
Project Worksheet Development



Student Manual Lecture Materials

Student Manual

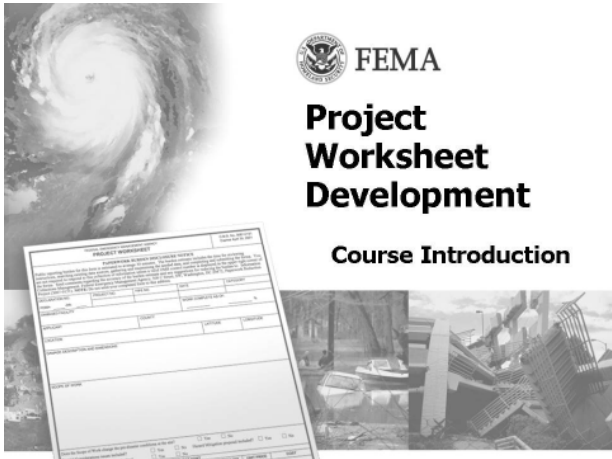




July 2008

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 <p>Introductions</p> <p> Project Worksheet Development IG - 3</p>	

INTRODUCTION

Public Assistance Division Mission Statement

- The mission of the Public Assistance Program is to assist communities in recovering from the devastating effects of disasters.
- We will accomplish the mission by having experienced, trained, knowledgeable and friendly staff.
- We will continuously seek and identify opportunities to improve program delivery.



Project Worksheet Development 10 - 4

Course Goal

1. To provide the basic knowledge and tools for Project Specialists and Technical Specialists to collect project information and prepare and complete an accurate Project Worksheet in support of the Public Assistance (PA) Program.
2. To standardize Project Worksheets throughout the Regions.



Project Worksheet Development 10 - 5

Course Objectives

- Obtain and document pertinent project information
- Accurately describe a project's damage, document the scope of work, prepare the cost estimate, and identify Special Considerations issues
- Effectively utilize the *Project Worksheet Development Guide* in the collection of project information
- Utilize Collecting Project Information and Project Worksheet checklists to ensure all necessary project components have been collected and documented



Project Worksheet Development 10 - 6

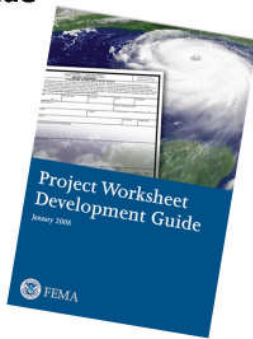
INTRODUCTION

Course Audience



Project Worksheet Development Guide

- Introduction
- Collecting Project Information
 - Section I
- Completing the Project Worksheet
 - Section II
- Special Considerations
 - Section III



References

- *Project Worksheet Development Guide*

Project Specialists must have the ability to:

- Work well with others and individually
- Manage multiple and dynamic priorities and deadlines
- Organize thoughts and findings on paper
- Document and support decisions based on the applicable program laws, regulations, and policies
- Elevate issues to the appropriate level

References

- *PW Guide*, pp. 2-3

INTRODUCTION

Role of the Project Specialist

- **"Eyes and Ears of FEMA"**
 - Only representative to see the site
 - Clearly document damages and site conditions
 - Create a picture
- **Produce clear, complete, and accurate Project Worksheets**
- **Work effectively with the applicant and State**



Project Worksheet Development IG - 10

The Public Assistance Process



Project Worksheet Development IG - 11

The Project Worksheet ...

...Tells a story

The image shows a Project Worksheet form with several callouts pointing to specific sections:

- What was there before the disaster?**
Basic Project Worksheet Info
- What did the disaster do to the facility?**
Damage Description and Dimensions
- What is necessary to fix the facility?**
Scope of Work
- How will the facility be restored?**
Scope of Work
- Are there any Special Considerations?**
4 Questions
- How much will it cost?**
Cost

Project Worksheet Development IG - 12

References

- Project Worksheet – FEMA Form 90-91

INTRODUCTION

Project Worksheet: Main Components

Basic Project Information

Damage Description
and Dimensions

Scope of Work

Special Considerations

Cost



References

- Project Worksheet – FEMA Form 90-91

Project Specialists and the Project Worksheet

Collection:
Site inspection
and collection
of project
information

Assessment:
Assess information
and apply
eligibility criteria

Product:
Project
Worksheet








Project Worksheet Development II-14

References

- *PW Guide*, p. 3

COLLECTING PROJECT INFORMATION

<div data-bbox="354 342 769 497"><h3>Collecting Project Information</h3><h4>Section I</h4></div> <div data-bbox="248 642 358 680"> FEMA</div> <div data-bbox="638 657 821 674"><small>Project Worksheet Development II - 15</small></div>	<div data-bbox="862 212 1031 241">References</div> <ul data-bbox="862 254 1401 365" style="list-style-type: none">• <i>PW Guide</i> - Appendix C - Collecting Project Information Checklist• <i>PW Guide</i>, p. 5
<div data-bbox="357 814 734 848">Initiating Your Assignment</div> <ul data-bbox="357 865 698 1127" style="list-style-type: none">▪ Field personnel briefing<ul style="list-style-type: none">▪ Disaster-specific information▪ Applicant information▪ Equipment & safety equipment▪ Tools & maps▪ FEMA references▪ Project Worksheet and supplemental forms <div data-bbox="591 942 842 1222"></div> <div data-bbox="248 1178 358 1215"> FEMA</div> <div data-bbox="638 1194 821 1211"><small>Project Worksheet Development II - 16</small></div>	<div data-bbox="862 745 1031 774">References</div> <ul data-bbox="862 789 1157 823" style="list-style-type: none">• <i>PW Guide</i>, pp. 5-6
<div data-bbox="357 1350 568 1383">Get Organized!</div> <div data-bbox="237 1398 423 1698"></div> <ul data-bbox="430 1400 774 1533" style="list-style-type: none">▪ Meet with the PAC Crew Leader▪ Attend Kickoff Meeting▪ Set up a "system"<ul style="list-style-type: none">▪ Be aware of type of damages <div data-bbox="248 1709 358 1747"> FEMA</div> <div data-bbox="638 1728 821 1745"><small>Project Worksheet Development II - 17</small></div>	<div data-bbox="862 1281 1031 1310">References</div> <ul data-bbox="862 1325 1157 1358" style="list-style-type: none">• <i>PW Guide</i>, pp. 7-8

COLLECTING PROJECT INFORMATION

Applicant Relations

- First impressions
- Establish strong, professional, on-going relationships
- Applicants may:
 - Be disaster victims
 - Not have attended Kickoff Meeting
 - Not be computer users
- Applicants **MUST** remain involved in the entire Project Worksheet process!



