Addendum to the Final Independent External Peer Review Report
Fire Island Inlet to Montauk Point, New York General Reformulation Report

Prepared by
Battelle Memorial Institute

Prepared for
Department of the Army
U.S. Army Corps of Engineers
Coastal Storm Risk Management Planning Center of Expertise
Baltimore District

Contract No. W912HQ-15-D-0001
Task Order: 0007

January 12, 2017

Battelle
The Business of Innovation

This page is intentionally left blank.

CONTRACT NO. W912HQ-15-D-0001
Task Order: 0007

Addendum to the Final Independent External Peer Review Report

Fire Island Inlet to Montauk Point, New York General Reformulation Report

Prepared by

Battelle
505 King Avenue
Columbus, Ohio 43201

for

Department of the Army
U.S. Army Corps of Engineers
Coastal Storm Risk Management Planning Center of Expertise
Baltimore District

January 12, 2017

This page is intentionally left blank.

Table of Contents

Page

1. INTRODUCTION 1
2. METHODS 1
3. FINAL PANEL COMMENTS 2

LIST OF ACRONYMS

DEIS	Draft Environmental Impact Statement
DrChecks	Design Review and Checking System
EC	Engineer Circular
FIMP	Fire Island Inlet to Montauk Point
GRR	General Reevaluation Report
IEPR	Independent External Peer Review
NED	National Economic Development
NEPA	National Environmental Policy Act
TSP	Tentatively Selected Plan
USACE	United States Army Corps of Engineers

1. INTRODUCTION

This addendum is a supplement to the Final Independent External Peer Review Report for the Fire Island Inlet to Montauk Point, New York General Reformulation Report (GRR) (hereinafter: FIMP GRR IEPR) submitted on November 15, 2016, by Battelle. It was prepared to document activities associated with the IEPR Panel's review of the public comments on the FIMP GRR and appendices, which included the Draft Environmental Impact Statement (DEIS).

This addendum contains two additional Final Panel Comments (presented in Section 3) and briefly details the IEPR process that determined the need for, and led to the generation of, these comments. The Final Panel Comments in this addendum are numbered 14 and 15, continuing the Final Panel Comment numbering presented in the FIMP GRR Final IEPR Report, which stopped at Final Panel Comment 13.

2. METHODS

This section summarizes the activities associated with the review of the public and agency comments conducted for this project.

Battelle received electronic versions of the public comments from the U.S. Army Corps of Engineers (USACE) on November 4, 2016 and December 6, 2016. Prior to sending the public comments to Battelle, USACE organized them by source (agency or resident) and provided a summary of some of the shorter public comments in an Excel spreadsheet. In addition to this summary, USACE provided all public comments as reference, in the event the Panel wanted to review the complete version of any particular comment in detail.

Battelle provided the Excel spreadsheet and the comments in their original full-text format to the panel members. In accordance with procedures described in the Department of the Army, USACE, Engineer Circular (EC) *Civil Works Review* (EC 1165-2-214)[1], Appendix D, Battelle focused the IEPR Panel's public comment review on assessing scientific and technical issues with regard to the assumptions, data, methods, and models used in the project. Each panel member was asked to independently determine whether the public comments contained any additional scientific or technical concerns regarding the project which were not previously identified and which should be addressed by USACE in the GRR and/or appendices. The Panel was charged with focusing on discipline-specific scientific and technical issues and not policy-related comments, per EC 1165-2-214, Appendix D. Comments provided by state and Federal agencies were provided to the Panel as "For Information Only." Battelle understands that under the National Environmental Policy Act (NEPA), USACE must address state and Federal agency comments as part of the consultation process; therefore, issues brought up by these agencies and USACE's subsequent responses were considered policy related. However, if issues noted in the public comments were also discussed in the agency comments, the Panel noted the agency comments as well.

The three FIMP GRR IEPR panel members received the public and agency comments from Battelle. The panel members reviewed comment letters from state and Federal agencies as well as emails, letters, and comment cards from a variety of companies, non-profit organizations, and members of the general public. The FIMP GRR IEPR panel members were required to answer one charge question with regard to the

[1] USACE (2012). Water Resources Policies and Authorities: Civil Works Review. Engineer Circular (EC) 1165-2-214. Department of the Army, U.S. Army Corps of Engineers, Washington, D.C. December 15.

public comments:

1. **Do the public comments raise any additional discipline-specific technical concerns with regard to the overall report?**

The panel members submitted responses to this charge question, and Battelle reviewed those responses to identify any issues, areas of potential conflict, and other overall impressions. Each panel member's individual comments were shared with the full Panel. Battelle then facilitated a brief teleconference discussion with the panel members to discuss and determine if any of their identified issues should be carried forward as Final Panel Comments.

