record

- Implementation

The information in Chapter 8 builds on the foundation laid in Chapter 6 and provides specific direction and guidance for preparing an EA.

You may reduce the length of the EA by thoughtful crafting of the purpose and need for action; developing a proposed action that specifically addresses the purpose and need; and maintaining focus on the relevant issues. Consistent focus on the issues associated with the proposed action will help you identify reasonable alternatives and potential effects. Other streamlining techniques include the use of tiering and incorporation by reference (see section 5.2, Incorporation by Reference and Tiering).

A longer EA may be appropriate when a proposal is so complex that a concise document cannot meet the goals of 40 CFR 1508.9 or when it is extremely difficult to determine whether the proposal could have significant environmental effects. Carefully consider complex proposals and the criteria for when an EIS may be appropriate (see Chapter 7, Determining Whether an EA or an EIS is Appropriate), rather than proceeding with a lengthy EA just to avoid the EIS process.

You must have some form of public involvement in the preparation of all EAs. The CEQ regulations do not require agencies to make EAs available for public comment and review. In certain limited circumstances, agencies are required to make FONSIs available for public review (40 CFR 1501.4(e)(2) (see section 8.4.2, The Finding of No Significant Impact (FONSI)). The CEQ regulations direct agencies to encourage and facilitate public involvement in the NEPA process to the fullest extent possible (40 CFR 1500.2(d), 40 CFR 1506.6). This means that while some public involvement is required in the preparation of an EA, you have the discretion to determine how much, and what kind of involvement works best for each individual EA. For preparation of an EA, public involvement may include any of the following: external scoping, public notification before or during preparation of an EA, public meetings, or public review and comment of the completed EA and unsigned FONSI. The type of public involvement is at the discretion of the decision-maker. When you need to prepare many EAs for similar projects in a short timeframe, it may be helpful to prepare a programmatic EA to cover those projects and to facilitate focused public involvement.

Section 8.3, EA Format is the longest and most detailed part of Chapter 8. It contains the following subsections:

- Introduction (8.3.1)
- Purpose and Need for Action and Decision to be Made (8.3.2)
- Scoping and Issues (8.3.3)
- Proposed Action and Alternatives (8.3.4)
    - Description of the Proposed Action (8.3.4.1)
    - Alternatives in an EA (8.3.4.2)
        - Alternatives Considered but Eliminated from Detailed Analysis (8.3.4.2.1)

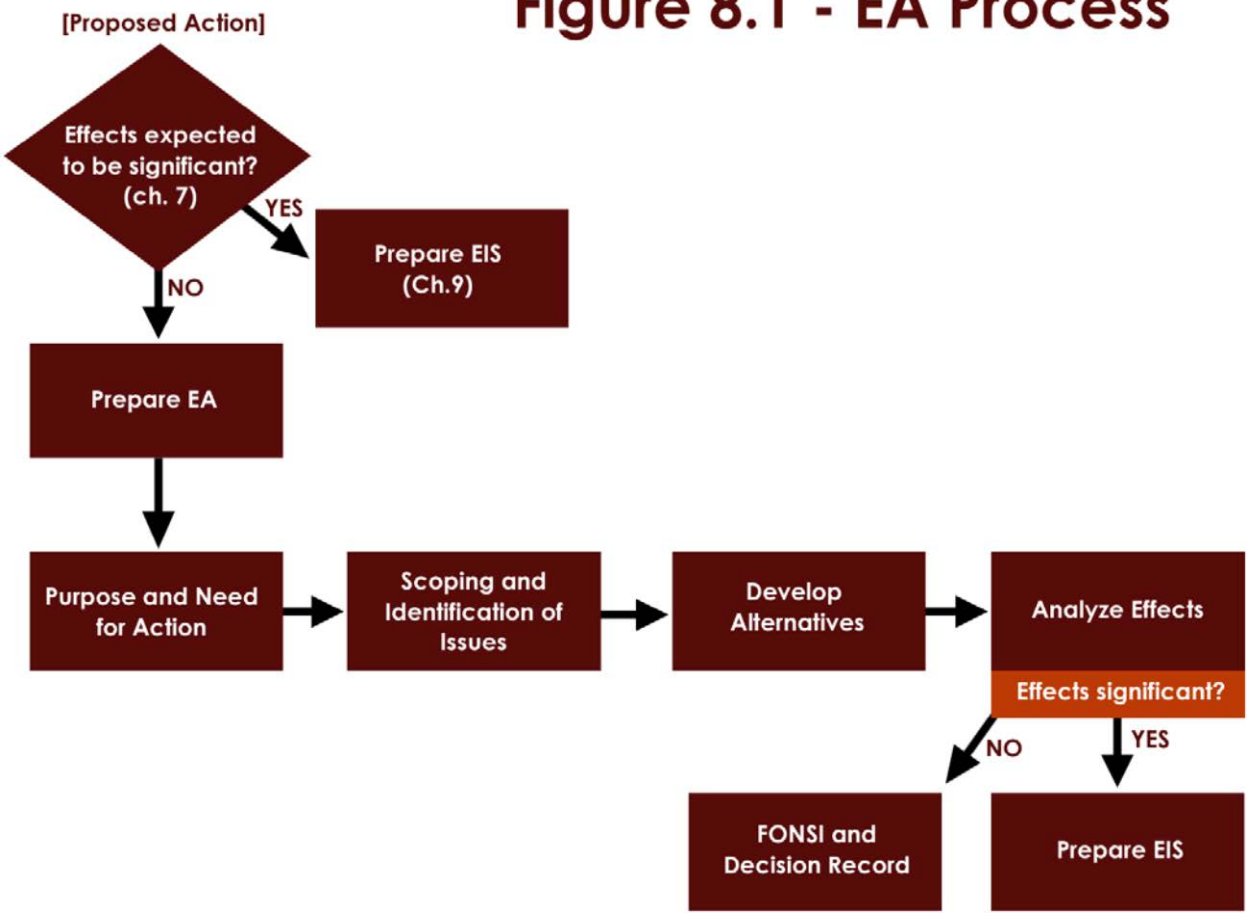
    - Conformance with the land use plan (8.3.4.3)
- Affected Environment (8.3.5)
- Environmental Effects (8.3.6)
- Tribes, Individuals, Organizations, or Agencies Consulted (8.3.7)
- List of Preparers (8.3.8)