Project Worksheet Development IG - 18

References

- *PW Guide*, p 8

Defining the Project

Meeting with the applicant

Project definition

Project formulation

Multiple sites



Project Worksheet Development IG - 19

References

- *PW Guide*, pp. 8-12

Meeting with the Applicant

- Always notify the State of applicant meetings
- Ask questions and request specific documentation to define:
 - Project Description
 - Scope of Intended Work
 - Pertinent Cost Information
- Discuss timeline for visiting site

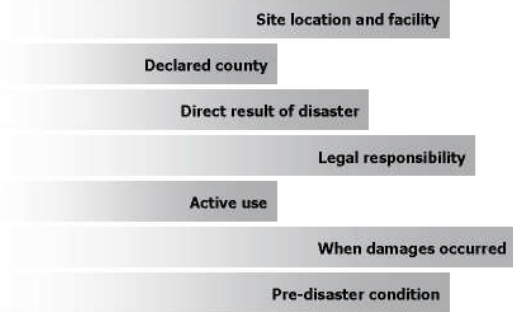



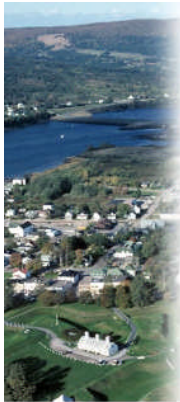



Project Worksheet Development IG - 20





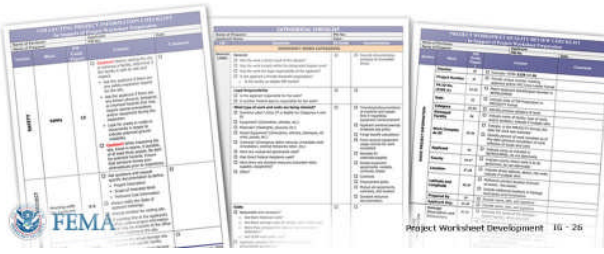

References

- *PW Guide*, pp. 8



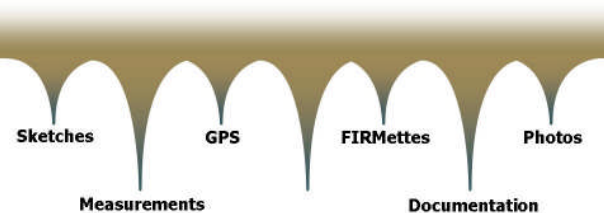



COLLECTING PROJECT INFORMATION

<p>Project Definition</p>  <p> FEMA</p> <p><small>Project Worksheet Development IG - 21</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, pp. 9-10
<p></p> <p>Project Formulation</p> <ul style="list-style-type: none">▪ Combining and organizing projects:<ul style="list-style-type: none">▪ Type of damage▪ System▪ Jurisdiction▪ Method of work▪ Special Considerations/complex issues <p> FEMA</p> <p><small>Project Worksheet Development IG - 22</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, pp. 10-11
<p></p> <p>Multiple Sites</p> <ul style="list-style-type: none">▪ Project Worksheets less than \$1,000▪ Projects <u>without</u> Special Considerations issues may be combined<ul style="list-style-type: none">▪ Roads▪ Utilities▪ Water distribution lines▪ Projects <u>with</u> Special Considerations issues should be separated<ul style="list-style-type: none">▪ Buildings/parks – Insurance/Mitigation▪ Beaches - Environmental <p> FEMA</p> <p><small>Project Worksheet Development IG - 23</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, p. 12

COLLECTING PROJECT INFORMATION

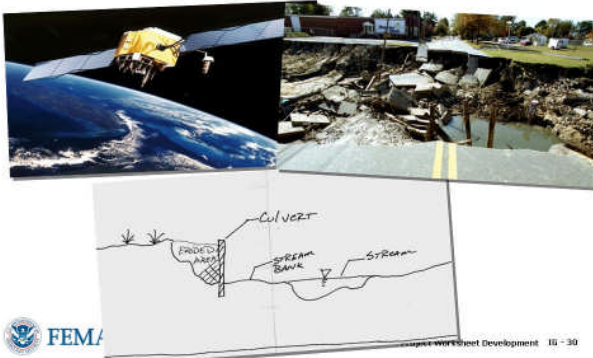
<p style="text-align: center;">Conducting the Site Visit</p>  <div style="background-color: #f0f0f0; padding: 5px; margin-top: 10px;"> <p>Safety</p> <p>Checklists</p> <p>Identifying site conditions</p> <p>Recording project details</p> <p>Identifying damages</p> </div> <p style="text-align: center;"> FEMA</p> <p style="text-align: right; font-size: small;">Project Worksheet Development IG - 24</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 12-18
<p style="text-align: center;">Safety!</p> <ul style="list-style-type: none"> ▪ CAUTION: You are visiting damage sites that could be unsafe ▪ Take all necessary precautions before approaching damaged sites ▪ Be alert of potential hazards ▪ Travel in teams  <p style="text-align: center;"> FEMA</p> <p style="text-align: right; font-size: small;">Project Worksheet Development IG - 25</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 12
<p style="text-align: center;">Checklists</p> <ul style="list-style-type: none"> ▪ Collecting Project Information Checklist ▪ Categorical Checklist ▪ PW Review Checklist  <p style="text-align: center;"> FEMA</p> <p style="text-align: right; font-size: small;">Project Worksheet Development IG - 26</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 13-18 • <i>PW Guide</i> - Appendix C - Collecting Project Information Checklist • <i>PW Guide</i> - Appendix D – Categorical Checklist • <i>PW Guide</i> - Appendix E – Project Worksheet Quality Review Checklist

COLLECTING PROJECT INFORMATION

<p>Identifying Site Conditions</p> <ul style="list-style-type: none">▪ Conduct overall visual inspection▪ Compare observed damages vs. requested<ul style="list-style-type: none">▪ Look for pre-disaster damage▪ Assess pre-disaster condition  <p> FEMA</p> <p><small>Project Worksheet Development IG - 27</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, p. 13
<p>Recording Project Details</p>  <p> FEMA</p> <p><small>Project Worksheet Development IG - 28</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, pp. 13-14
<p>Recording Project Details: Measurements</p>  <ul style="list-style-type: none">▪ Area/volume<ul style="list-style-type: none">▪ Length x width x depth▪ Facility components<ul style="list-style-type: none">▪ Pavement thickness, base thickness, roadway width▪ Capacity<ul style="list-style-type: none">▪ 100,000-gallon water tank▪ 400 kW generator <p> FEMA</p> <p><small>Project Worksheet Development IG - 29</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, p. 13

COLLECTING PROJECT INFORMATION

Record Project Details Photos, GPS, Sketches



References

- *PW Guide*, pp. 13-14

Recording Project Details: FIRMettes

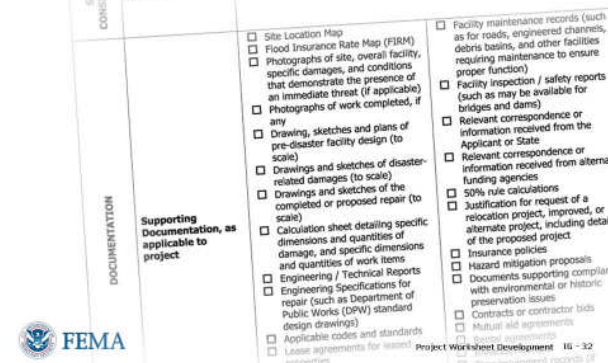


- Appendix G of the *PW Guide*
- FEMA Map Store
- Used to identify Special Flood Hazard Areas
- Special Considerations Question #2
- Not collected on a site visit but may be before

References

- FEMA Map Store – www.msc.fema.gov
- *PW Guide*, pp. 14-15
- *PW Guide*, Appendix G

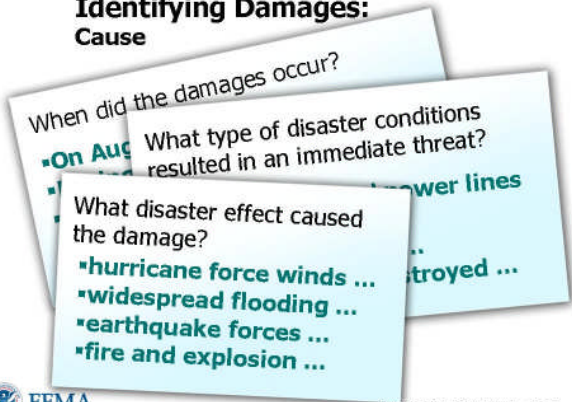

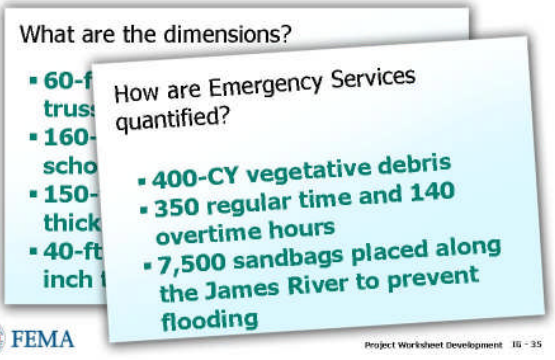
Recording Project Details: Documentation



