## **REVIEW PLAN**

Manatee County, Florida, at Anna Maria Island, Hurricane and Storm Damage Reduction Project Limited Reevaluation Report and Environmental Assessment

Jacksonville District

P2: 125429

MSC Approval Date: December 14, 2012 Last Revision Date: None



#### **REVIEW PLAN**

#### Manatee County, Florida, at Anna Maria Island, Hurricane and Storm Damage Reduction Project – Limited Reevaluation Report and Environmental Assessment

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#### 1. PURPOSE AND REQUIREMENTS

**a. Purpose.** This Review Plan defines the scope and level of peer review for the (single purpose) Manatee County, Florida, at Anna Maria Island, Hurricane and Storm Damage Reduction Project - Limited Reevaluation Report (LRR) and Environmental Assessment (EA).

#### b. References

- (1) Engineering Circular (EC) 1165-2-209, Civil Works Review Policy, 31 Jan 2010
- (2) EC 1105-2-412, Assuring Quality of Planning Models, 31 Mar 2011
- (3) Engineering Regulation (ER) 1110-1-12, Quality Management, 21 Jul 2006
- (4) ER 1105-2-100, Planning Guidance Notebook, Appendix H, Policy Compliance Review and Approval of Decision Documents, Amendment #1, 20 Nov 2007
- (5) Memo, CECW-SAD, Subject: Martin County, FL, draft Limited Reevaluation Report (LRR): Request for exclusion from Type I Independent External Peer Review (IEPR), 15 Feb 2011
- c. **Requirements.** This review plan was developed in accordance with EC 1165-2-209, which establishes an accountable, comprehensive, life-cycle review strategy for Civil Works products by providing a seamless process for review of all Civil Works projects from initial planning through design, construction, and operation, maintenance, repair, replacement and rehabilitation (OMRR&R). The EC outlines four general levels of review: District Quality Control/Quality Assurance (DQC), Agency Technical Review (ATR), Independent External Peer Review (IEPR), and Policy and Legal Compliance Review. In addition to these levels of review, decision documents are subject to cost engineering review and certification (per EC 1165-2-209) and planning model certification/approval (per EC 1105-2-412).

#### 2. REVIEW MANAGEMENT ORGANIZATION (RMO) COORDINATION

The RMO is responsible for managing the overall peer review effort described in this Review Plan. The RMO for decision documents is typically either a Planning Center of Expertise (PCX) or the Risk Management Center (RMC), depending on the primary purpose of the decision document. The RMO for the peer review effort described in this Review Plan is the Coastal Storm Damage Reduction National Planning Center of Expertise (PCX-CSDR).

The RMO will coordinate with the Cost Engineering Directory of Expertise (DX) to ensure the appropriate expertise is included on the review teams to assess the adequacy of cost estimates, construction schedules and contingencies.

#### 3. STUDY INFORMATION

**Decision Document.** The decision document is the Manatee County, Florida, at Anna Maria Island, Hurricane and Storm Damage Reduction Project – Limited Reevaluation Report and Environmental Assessment. The LRR purpose is to verify the economics of a second

renourishment for the HSDR project. The LRR is to be approved at the MSC level, and Congressional Authorization is not required. An EA is the NEPA documentation being prepared along with the document. The LRR will also support a new Project Partnership Agreement (PPA) for implementation of the next renourishment by the non-Federal sponsor under Section 206 of WRDA 1992.

**a. Study/Project Description.** Manatee County, the Local Sponsor intends to pursue a second periodic renourishment of the shore protection project under Section 206 of WRDA 1992. The Sponsor is not planning to modify the authorized project with possible exception of minor adjustments to the advanced nourishment to accommodate observed site-specific erosion variations and potentially expanding the extent of the authorized borrow area. A new Project Partnership Agreement (PPA) will be established for the renourishment. The authorized project extends from Florida Department of Environmental Protection Beach monument R-012 through R-036, on Anna Maria Island.

The Manatee County Shore Protection Project, a single-purpose project, was authorized by the Flood Control Act of 1965, as amended by WRDA 1976 and Section 206 of WRDA 1992. Initial construction was completed by the U.S. Army Corps of Engineers, Jacksonville District in 1993 and the first periodic renourishment was completed by the sponsor under Section 206 authority in 2002. The sponsor was later reimbursed the Federal share of the renourishment cost. A one-time PPA was created for the 2002 renourishment.