Based on the Panel's review, most of the public comments fell into the category of policy-related issues or were issues discussed in previous Final Panel Comments submitted in the FIMP GRR IEPR Final Report. Issues noted in the public comments, but were already covered in previous Final Panel Comments included issues related to the offshore borrow areas, the use of Hurricane Sandy data, and the project's potential effect on protected species. The Panel did not repeat these concerns in this addendum. The panel members identified two issues within the public comments that needed additional clarifying information in order to strengthen the GRR and/or appendices; these two issues are presented in the Final Panel Comments in Section 3.

All panel members reviewed and provided input on the issues discussed in Final Panel Comments 14 and 15 (presented in Section 3 of this addendum). Battelle prepared this addendum and conducted a final review and edit of the Final Panel Comments for clarity and consistency. There was no direct communication between the Panel and USACE during the review and preparation of these Final Panel Comments.

Battelle will enter Final Panel Comments 14 and 15 into USACE's Design Review and Checking System (DrChecks), a Web-based software system for documenting and sharing comments on reports and design documents, so that USACE can review and respond to them. USACE will provide Evaluator Responses to the two Final Panel Comments, and the Panel will respond via BackCheck Responses to the Evaluator Responses. The USACE and Panel responses will be documented in DrChecks[2]. Battelle will provide USACE and the Panel with a pdf printout of all DrChecks entries, through comment closeout, as a final deliverable and record of the results of the IEPR and the public and agency comment review.

3. FINAL PANEL COMMENTS

This section presents the full text of Final Panel Comments 14 and 15 prepared by the FIMP GRR IEPR panel members.

[2] Battelle is scoped with uploading the Panel's BackCheck Responses in DrChecks on behalf of the Panel.

Final Panel Comment 14

There is not enough detail in the GRR on how shortening the Westhampton groins will alter the existing shoreline and possibly influence storm damage risk.

Basis for Comment

The tentatively selected plan (TSP) (GRR Section 9.7) proposes shortening groins 1 to 13 within the Westhampton groin field: groins 1 to 8 reduced to 380 ft in length and groins 9 through 13 reduced to 386, 392, 398, 402, and 410 ft in length, respectively. GRR Section 6.0 states that reducing the groin length will increase westerly-directed sediment transport and reduce renourishment requirements.

Several public comment letters (among them, a letter from Judy Connick [dated October 14, 2016] and emailed comments from the Moores, Linda Hirsch, and Michael Gizang [received on October 18, 2016]) state that the GRR documentation does not provide adequate analysis of how shortening the groins will alter the existing shoreline and influence storm damage risk. The Panel's review of the GRR found no maps or figures which provide results or analyses that show the projected shoreline and beach profile features following groin modification.

Significance – Medium

Without proper documentation of the shoreline changes and profile features resulting from groin shortening, the potential changes to storm damage risks cannot be assessed, which could influence project costs and benefits.

Recommendation for Resolution

1. Provide additional discussion and figures in the GRR on the analyses that were done to determine how reducing the length of the Westhampton groins will change the local shoreline location, beach profile, and storm damage risk.

Final Panel Comment 15

Recreational benefits of the project and the damages that would be avoided by constructing the project appear to be underestimated.

Basis for Comment

In the Public Meeting comments (PDF file, p. 71), the Town of East Hampton expressed concern that project benefits have been underestimated. Its consultant, First Coastal Consulting, claims that recreational benefits presented in the GRR do not include hotel occupancy and public parking revenues, and only include willingness-to-pay estimations. Based on the Panel's experience, USACE typically uses a willingness-to-pay survey to assess recreational benefits; the Town, however, suggests including hotel occupancy and public parking revenues in the benefit assessment.

The Town also noted (PDF, p. 75) that the building inventory of structures affected in the downtown Montauk area is low and that the repair costs avoided are underestimated. If correct, this means both avoided damages and project benefits are underestimated. If the extended beaches and the property raisings reduce storm damage, then the damages that were avoided will be the benefits of the project. Repair costs will be higher for both for the without- and the with-project conditions, but because the with-project condition has fewer structures affected (or affected to a lesser degree), the avoided damages increase, thereby increasing project benefits.

The Panel notes that USACE typically uses a stage-damage relationship based on elevation and structure and content values to assess damages and avoided damages. The Town is suggesting a different approach that, if applied and extrapolated to the entire project area, could increase the total project benefits.

Significance – Low

The concerns expressed by the Town of East Hampton do not affect the selection of the TSP; however, if its assessments are correct, the project benefits could increase.

Recommendation for Resolution

1. Address the concerns expressed by the Town of East Hampton, and update the GRR to account for the increased project benefits.

This page intentionally left blank

Battelle
The Business *of* Innovation