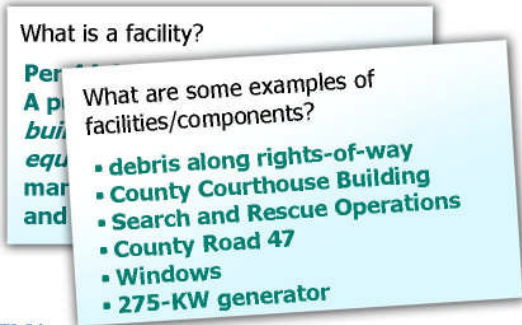
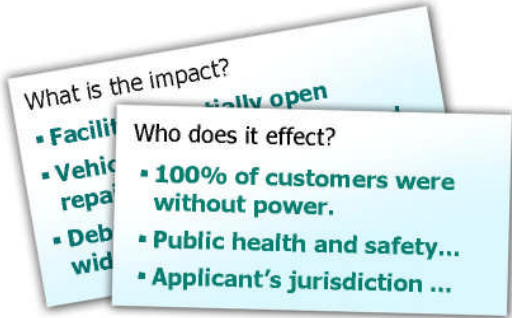

References

- *PW Guide*, pp. 15-16





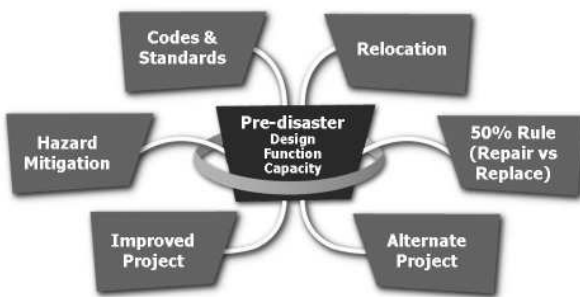

COLLECTING PROJECT INFORMATION

<p>Identifying Damages: Cause</p>  <p>FEMA Project Worksheet Development 16 - 33</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 16
<p>Identifying Damages: Action</p>  <p>FEMA Project Worksheet Development 16 - 34</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 16-17
<p>Identifying Damages: Dimensions/Quantities</p>  <p>FEMA Project Worksheet Development 16 - 35</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 17

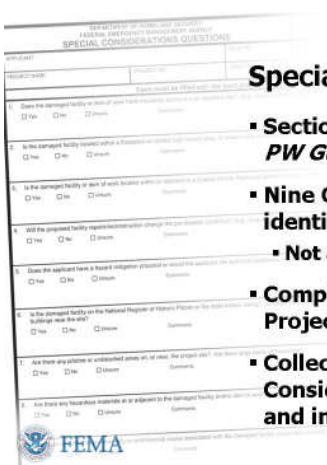

COLLECTING PROJECT INFORMATION

<p>Identifying Damages: Facility/Components (Name)</p>  <p><small>FEMA Project Worksheet Development IG - 36</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, p. 17
<p>Documenting Site Conditions: Impact</p>  <p><small>FEMA Project Worksheet Development IG - 37</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, pp. 17-18
<p>Defining the Scope</p>  <p><small>FEMA Project Worksheet Development IG - 38</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, pp. 18-19

COLLECTING PROJECT INFORMATION

 <p>Method of Repair</p> <ul style="list-style-type: none">▪ Design standards▪ Engineering design▪ Engineering/technical reports <p> <small>Project Worksheet Development IG - 39</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, p. 18
<p>How Work Will be Performed</p> <p>Force account vs. contract</p>  <p> <small>Project Worksheet Development IG - 40</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, p. 18
<p>Pre-Disaster Condition</p>  <p> <small>Project Worksheet Development IG - 41</small></p>	<p>References</p> <ul style="list-style-type: none">• <i>PW Guide</i>, p. 18-19

COLLECTING PROJECT INFORMATION

 <p>Special Considerations</p> <ul style="list-style-type: none"> ▪ Section III & Appendix F – <i>PW Guide</i> ▪ Nine Questions used to identify potential issues ▪ Not a tool for compliance ▪ Completed by applicant and Project Specialist ▪ Collect pertinent Special Consideration documentation and information <p style="text-align: right;">Project Worksheet Development 16 - 42</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 19 • <i>PW Guide</i>, Section III • Special Considerations Questions Form, FEMA Form 90-120 • <i>PW Guide</i> – Appendix F – Special Considerations Review Table 						
<p>Collecting Cost Information</p> <ul style="list-style-type: none"> ▪ Small projects vs. large projects ▪ Differentiate: <ul style="list-style-type: none"> ▪ Work completed vs. work to be completed ▪ Flood vs. wind ▪ Cost Estimate <ul style="list-style-type: none"> ▪ Force account ▪ Unit cost ▪ Contracts ▪ Cost Estimating Format (CEF)  <p style="text-align: right;">Project Worksheet Development 16 - 43</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 20-25 						
<p>Small Projects vs. Large Projects</p> <table border="1" data-bbox="328 1438 799 1619"> <thead> <tr> <th>Small Projects</th><th>Large Projects</th></tr> </thead> <tbody> <tr> <td colspan="2">Separated by monetary threshold that changes annually - \$60,900 (Fiscal Year 2008)</td> </tr> <tr> <td> <ul style="list-style-type: none"> ▪ Paid on estimates ▪ Less than threshold </td><td> <ul style="list-style-type: none"> ▪ Paid on actual costs ▪ Greater than threshold ▪ Cost Estimating Format (CEF) may be required </td></tr> </tbody> </table> <p style="text-align: right;">Project Worksheet Development 16 - 44</p>	Small Projects	Large Projects	Separated by monetary threshold that changes annually - \$60,900 (Fiscal Year 2008)		<ul style="list-style-type: none"> ▪ Paid on estimates ▪ Less than threshold 	<ul style="list-style-type: none"> ▪ Paid on actual costs ▪ Greater than threshold ▪ Cost Estimating Format (CEF) may be required 	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 20
Small Projects	Large Projects						
Separated by monetary threshold that changes annually - \$60,900 (Fiscal Year 2008)							
<ul style="list-style-type: none"> ▪ Paid on estimates ▪ Less than threshold 	<ul style="list-style-type: none"> ▪ Paid on actual costs ▪ Greater than threshold ▪ Cost Estimating Format (CEF) may be required 						

COLLECTING PROJECT INFORMATION

Work Completed vs. Work to be Completed

Work Completed	Work to be Completed
<ul style="list-style-type: none">• Collect "actual" costs<ul style="list-style-type: none">▪ Invoices, timesheets, etc.• Force account records, contracts	<ul style="list-style-type: none">• Develop estimates• Determine how work will be performed• Unit costs, CEF



Project Worksheet Development 16 - 45

References

- *PW Guide*, pp. 20-21

Cost Estimate: Force Account

- Actual costs incurred by the applicant
 - Labor and fringe benefits
 - Payroll information
 - Materials
 - Receipts, invoices, work orders
 - Equipment and rented equipment
 - Equipment logs/usage records
 - Equipment rates
 - Invoices