- **b.** Factors Affecting the Scope and Level of Review. This section discusses the factors affecting the risk informed decisions on the appropriate scope and level of review. The discussion is intended to be detailed enough to assess the level and focus of review and support the PDT, PCX, and vertical team decisions on the appropriate level of review and types of expertise represented on the various review teams. Factors affecting the risk informed decisions on the appropriate scope and level of review include the following:
  - <u>If parts of the study will likely be challenging (with some discussion as to why or why not</u> <u>and, if so, in what ways – consider technical, institutional, and social challenges, etc.);</u> There are no challenging aspects of this study. This project has been successfully constructed, has undergone periodic nourishment, and has provided significant hurricane and storm damage reduction benefits to Manatee County and the Nation. Essentially, the project remains the same as the authorized project. The beach nourishment construction template is not expected to change, significantly. The purpose of the LRR is to demonstrate that the project remains economically justified.
  - <u>A preliminary assessment of where the project risks are likely to occur and what the</u> magnitude of those risks might be (e.g., what are the uncertainties and how might they affect the success of the project);

There are no known additional risks associated with the renourishment. Essentially, the project remains the same as the authorized project. The beach nourishment construction template is not expected to change, significantly. Uncertainties in the construction cost estimates will be captured during development of the estimate.

- <u>If the project is likely to have significant economic, environmental, and/or social effects</u> to the Nation (with some discussion as to why or why not and, if so, in what ways); The project is not likely to have significant negative economic, environmental, or social effects to the Nation, and no additional effects are anticipated to result from the proposed renourishment. The project performance and benefits will be maintained just as they have been since initial construction.
- If the project likely involves significant threat to human life/safety assurance (with some discussion as to why or why not and, if so, in what ways consider at minimum the safety assurance factors described in EC 1165-2-209 including, but not necessarily limited to, the consequences of non-performance on project economics, the environmental and social well-being [public safety and social justice; residual risk; uncertainty due to climate variability, etc.;

The project modifications proposed in the LRR will not present a significant threat to human life/safety.

- If the project/study is likely to have significant interagency interest (with some discussion as to why or why not and, if so, in what ways); The proposed renourishment is not expected to have significant interagency issues.
- If the project/study will be highly controversial (with some discussion as to why or why not and, if so, in what ways);

The project and this study are not highly controversial. The project has been in place, successfully, since its initial construction in 1993. Potential use of an expanded borrow area is not anticipated to cause any controversy.

• If the project report is likely to contain influential scientific information or be a highly influential scientific assessment (with some discussion as to why or why not and, if so, in what ways);

The project report does not contain influential scientific information and is not a highly influential scientific assessment. The project report is to show that the project economics remain justified.

• If the information in the decision document or proposed project design will likely be based on novel methods, involve the use of innovative materials or techniques, present complex challenges for interpretation, contain precedent-setting methods or models, or present conclusions that are likely to change prevailing practices (with some discussion as to why or why not and, if so, in what ways);

The information in the decision document and proposed project design are not based on novel methods, do not use innovative materials or techniques do not present complex challenges ,are not precedent setting, and are not likely to change prevailing practices. The anticipated dredging techniques are the same as those used commonly in other constructed beach fill projects and have been successfully used on the previous renourishments of this project. The construction methods and equipment used for beach placement will be the same as those used on this project in the past. The construction template is not anticipated to change the design profile on which project benefits are based.

• If the proposed project design will require redundancy, resiliency, and/or robustness (with some discussion as to why or why not and, if so, in what ways – see EC 1165-2-209, Appendix E, Paragraph 2 for more information about redundancy, resiliency, and robustness); and

The proposed project re-nourishment design does not require redundancy, resilience, or robustness. Beach fill projects for HSDR purposes such as this one are redundant in that periodic nourishments are included as part of the project plan when the beach becomes in need of sand to increase reliability. The project is resilient in that beach naturally recovers to some extent after storms, and emergency nourishment may be implemented to restore projects should a natural disaster adversely impact the project. Beach nourishment projects such as this one are robust because by adding sand to the natural system, damages are reduced in a way that allows the naturally dynamic beach to adjust to the ever- changing coastal environment.

• If the proposed project has unique construction sequencing or a reduced or overlapping design construction schedule (with some discussion as to why or why not and, if so, in what ways).