When you terminate the EA process prior to completion, complete your administrative record, documenting the reason or reasons for aborting the process. If you have given public notice of the EA process, inform interested persons and parties that you are terminating the EA process.

A decision may not be implemented until the FONSI and DR [decision record] have been signed and all other program-specific procedural requirements have been met (such as applicable protest and appeals procedures). Implementation of the action, including any mitigation and monitoring measures adopted in the decision record, must be in accordance with the decision described in the DR. Program-specific guidance regarding protest and appeal provisions and timing of implementation relative to public notification can be found in the Web Guide.

See Figure 8.1 below for BLM's EA Process.

Figure 8.1 - EA Process



- **Conclusions**

"Since NEPA was passed, the role of the EA has evolved to the point where it is the predominant way agencies conduct NEPA analyses. Conceived as a brief analysis to determine the significance of environmental effects, the EA today increasingly includes mitigation measures that reduce adverse effects below significant levels. With the increased use of EAs, often to the overall benefit of the environment, comes the danger that public involvement will be diminished and that individually minor actions will have major adverse cumulative effects. Therefore, as agencies rely more heavily on EAs, agencies need to ensure that they forge true partnerships with other agencies and the surrounding communities. Only then will stakeholders trust that EAs are honestly serving to protect the environment."[21]

"Since the CEQ regulations were promulgated in 1978, all signs point to a significant increase in EAs and a decrease in EISs. The annual number of draft, revised, supplemental, and final EISs prepared has declined from approximately 2,000 in 1973 to 608 in 1995, averaging 508 annually between 1990-1995. By 1993, a CEQ survey of federal agencies estimated that about 50,000 EAs were being prepared annually. That survey also found that five federal agencies — the U.S. Forest Service, the Bureau of Land Management, the Department of Housing and Urban Development, the U.S. Army Corps of Engineers, and the Federal Highway Administration — produce more than 80% of the EAs. While some agencies — such as the Department of Energy, Department of the Army, and U.S. Forest Service — provide for a public comment period on EAs, many do not."[22]

An EA is a "concise public document" for which a federal agency is responsible that serves make a significance threshold determination. An EA, in accordance with 40 CFR 1508.9(b), "shall include brief discussions of the need for the proposal, of alternatives as required by NEPA section 102(2)(E), of the environmental impacts of the proposed action and alternatives, and a listing of agencies and persons consulted."

The following matrix is a comparison of the how the six agencies' EA procedures comply with the 40 CFR 1508.9 requirements.

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[21] Council on Environmental Quality, Executive Office of the President, *The National Environmental Policy Act, A Study of Its Effectiveness After Twenty-five Years*, January 1997, p. 19.

[22] *Ibid.*

	DA	FS	DOE	FHA	DOI	BLM
1508.9(b):						
Need	Yes	Yes	Yes	Yes	Yes	Yes
Alternatives	Yes	Yes	Yes	Yes	Yes	Yes
Impacts	Yes	Yes	Yes	Yes	Yes	Yes
Consultations	Yes	Yes	Yes	No	Yes	Yes

The 15 BPPs for EAs set forth in Section 5 of this report clarify what an EA must include beyond the sparse guidance contained in 40 CFR 1508.9, and to what degree.