Project Worksheet Development 16 - 46

References

- *PW Guide*, pp. 21-22

Cost Estimates: Unit Cost

- State or local data from previously completed projects
 - Historical documentation for similar work
 - Average costs for similar work in area
 - Must establish reasonableness
- Commercial estimating sources
 - R.S. Means
- FEMA Cost Codes
 - Provided, disaster-specific




Project Worksheet Development 16 - 47

References

- *PW Guide*, p. 23

Cost Estimate: Contracts



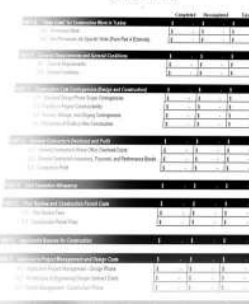
- Work done by an outside source
- Must be properly procured
- Generally used for work completed
- May be used to estimate work that is just beginning or still underway

Project Worksheet Development IG - 48

References

- *PW Guide*, p. 24

Cost Estimating Format (CEF)



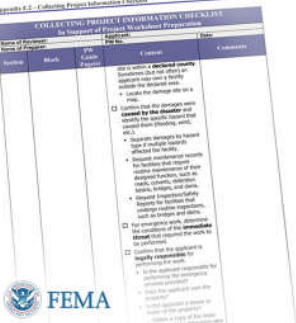
- Required as of March 15, 2007
- To qualify the project must be:
 - Permanent Work
 - A Large Project
 - 90% or less complete

Project Worksheet Development IG - 49

References

- *PW Guide*, pp. 24-25

Before leaving the site...





- Document observations before leaving the site!
- Summarize outstanding questions/information needed
- Walk the site again
- Ask remaining questions

Project Worksheet Development IG - 50

References

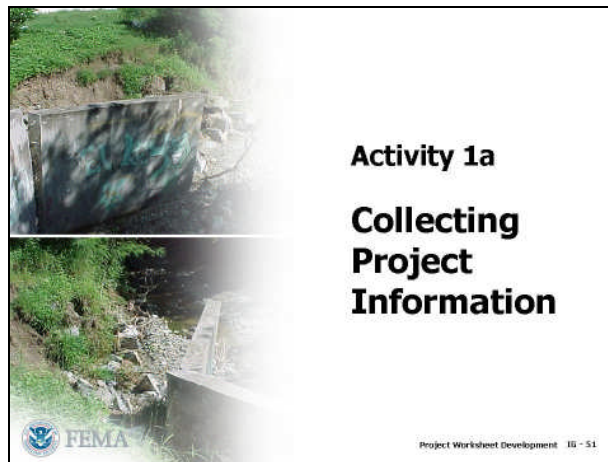
- *PW Guide*, p. 25

COLLECTING PROJECT INFORMATION

 <p>Activity 1a</p> <p>Collecting Project Information</p> <p> FEMA</p> <p><small>Project Worksheet Development II - 51</small></p>	<p>References</p> <ul style="list-style-type: none">• Activity 4.1a description is located on the following pages.• <i>PW Guide</i> – Appendix C – Collecting Project Information Checklist
--	---

COLLECTING PROJECT INFORMATION

Activity 1a



Purpose of Activity

- To collect project information and prepare complete, concise Project Worksheets using the techniques and knowledge gained from the information presented in this unit.

Group Activity Setting

- Your PAC Crew Leader has just assigned you a site located in Lake Marriott, WI in Brown County, a suburb of Green Bay.
- Your site visit is scheduled for July 7, 2007.
- The State representative, Sam Swanson, will be attending.
- You will be meeting with Manny Johnson, the Public Works Supervisor, who has requested a FEMA representative as soon as possible so that they can begin making the repairs.
- You will meet Manny at the Lake Marriott Department of Public Works, located at 111 Harpers Drive, Lake Marriott, WI and travel to the site from there.
- Your PAC Crew Leader has provided you with the following information regarding the applicant and site:
 - ⇒ Disaster Number 2215
 - ⇒ PA ID #: 123-89123-00
 - ⇒ Project Reference #: LM-C07
 - ⇒ Location: At the intersection of Doty Street and Washington Street

COLLECTING PROJECT INFORMATION

Overview of Activities

- This activity involves full class participation.
- All participants are responsible for documenting the activity solutions in the data sheets provided in the *Student Manual*.
- This activity is both interactive and progressive. Each piece builds off the previous section and the answers may vary with each instructor and group of participants.
- Anticipate participants will identify other items not included in the solutions. Be prepared to comment on the validity of those items.
- **Part A: Collecting Project Information**
- Part B: Damage Description and Dimensions
- Part C: Scope of Work
- Part D: Cost and Special Considerations
- Class Activity Review.

Part A –Collecting Project Information (15 min)

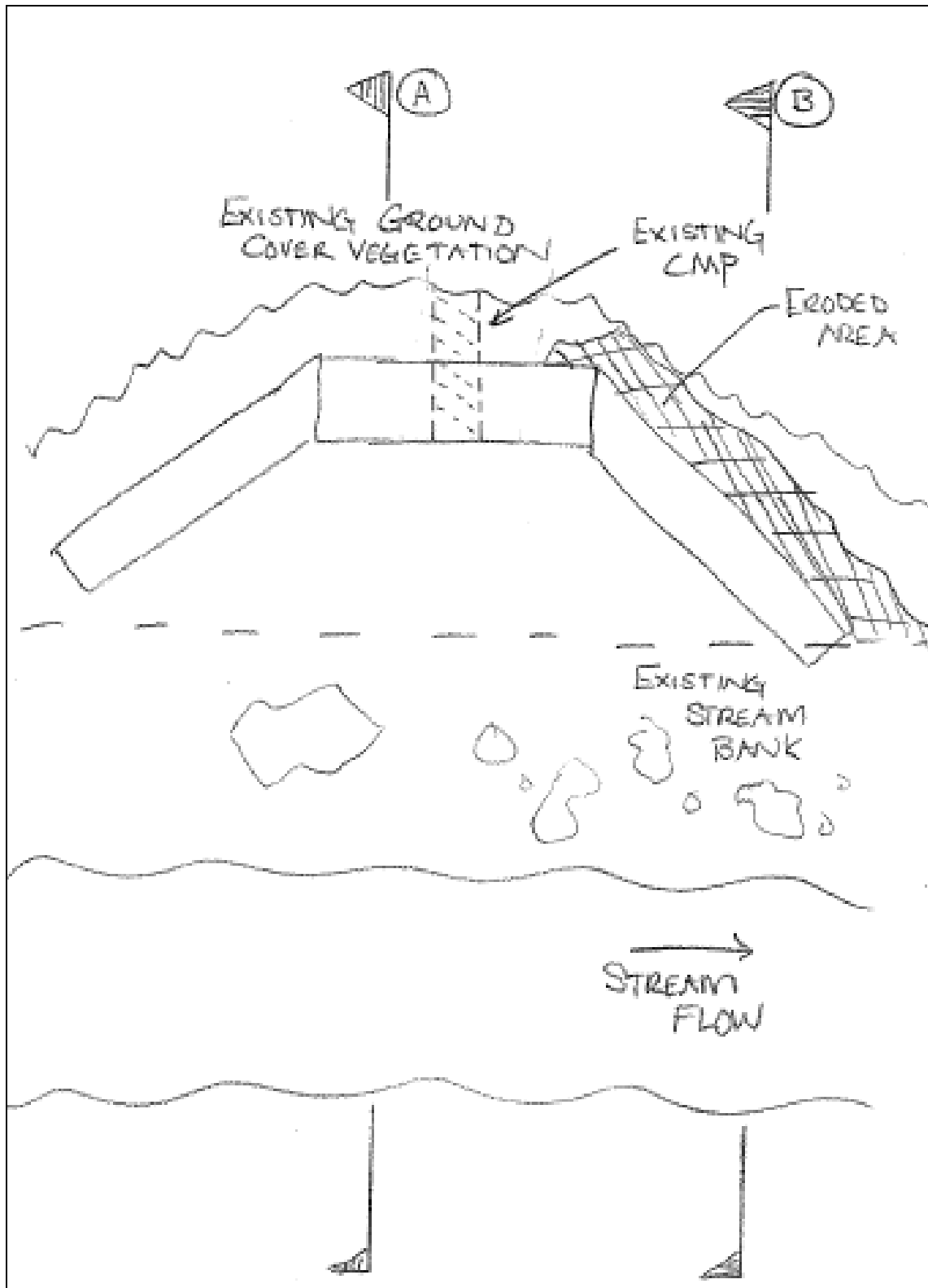
Using the Collecting Project Information Checklist provided, ask project-related questions of the instructor, who will be role-playing the applicant, that correspond to the disaster recovery scenario described herein as if you were on a site visit.