The construction sequencing for this project is unique only in that construction must be completed, including mobilization and demobilization, between November 1<sup>st</sup> and May 1<sup>st</sup> due to turtle nesting. This type of construction sequencing is common in the South Florida region and has been successfully accomplished in the past.

**c. In-Kind Contributions.** Products and analyses provided by non-Federal sponsors as in-kind services are subject to DQC, ATR and, if applicable, IEPR. The report will be prepared by the sponsor, with assistance and DQC of the Jacksonville District.

#### 4. DISTRICT QUALITY CONTROL (DQC)

All decision documents (including supporting data, analyses, environmental compliance documents, etc.) shall undergo DQC. As the non-federal sponsor is preparing the LRR and EA, the District PDT is independent of the report preparation and can reasonably fulfill the role of DQC. DQC is an internal review process of basic science and engineering work products focused on fulfilling the project quality requirements defined in the Project Management Plan (PMP). The home district shall manage DQC. Documentation of DQC activities is required and will be in accordance with the Quality Manual of the District.

**Documentation of DQC.** DQC will be conducted at the PDT level where each of the team members reviews the documents for accuracy. The document will also reviewed by the SAJ Chief of Coastal/Navigation Planning Section. A DQC quality checks review of the draft and final documents will be conducted by SAJ personnel using personnel from the disciplines of planning/economics, environmental, and engineering who did not perform the original work (EC 1165-2-209, ¶ 8(b)(1)). Documentation may be via DrChecks, MFR or other written documentation and kept in the project file.

#### 5. AGENCY TECHNICAL REVIEW (ATR)

ATR is mandatory for all decision documents (including supporting data, analyses, environmental compliance documents, etc.). The objective of ATR is to ensure consistency with established criteria, guidance, procedures, and policy. The ATR will assess whether the analyses presented are technically correct and comply with published USACE guidance, and that the document explains the analyses and results in a sufficiently clear manner for the public and decision makers. ATR is managed within USACE by the designated RMO and is conducted by a qualified team from outside the home district that is not involved in the day-to-day production of the project/product. ATR teams will be comprised of senior USACE personnel and may be supplemented by outside experts as appropriate. The ATR team lead will be from outside the home MSC.

#### a. Products to Undergo ATR.

At a minimum, ATR of the Draft and Final versions of the LRR and EA will conducted.

**b. Required ATR Team Expertise.** The ATR team composition will be determined by the National Coastal Storm Damage Reduction Planning Center of Expertise (CSDRPCX). The PCX will also acquire cost estimation review by the Cost Dx.

The disciplines listed below were determined to be appropriate for review of the report. All will be well-versed in conduct of coastal storm damage reduction studies. A listing of recommended ATR Team expertise follows.

ATR Team	Expertise Required	
Members/Disciplines		
ATR Lead	The ATR lead will be a senior professional with extensive	
	experience in preparing Civil Works decision documents and	
	conducting ATR. The lead will also have the necessary	
	skills and experience to lead a virtual team through the ATR	
	process. Typically, the ATR lead will also serve as a	
	reviewer for a specific discipline (such as planning,	
	economics, environmental resources, etc).	
Plan Formulation	The plan formulation reviewer will be a senior water	
	resources planner with experience in coastal storm damage	
	reduction projects.	
Economics	The economics reviewer will be a senior water resources	
	economist with experience in coastal storm damage	
	reduction projects.	
Environmental/Cultural	The environmental reviewer will be a senior environmental	
	resources specialist with experience in coastal storm damage	
	reduction projects, and will have knowledge of any	
	cultural/archeological issues, if any, that must be considered.	
Coastal Engineering	The coastal engineering reviewer will be a Registered	
	Professional/5 years of experience in coastal storm damage	

	reduction projects.
Geotechnical Engineering	The geotechnical engineering reviewer will be a Registered
	Professional/5 years of experience in coastal storm damage
	reduction projects.
Cost Engineering	The cost engineering reviewer will be a senior engineer with
	experience in coastal storm damage reduction projects. The
	cost engineering reviewer will be selected by the Cost
	Directory of Expertise.
Real Estate	The Real Estate reviewer is to have a minimum of 5 years
	experience in the real estate planning process for cost shared
	and full federal civil works projects, relocations, report
	preparation and acquisition of real estate interests including
	coastal storm damage reduction projects.