Based on the information collected on this site visit, you will develop a Project Worksheet in Parts B, C, and D.

Focus on the main parts of the Project Worksheet: Damage Description and Dimensions, Scope of Work, Project Cost and Special Considerations.

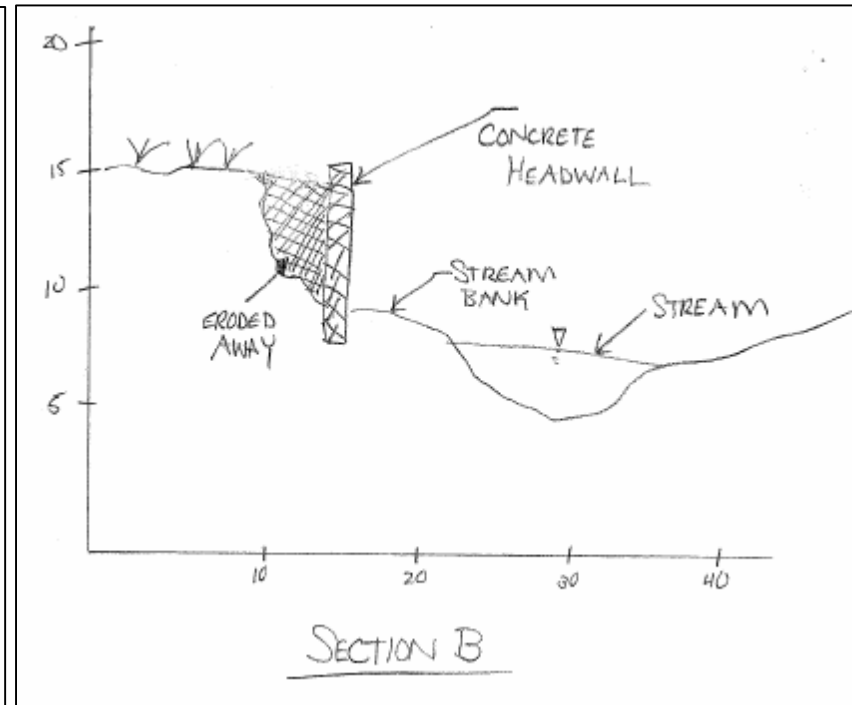
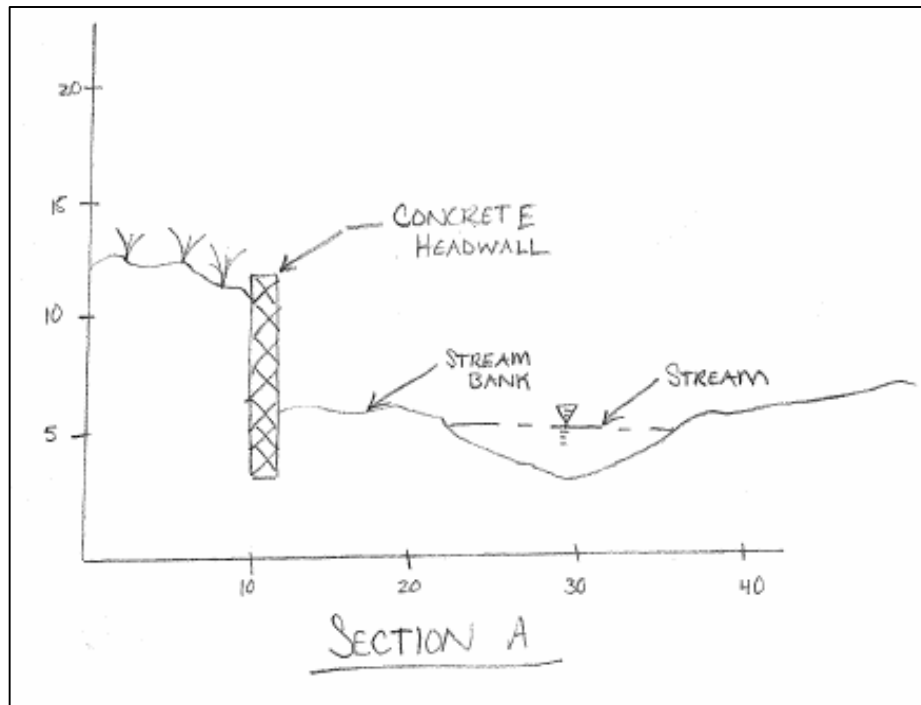
COLLECTING PROJECT INFORMATION

Activity 1: Collecting Project Information – Sketches



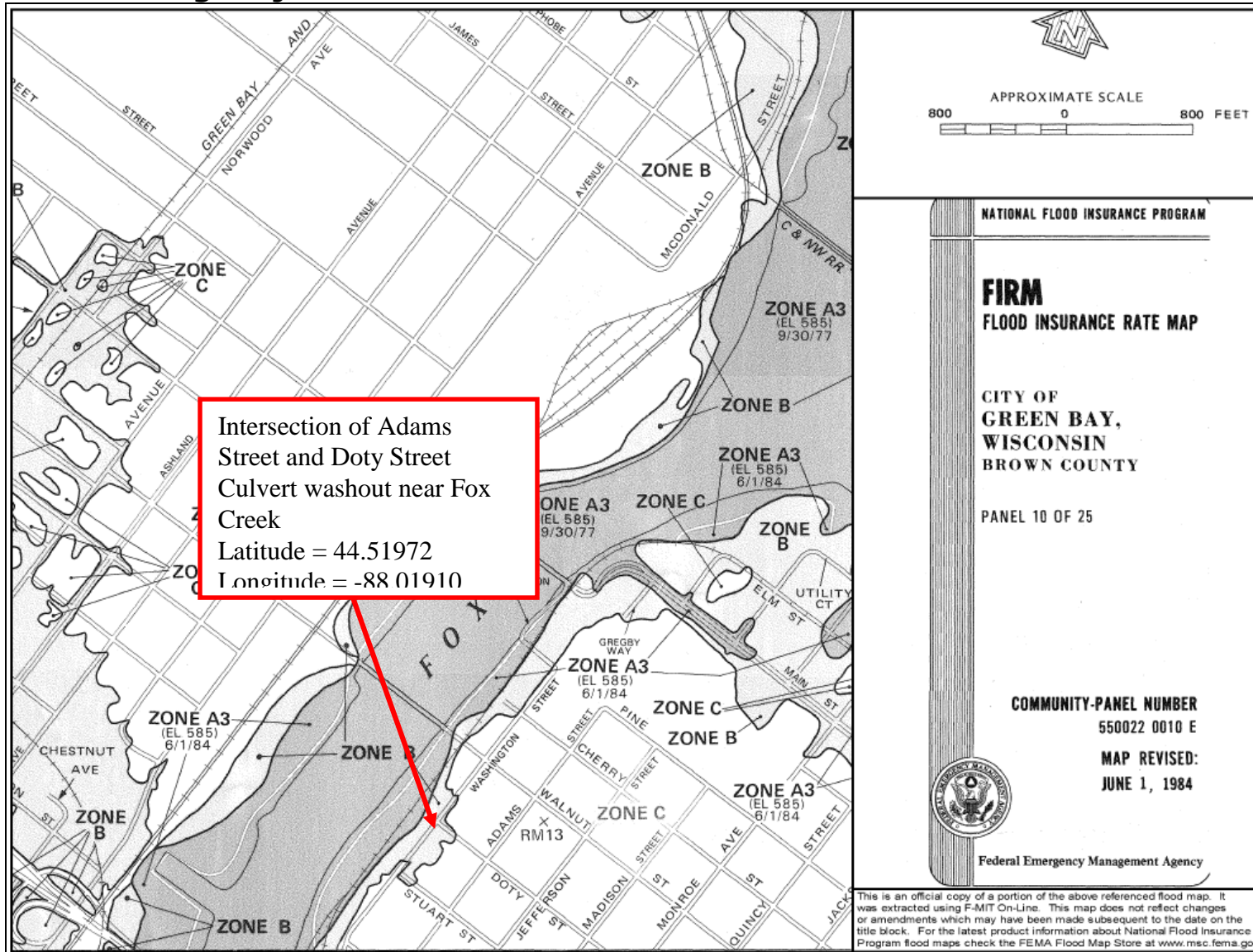
COLLECTING PROJECT INFORMATION

Activity 1: Collecting Project Information – Sketches (Cont'd)



COLLECTING PROJECT INFORMATION

Activity 1: Collecting Project Information – FIRMette



COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST				
In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
SAFETY	Safety	12	<input type="checkbox"/> Caution!! Before visiting the site or entering a facility, determine if the facility is safe to visit and inspect. <ul style="list-style-type: none"> ▪ Ask the applicant if there are any safety inspection reports for the site. ▪ Ask the applicant if there are any known physical, biological, or chemical hazards that may require special precautions and/or equipment during the inspection. ▪ Look for cracks in roads or movements in slopes to indicate potential ground instability. <input type="checkbox"/> Caution!! While inspecting the site, travel in teams, if possible, of at least three people. Be alert for potential hazards. Ensure that someone knows your whereabouts prior to inspections.	<input type="checkbox"/>
DEFINING THE PROJECT	Meeting with the Applicant	8-9	<input type="checkbox"/> Ask questions and request specific documentation to define: <ul style="list-style-type: none"> ▪ Project Description ▪ Scope of Intended Work ▪ Pertinent Cost Information <input type="checkbox"/> Always notify the State of applicant meetings. <input type="checkbox"/> Discuss timeline for visiting site. <input type="checkbox"/> If meeting first at the applicant's office, collect project information that may be available at the office before heading to the site.	<input type="checkbox"/>
	Project Definition	9-10	<input type="checkbox"/> Confirm the actual damage site location and specific facility. <input type="checkbox"/> Confirm that the actual damage	<input type="checkbox"/>

COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST				
In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
			<p>site is within a declared county. Sometimes (but not often) an applicant may own a facility outside the declared area.</p> <ul style="list-style-type: none"> ▪ Locate the damage site on a map. <p><input type="checkbox"/> Confirm that the damages were caused by the disaster and identify the specific hazard that caused them (flooding, wind, etc.).</p> <ul style="list-style-type: none"> ▪ Separate damages by hazard type if multiple hazards affected the facility. ▪ Request maintenance records for facilities that require routine maintenance of their designed function, such as roads, culverts, detention basins, bridges, and dams. ▪ Request Inspection/Safety Reports for facilities that undergo routine inspections, such as bridges and dams. <p><input type="checkbox"/> For emergency work, determine the conditions of the immediate threat that required the work to be performed.</p> <p><input type="checkbox"/> Confirm that the applicant is legally responsible for performing the work.</p> <ul style="list-style-type: none"> ▪ Is the applicant responsible for performing the emergency services provided? ▪ Does the applicant own the property? ▪ Is the applicant a lessee or lessor of the property? <p>- Obtain a copy of the lease</p>	

COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST				
In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
			<p>agreement to determine who is responsible for the repairs. Request legal review in the JFO.</p> <ul style="list-style-type: none"> ▪ For roads and bridges, determine whether the facility is under the authority of the Federal Highway Administration (FHWA). <ul style="list-style-type: none"> - Most State Departments of Transportation (DOT) have maps indicating whether a road is part of the Federal-Aid System. ▪ For levees and flood control channels, determine if the U.S. Army Corps of Engineers (USACE) or Natural Resources Conservation Service (NRCS) is responsible for the repairs. <ul style="list-style-type: none"> - The Federal agency may prepare a letter indicating their responsibility, or lack of responsibility. ▪ Is the facility under construction? <ul style="list-style-type: none"> - Obtain a copy of the construction contract to determine who is responsible for the repairs. Request legal review in the JFO. <p><input type="checkbox"/> For PNP facilities, determine the primary use of the facility. For facilities of mixed use, determine the percentage of the various uses.</p> <p><input type="checkbox"/> Determine when the damages occurred. Damages must occur within the incident period. If damages occurred outside the defined period, discuss the</p>	

COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST				
In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
			<p>circumstances with the PAC Crew Leader.</p> <p><input type="checkbox"/> Determine whether the facility was in active use at the time of the disaster. If not,</p> <ul style="list-style-type: none"> ▪ Was the facility only temporarily inoperative for repairs or remodeling? ▪ Was the facility temporarily unoccupied between tenants? ▪ Was future use by the applicant firmly established in an approved budget? ▪ Can the applicant clearly demonstrate that there was intent to begin use within a reasonable amount of time? <p><input type="checkbox"/> Request drawings, plans, or other documentation to illustrate the pre-disaster condition of the facility.</p> <ul style="list-style-type: none"> ▪ Drawings and plans will support the pre-disaster design of the facility for assessing the eligible scope of repair work. ▪ Determine the pre-disaster function of the facility—what was the facility being used as at the time of the disaster (school, warehouse, office)? ▪ Determine the pre-disaster capacity of the facility. 	
	Project Formulation	10-12	<p><input type="checkbox"/> Determine if the applicant wants to combine more than one damage site on one PW.</p> <ul style="list-style-type: none"> ▪ If the applicant is requesting an illogical grouping of sites, discuss this with the PAC Crew Leader before proceeding. 	<input type="checkbox"/>

COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
			<ul style="list-style-type: none"> ▪ Discuss a numbering system to be entered on the PW as the Project Number (PW Reference Number). <input type="checkbox"/> Methods for formulating projects: <ul style="list-style-type: none"> ▪ Type of damage ▪ System ▪ Jurisdiction ▪ Method of work ▪ Special Considerations/Complex <input type="checkbox"/> Multiple Sites: <ul style="list-style-type: none"> ▪ Projects less than \$1,000.00 are not eligible ▪ Buildings (Category E) projects ▪ Other projects: (Categories C, D, F) 	
CONDUCTING THE SITE VISIT	Documenting the Damage Site Conditions: Identifying Basic Project Conditions	13	<ul style="list-style-type: none"> <input type="checkbox"/> Upon arrival at the site, conduct an overall walkthrough visual inspection of the site and the surrounding area. <input type="checkbox"/> Differentiate between the physical damages you observe and those the applicant is requesting to be fixed. <input type="checkbox"/> Look for indicators of pre-disaster damage. <input type="checkbox"/> Look at the condition of the facility outside of the damaged location to assess the pre-disaster design and condition of the facility overall. For example, note any undamaged sections of roads, culverts, or slopes, etc. 	<input type="checkbox"/>