- **c. Documentation of ATR.** DrChecks review software will be used to document all ATR comments, responses and associated resolutions accomplished throughout the review process. Comments should be limited to those that are required to ensure adequacy of the product. The four key parts of a quality review comment will normally include:
  - (1) The review concern identify the product's information deficiency or incorrect application of policy, guidance, or procedures;
  - (2) The basis for the concern cite the appropriate law, policy, guidance, or procedure that has not be properly followed;
  - (3) The significance of the concern indicate the importance of the concern with regard to its potential impact on the plan selection, recommended plan components, efficiency (cost), effectiveness (function/outputs), implementation responsibilities, safety, Federal interest, or public acceptability; and
  - (4) The probable specific action needed to resolve the concern identify the action(s) that the reporting officers must take to resolve the concern.

In some situations, especially addressing incomplete or unclear information, comments may seek clarification in order to then assess whether further specific concerns may exist.

The ATR documentation in DrChecks will include the text of each ATR concern, the PDT response, a brief summary of the pertinent points in any discussion, including any vertical team coordination (the vertical team includes the district, RMO, MSC, and HQUSACE), and the agreed upon resolution. If an ATR concern cannot be satisfactorily resolved between the ATR team and the PDT, it will be elevated to the vertical team for further resolution in accordance with the policy issue resolution process described in either ER 1110-1-12 or ER 1105-2-100, Appendix H, as appropriate. Unresolved concerns can be closed in DrChecks with a notation that the concern has been elevated to the vertical team for resolution.

At the conclusion of each ATR effort, the ATR team will prepare a Review Report summarizing the review. Review Reports will be considered an integral part of the ATR documentation and shall:

- Identify the document(s) reviewed and the purpose of the review;
- Disclose the names of the reviewers, their organizational affiliations, and include a short paragraph on both the credentials and relevant experiences of each reviewer;
- Include the charge to the reviewers;
- Describe the nature of their review and their findings and conclusions;
- Identify and summarize each unresolved issue (if any); and
- Include a verbatim copy of each reviewer's comments (either with or without specific attributions), or represent the views of the group as a whole, including any disparate and dissenting views.

ATR may be certified when all ATR concerns are either resolved or referred to the vertical team for resolution and the ATR documentation is complete. The ATR Lead will prepare a Statement of Technical Review certifying that the issues raised by the ATR team have been resolved (or elevated to the vertical team). A Statement of Technical Review will be completed, based on work reviewed to date, for the AFB, draft report, and final report. A sample Statement of Technical Review is included in Attachment 2.

#### 6. INDEPENDENT EXTERNAL PEER REVIEW (IEPR)

IEPR may be required for decision documents under certain circumstances. IEPR is the most independent level of review, and is applied in cases that meet certain criteria where the risk and magnitude of the proposed project are such that a critical examination by a qualified team outside of USACE is warranted. A risk-informed decision, as described in EC 1165-2-209, is made as to whether IEPR is appropriate. IEPR panels will consist of independent, recognized experts from outside of the USACE in the appropriate disciplines, representing a balance of areas of expertise suitable for the review being conducted. There are two types of IEPR:

- Type I IEPR. Type I IEPR reviews are managed outside the USACE and are conducted on project studies. Type I IEPR panels assess the adequacy and acceptability of the economic and environmental assumptions and projections, project evaluation data, economic analysis, environmental analyses, engineering analyses, formulation of alternative plans, methods for integrating risk and uncertainty, models used in the evaluation of environmental impacts of proposed projects, and biological opinions of the project study. Type I IEPR will cover the entire decision document or action and will address all underlying engineering, economics, and environmental work, not just one aspect of the study. For decision documents where a Type II IEPR (Safety Assurance Review) is anticipated during project implementation, safety assurance shall also be addressed during the Type I IEPR per EC 1165-2-209.
- Type II IEPR. Type II IEPR, or Safety Assurance Review (SAR), are managed outside the USACE and are conducted on design and construction activities for hurricane, storm, and flood risk management projects or other projects where existing and potential hazards pose a significant threat to human life. Type II IEPR panels will conduct reviews of the design and construction activities prior to initiation of physical construction and, until construction activities are completed, periodically thereafter on a regular schedule. The

reviews shall consider the adequacy, appropriateness, and acceptability of the design and construction activities in assuring public health safety and welfare.