COLLECTING PROJECT INFORMATION CHECKLIST

In Support of Project Worksheet Preparation

Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
RECORDING PROJECT DETAILS	Documenting the Damage Site Conditions:	13-16	<input type="checkbox"/> Take measurements of damaged area and specific facility components.	<input type="checkbox"/>
			<input type="checkbox"/> Prepare detailed sketches .	
			<input type="checkbox"/> Determine the latitude and longitude at one or more locations at the facility.	
			<ul style="list-style-type: none"> Obtain the GPS reading and document the location where the reading was taken on a map. If the project consists of multiple sites with distinct addresses or locations, the latitude/longitude for each site should be recorded. For debris removal, provide the latitude/longitude for the debris disposal location(s). For emergency protective measures where the location has been identified as "County-Wide" or "City-Wide," identify a primary location. For lengths of roadway, select a location at the beginning or end of the roadway, or some other milestone. 	<input type="checkbox"/>
			<input type="checkbox"/> Photograph the site:	
			<ul style="list-style-type: none"> Overall site view Specific damages from various views and angles Work completed, if any Adjacent undamaged areas of similar structures Document number, location, and date of photographs on a 	

COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST				
In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
			site plan, and indicate angle taken from <input type="checkbox"/> Create and review FIRMette: <ul style="list-style-type: none"> ▪ Determine if the site is in a Special Flood Hazard Area. <input type="checkbox"/> Documentation: <ul style="list-style-type: none"> ▪ Provide as an attachment. <input type="checkbox"/> Reference in the text of the Damage Description and Dimensions.	
	Documenting the Damage Site Conditions: Identifying Damages	16-18	<input type="checkbox"/> Document the cause(s) of the damages. <ul style="list-style-type: none"> ▪ When did the damages occur? ▪ What disaster effect caused the damage? ▪ What type of disaster conditions resulted in an immediate threat? <input type="checkbox"/> Document the action. <ul style="list-style-type: none"> ▪ What did the disaster do? ▪ What happened to the facility/component? ▪ What was the result of the immediate threat? <input type="checkbox"/> Document the dimensions/quantities of the damage. <ul style="list-style-type: none"> ▪ What are the dimensions? ▪ How are Emergency Services quantified? <input type="checkbox"/> Identify the damaged facility and/or components. <ul style="list-style-type: none"> ▪ What is the facility? ▪ What are some examples of facilities/components? 	<input type="checkbox"/>

COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST				
In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
			<input type="checkbox"/> Document the impact. <ul style="list-style-type: none"> ▪ What is the impact? ▪ Who does it affect? 	
DEFINING THE SCOPE OF WORK	Defining the Scope of Work	18-19	<input type="checkbox"/> Determine the applicant's methodology for repairing the facility. <ul style="list-style-type: none"> ▪ Specific design standards? ▪ Engineering consultant? ▪ Engineering or technical reports? <input type="checkbox"/> Discuss how the work is to be performed. <ul style="list-style-type: none"> ▪ Force account or by contract? <input type="checkbox"/> Determine whether the applicant intends to restore the facility to its pre-disaster condition. If not, <ul style="list-style-type: none"> ▪ Does the applicant have a code or standard requiring a certain upgrade? ▪ Is the applicant considering relocating the facility? ▪ Does the applicant have a Hazard Mitigation Proposal for this project? 	<input type="checkbox"/>
			<ul style="list-style-type: none"> ▪ Is the facility damaged to the extent that the applicant is requesting replacement rather than repair? ▪ Is the applicant considering an Alternate or Improved Project? 	<input type="checkbox"/>

COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
SC	Special Considerations	20	<input type="checkbox"/> Are there any Special Considerations issues associated with the project? Use the Special Considerations Questions and collect pertinent information.	<input type="checkbox"/>
COLLECTING COST INFORMATION	Work Completed vs. Work to be Completed	20-21	<p>For <u>Completed Work</u>, collect:</p> <ul style="list-style-type: none"> <input type="checkbox"/> Contracts or contractor bids <input type="checkbox"/> Mutual aid agreements <input type="checkbox"/> Rental agreements <input type="checkbox"/> Receipts/Invoices <input type="checkbox"/> Time/equipment records (if applicable) <p>For <u>Work to be Completed</u>, collect:</p> <ul style="list-style-type: none"> <input type="checkbox"/> The applicant's cost information <input type="checkbox"/> Time/equipment records (if applicable) <input type="checkbox"/> Historical costs <input type="checkbox"/> Average costs for similar work in the area <input type="checkbox"/> Unit prices <p>Force Account Labor</p> <ul style="list-style-type: none"> <input type="checkbox"/> Request a list of all employees involved in the disaster work. <ul style="list-style-type: none"> ▪ Request name, job title, job function, the day the work was performed, work dates, hours worked, and rate of Regular Time and Overtime pay. 	




COLLECTING PROJECT INFORMATION

COLLECTING PROJECT INFORMATION CHECKLIST				
In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
			<input type="checkbox"/> Request a copy of the applicant's Overtime policy. Fringe Benefits <input type="checkbox"/> Verify an applicant's fringe benefit rates.	
	Force Account	21-22	<u>Force Account Material</u> <input type="checkbox"/> Materials generally include items taken from stock or purchased. <input type="checkbox"/> Materials claimed should include date and hours used, description of item, quantity, and unit cost. <input type="checkbox"/> Request receipts for purchases. <u>Force Account or Rented Equipment</u> <input type="checkbox"/> Ensure information for equipment includes type of equipment, size, and date (and/or hours) used. <input type="checkbox"/> Damage incurred to vehicles during search activities should first be submitted to the applicant's insurance carrier in order to prevent a duplication of benefits. If the vehicle affected is insured, a copy of the declaration page of the policy should be requested. <input type="checkbox"/> Receipts for cell phone use may be considered only for calls made relating to the disaster.	
	Unit Prices	23	<input type="checkbox"/> Identify the sources of unit prices: <ul style="list-style-type: none"> ▪ State or local data from previously completed projects ▪ Commercial estimating sources (such as R.S. Means) ▪ FEMA cost codes 	<input type="checkbox"/>
	Contracts	24	<input type="checkbox"/> Determine if the applicant has bid	<input type="checkbox"/>