- **a. Decision on IEPR.** This section documents the risk informed decision on whether IEPR (Type I, Type II, both or neither) will or will not be conducted for the decision document and, if appropriate, follow-on project implementation. The decision is based on the criteria in EC 1165-2-209 and the discussion in above, Section 3 Factors Affecting the Scope and Level of Review. The risk informed decision explicitly considered:
  - If the decision document meets the mandatory triggers for Type I IEPR described in Paragraph 11.d.(1) and Appendix D of EC 1165-2-209; and if it doesn't, then also:
    - the consequences of non-performance on project economics, the environmental and social well-being (public safety and social justice); The project has performed well in the past and the consequences of non-performance are likely to be insignificant.
    - whether the product is likely to contain influential scientific information or be highly influential scientific assessment; and The LRR will not contain influential scientific information or highly influential scientific assessments.
    - If and how the decision document meets any of the possible exclusions described in Paragraph 11.d.(3) and Appendix D of EC 1165-2-209.
       Appendix D of Engineering Circular 1165-2-209 dated 31 January 2010 lists the factors that trigger the requirement of Independent External Peer Review (IEPR). The detail provided below describes how the LRR and the project address these factors.
      - (1) <u>Significant threat to human life.</u> There is not expected to be significant change to the size of the project with respect to the volume of sand being placed on the beach or the project footprint. The only potential change is an increase in size of the borrow area. Any changes would not result in significant threat to human life.
      - (2) <u>Total Project cost greater than \$45 million.</u> The LRR is not intended to support new authorities. Rather it is intended to support a new Project Partnership Agreement (PPA). Since the project footprint and the borrow area are not expected to change, the LRR decision is not expected to significantly change the authorized total project cost.
      - (3) <u>Request by the State Governor</u>. There has been no request for IEPR by the Governor of Florida.
      - (4) <u>Request by the head of a Federal or state agency.</u> There has been no request for IEPR by any Federal or state Agency.
      - (5) <u>Significant public dispute as to the size, nature or effects of the project.</u> Significant public dispute as to the size, nature or effects of the project is not anticipated.
      - (6) <u>Significant public dispute as to the economic or environmental cost or benefit of the project.</u> Significant public dispute as to the economic or environmental cost or benefit of the project is not anticipated. The economic benefits for this type of project are claimed for reducing storm damages to infrastructure and incidental recreation. With the proposed modifications this project will still have the same benefits as it always has.

- (7) Information is based on novel methods, presents complex challenges for interpretation, contains precedent-setting methods or models, or presents conclusions that are likely to change prevailing practices. The project will serve the same purposes as it has in the past, with the only difference being the potential expansion of the borrow area. There are no changes to the Design Berm.
- (8) <u>Any other circumstance where the Chief of Engineers determines Type I IEPR is warranted.</u> The Chief of Engineers has not made a determination that Type I IEPR is warranted. The LRR and EA are to be approved at the Division level. Conducting an IEPR on the subject documents would add significant costs and time with little added quality to the product.
- <u>The status of any request to conduct IEPR from a head of a Federal or state agency</u> <u>charged with reviewing the project, if applicable; and</u> There has been no request from a head of any Federal or state agency charged with reviewing the project.
- If the proposed project meets the criteria for conducting Type II IEPR described in Paragraph 2 of Appendix D of EC 1165-2-209, including:
  - if the Federal action is justified by life safety or failure of the project would pose a significant threat to human life;
    This project is not intended to benefit life safety, nor does it pose a significant threat to human life. The project is justified on the basis of storm damage reduction benefits. Project failure would not result in a significant threat to human life/safety.
  - if the project involves the use of innovative materials or techniques where the engineering is based on novel methods, presents complex challenges for interpretations, contains precedent-setting methods or models, or presents conclusions that are likely to change prevailing practices;
    The information in the decision document and proposed project design are not based on novel methods, do not use innovative materials or techniques do not present

on novel methods, do not use innovative materials or techniques do not present complex challenges ,are not precedent setting, and are not likely to change prevailing practices. The dredging techniques to be used for the borrow area are the same as those used commonly in other constructed beach nourishment projects. The construction methods and equipment used for beach placement will be the same as those used commonly in other constructed beach nourishment projects. The construction template does not change the design profile on which project benefits are based.

if the project design requires redundancy, resiliency, and/or robustness; and/or
 The proposed project design does not require any additional redundancy, resilience, or robustness. Beach fill projects for HSDR purposes such as this one are redundant in that periodic nourishments are included as part of the project plan when the beach becomes in need of sand to increase reliability. The project is resilient in that beach naturally recovers to some extent after storms, and emergency nourishment may be implemented to restore projects should a natural disaster adversely impact the project. Beach fill projects such as this one are robust because, by adding sand to the natural system, damages are reduced in a way that allows the naturally dynamic beach to adjust to the ever- changing coastal environment.

• If the project has unique construction sequencing or a reduced or overlapping design construction schedule.

The construction sequencing for this project is unique only in that construction must be completed, including mobilization and demobilization, between November 1<sup>st</sup> and May 1<sup>st</sup> due to turtle nesting. This type of construction sequencing is common in the South Florida region and has been successfully accomplished in the past.

Based upon the above, the LRR does not trigger a requirement for Type 1 IEPR and is so limited in scope or impact that it would not significantly benefit from Type I IEPR. Identification and evaluation of the expanded borrow area is a modest change in project scope not requiring reformulation. Absent project reformulation, this report does not trigger the requirement for Type 1 IEPR, consistent with above reference 5. The periodic renourishment to continue for this project if Federal participation is justified is an activity for which there is ample experience within the USACE and industry to treat the activity as being routine. Therefore, Type I IEPR is not proposed for this project. Based on the evaluation of the items above and as well as the items in paragraph 3.b above, a request for exclusion from Type I IEPR will be prepared and submitted through SAD to U.S. Army Corps of Engineers Headquarters for approval.

Based on the project as currently envisioned, the District Chief of Engineering, as the Engineer-In-Responsible-Charge, does not recommend a Type II IEPR Safety Assurance Review of this project at this time. A risk-informed decision concerning the timing and the appropriate level of reviews for the project implementation phase will be prepared and submitted for approval in an updated Review Plan prior to initiation of the design/implementation phase of this project.

- b. Products to Undergo Type I IEPR. Not applicable.
- c. Required Type I IEPR Panel Expertise. Not applicable.
- d. Documentation of Type I IEPR. Not applicable.

#### 7. POLICY AND LEGAL COMPLIANCE REVIEW

All decision documents will be reviewed throughout the study process for their compliance with law and policy. Guidance for policy and legal compliance reviews is addressed in Appendix H, ER 1105-2-100. These reviews culminate in determinations that the recommendations in the reports and the supporting analyses and coordination comply with law and policy, and warrant approval or further recommendation to higher authority, if applicable, by the home MSC Commander. DQC and ATR augment and complement the policy review processes by addressing compliance with pertinent published Army policies, particularly policies on analytical methods and the presentation of findings in decision documents.

# 8. COST ENGINEERING DIRECTORY OF EXPERTISE (DX) REVIEW AND CERTIFICATION

All decision documents shall be coordinated with the Cost Engineering DX, located in the Walla Walla District. The DX will assist in determining the expertise needed on the ATR team and in

the development of the review charge(s). The DX will also provide the Cost Engineering DX certification. The RMO is responsible for coordination with the Cost Engineering DX.

#### 9. MODEL CERTIFICATION AND APPROVAL

EC 1105-2-412 mandates the use of certified or approved models for all planning activities to ensure the models are technically and theoretically sound, compliant with USACE policy, computationally accurate, and based on reasonable assumptions. Planning models, for the purposes of the EC, are defined as any models and analytical tools that planners use to define water resources management problems and opportunities, to formulate potential alternatives to address the problems and take advantage of the opportunities, to evaluate potential effects of alternatives and to support decision making. The use of a certified/approved planning model does not constitute technical review of the planning product. The selection and application of the model and the input and output data is still the responsibility of the users and is subject to DQC, ATR, and IEPR (if required).

EC 1105-2-412 does not cover engineering models used in planning. The process the Hydrology, Hydraulics and Coastal Community of Practice (HH&C CoP) of USACE follows to validate engineering software for use in planning studies and to satisfy the requirements of the Corps' Scientific and Engineering Technology (SET) initiative is provided in Enterprise Standard (ES)-08101 Software Validation for the Hydrology, Hydraulics and Coastal Community of Practice. The selection and application of the model and the input and output data is still the responsibility of the users and is subject to DQC, ATR, and IEPR (if required).

#### a. Planning Models.

None

#### b. Engineering Models.

There are not expected to be any engineering models used in the development of the decision document.

#### **10. REVIEW SCHEDULES AND COSTS**

#### a. ATR Schedule and Cost.

Agency Technical Review of the draft and final reports are currently scheduled for January 2013 and June 2013, at an approximate ATR Team cost of \$30,000 and \$15,000, respectively.

- **b.** Type I IEPR Schedule and Cost. Not applicable.
- c. Model Certification/Approval Schedule and Cost. Not applicable.

## **11. PUBLIC PARTICIPATION**

There will not be any public comment period for the LRR. There are not anticipated to be any significant changes to the scope of the authorized project, which has been successfully

implemented since initial construction in 1993 that would warrant public input. Rather the document is simply to ensure that the authorized project is still economically justified and environmentally acceptable for the remainder of Federal participation. The EA will be made available to the public in accordance with NEPA and the Coastal Zone Management program. The public review and comment period for the Draft EA will occur after ATR and SAD review.

#### **12. REVIEW PLAN APPROVAL AND UPDATES**

The South Atlantic Division Commander is responsible for approving this Review Plan. The Commander's approval reflects vertical team input (involving district, MSC, RMO, and HQUSACE members, as applicable) as to the appropriate scope and level of review for the decision document. Like the PMP, the Review Plan is a living document and may change as the study progresses. The home district is responsible for keeping the Review Plan up to date. Minor changes to the review plan after the MSC Commander approval will be documented in Attachment 3. Significant changes to the Review Plan (such as changes to the scope and/or level of review) will be re-approved by the MSC Commander following the process used for initially approving the plan. The latest version of the Review Plan, along with the Commanders' approval memorandum, will be posted on the Home District's webpage. The latest Review Plan will also be provided to the RMO and home MSC.

## **13. REVIEW PLAN POINTS OF CONTACT**

Questions and/or comments on this review plan can be directed to the following points of contact:

- Jacksonville District Review Manager, 904-232-2698
- Jacksonville District Project Manager, 904-232-1381
- South Atlantic Division Point of Contact, 404-562-5228
- Coastal Storm Damage Reduction National Center of Expertise (CSDRPCX), 347-370-4571

#### **ATTACHMENT 1: TEAM ROSTERS**

Team Rosters intentionally removed.

#### ATTACHMENT 2: SAMPLE STATEMENT OF TECHNICAL REVIEW FOR DECSION DOCUMENTS

#### COMPLETION OF AGENCY TECHNICAL REVIEW

The Agency Technical Review (ATR) has been completed for the <u><type of product></u> for <u><project name and</u> <u>location></u>. The ATR was conducted as defined in the project's Review Plan to comply with the requirements of EC 1165-2-209. During the ATR, compliance with established policy principles and procedures, utilizing justified and valid assumptions, was verified. This included review of: assumptions, methods, procedures, and material used in analyses, alternatives evaluated, the appropriateness of data used and level obtained, and reasonableness of the results, including whether the product meets the customer's needs consistent with law and existing US Army Corps of Engineers policy. The ATR also assessed the District Quality Control (DQC) documentation and made the determination that the DQC activities employed appear to be appropriate and effective. All comments resulting from the ATR have been resolved and the comments have been closed in DrChecks<sup>sm</sup>.

SIGNATURE	
Name	Date
ATR Team Leader	
<u>Office Symbol/Company</u>	
SIGNATURE	
<u>Name</u>	Date
Project Manager	
<u>Office Symbol</u>	
SIGNATURE	
<u>Name</u>	Date
Architect Engineer Project Manager <sup>1</sup>	
Company, location	
SIGNATURE	
<u>Name</u>	Date
Review Management Office Representative	
<u>Office Symbol</u>	
CERTIFICATION OF AGE	ENCY TECHNICAL REVIEW
Significant concerns and the explanation of the resolution <i>their resolution</i> .	n are as follows: <i>Describe the major technical concerns and</i>
As noted above, all concerns resulting from the ATR of t	he project have been fully resolved.
SIGNATURE	

<u>Name</u> Chief, Engineering Division <u>Office Symbol</u>

SIGNATURE

<u>Name</u> Chief, Planning Division <u>Office Symbol</u>

<sup>1</sup> Only needed if some portion of the ATR was contracted

Date

#### **ATTACHMENT 3: REVIEW PLAN REVISIONS**

Revision Date	Description of Change	Page / Paragraph Number