COLLECTING PROJECT INFORMATION

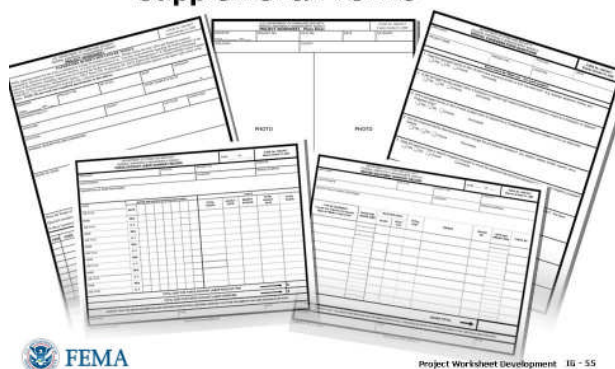
COLLECTING PROJECT INFORMATION CHECKLIST				
In Support of Project Worksheet Preparation				
Name of Reviewer:			Applicant:	
Name of Preparer:			PW No.	Date:
Section	Block	PW Guide Page(s)	Content	Comments
			the work. <ul style="list-style-type: none"> ▪ Review unit prices provided in contractor bids, if available. ▪ Bids must provide an itemization of unit prices in order to verify that the bid is for an eligible scope of work and to allow validation of the bid. ▪ Request a copy of the executed contract agreement. ▪ Request a copy of the invoice for work completed. 	
	Cost Estimating Format (CEF)	24-25	<input type="checkbox"/> Required if project is: <ul style="list-style-type: none"> ▪ Permanent work ▪ A large project ▪ 90% or less complete 	<input type="checkbox"/>
BEFORE LEAVING THE SITE	Before Leaving the Site	25	<input type="checkbox"/> Document all your observations before you leave the site. Don't wait until you return to the JFO or your hotel. Details will certainly be forgotten. <input type="checkbox"/> Walk the site one more time to ensure you did not miss any damages and that you have sufficiently documented the site conditions. <input type="checkbox"/> Be sure to ask the applicant any lingering questions you may have. <input type="checkbox"/> Summarize for the applicant any outstanding questions you have and confirm they are aware of any documentation or information that you still need.	<input type="checkbox"/>

COMPLETING THE PROJECT WORKSHEET

<div data-bbox="310 373 734 527"><h3>Completing the Project Worksheet</h3><h4>Section II</h4></div> <div data-bbox="198 674 310 714"> FEMA</div> <div data-bbox="592 693 776 707"><small>Project Worksheet Development II - 52</small></div>	<div data-bbox="818 245 985 275">References</div> <div data-bbox="818 289 1083 323"><ul style="list-style-type: none">• <i>PW Guide</i>, p. 27</div>				
<div data-bbox="310 848 659 882"><h3>Detail, Style, and Review</h3></div> <div data-bbox="282 917 649 940"><p>Detail and discussion should reflect complexity</p></div> <div data-bbox="339 974 477 995"><p>Style vs. Content</p></div> <div data-bbox="467 1029 568 1052"><p>Consistency</p></div> <div data-bbox="277 1089 667 1113"><p>Review own Project Worksheet before submission</p></div> <div data-bbox="240 1148 477 1171"><p>Be flexible and accommodating</p></div> <div data-bbox="198 1211 310 1251"> FEMA</div> <div data-bbox="592 1228 776 1243"><small>Project Worksheet Development II - 53</small></div>	<div data-bbox="818 781 985 810">References</div> <div data-bbox="818 825 1141 858"><ul style="list-style-type: none">• <i>PW Guide</i>, pp. 27-28</div>				
<div data-bbox="310 1386 612 1417"><h3>EMMIE versus NEMIS</h3></div> <table border="1" data-bbox="256 1440 727 1719"><thead><tr><th data-bbox="261 1446 488 1514">National Emergency Management Information System (NEMIS)</th><th data-bbox="488 1446 722 1514">Emergency Management Mission Integrated Environment (EMMIE)</th></tr></thead><tbody><tr><td data-bbox="261 1514 488 1713"><ul style="list-style-type: none">• Current computerized database system• Preparation and submittal of grant related documents in paper form (or on CD)• Input by Data Entry Staff at JFO</td><td data-bbox="488 1514 722 1713"><ul style="list-style-type: none">• New database, to be deployed in 2008• Web-based system to manage whole process (from Project Worksheet to managing funds)• Can be completed by applicant, Project Specialist, etc.</td></tr></tbody></table> <div data-bbox="198 1747 310 1787"> FEMA</div> <div data-bbox="592 1764 776 1778"><small>Project Worksheet Development II - 54</small></div>	National Emergency Management Information System (NEMIS)	Emergency Management Mission Integrated Environment (EMMIE)	<ul style="list-style-type: none">• Current computerized database system• Preparation and submittal of grant related documents in paper form (or on CD)• Input by Data Entry Staff at JFO	<ul style="list-style-type: none">• New database, to be deployed in 2008• Web-based system to manage whole process (from Project Worksheet to managing funds)• Can be completed by applicant, Project Specialist, etc.	<div data-bbox="818 1318 985 1348">References</div> <div data-bbox="818 1360 1083 1394"><ul style="list-style-type: none">• <i>PW Guide</i>, p. 28</div>
National Emergency Management Information System (NEMIS)	Emergency Management Mission Integrated Environment (EMMIE)				
<ul style="list-style-type: none">• Current computerized database system• Preparation and submittal of grant related documents in paper form (or on CD)• Input by Data Entry Staff at JFO	<ul style="list-style-type: none">• New database, to be deployed in 2008• Web-based system to manage whole process (from Project Worksheet to managing funds)• Can be completed by applicant, Project Specialist, etc.				

COMPLETING THE PROJECT WORKSHEET

Project Worksheet and Supplemental Forms



Project Worksheet Development III - 55

References

- *PW Guide* – Appendix B – FEMA Forms
- *PW Guide*, pp. 29-30

Basic Project Worksheet Information

Disaster	Project No.	PA ID No.	Date	Category
1111	JU-C01	111-99111-00	4/12/07	C
Damaged Facility	Location	County	Bird	Longitude
Sidewalk	City of Juna	12345	25.22222	-132.11111
Applicant	Work Complete as of			
404 Lincoln Road, Juna, State				



Project Worksheet Development III - 56

References

- *PW Guide*, pp. 30-40

Project Description



Project Worksheet Development III - 57

COMPLETING THE PROJECT WORKSHEET

Damage Description and Dimensions



References

- *PW Guide*, pp. 40-48

Describe the Cause of Damage

- Document when the damages occurred
- Identify the disaster effect that caused the damage
 - Wind vs. Flood
- Record type of damage conditions resulted in an immediate threat



Project Worksheet Development IS - 59

References

- *PW Guide*, pp. 41-42

Example: Describe the Cause/Action of Damage

Wind and wind driven debris from Tropical Storm Jane caused damage to the city's electrical distribution facilities...

LOCATION		LATITUDE	LONGITUDE
DAMAGE DESCRIPTION AND DIMENSIONS			
SCOPE OF WORK			

In preparation for the river flooding forecasted by the USACE...



Project Worksheet Development IS - 60

References

- *PW Guide*, pp. 41-42

COMPLETING THE PROJECT WORKSHEET

Demonstrate Applicant Responsibility

- Indicate whether the applicant is responsible for performing the emergency services
- Document if the facility is:
 - Owned by the applicant
 - Leased
 - The responsibility of another Federal agency
 - Under construction



References

- *PW Guide*, p. 42

Example: Demonstrate Applicant Responsibility

TABLE NO.	LOCATIONS
LOCATION	
DAMAGE DESCRIPTION AND DIMENSIONS	

Smith Road is not a Federal-aid road and is, therefore, eligible for FEMA funding

The County DPW leases storage space from Miller Storage Co. for surplus materials. The lease agreement, attached, demonstrates the County is responsible for its contents in the event of flooding.



Project Worksheet Development IS - 6.2

References

- *PW Guide*, p. 42

Describe Pre-Disaster Condition

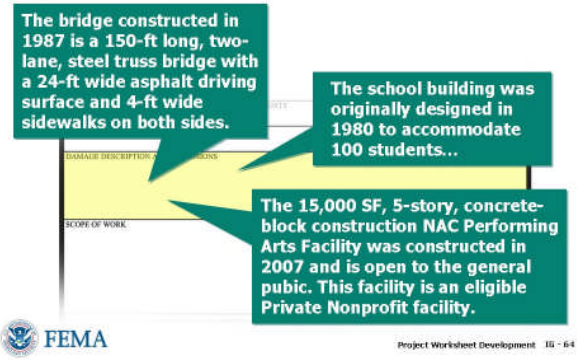

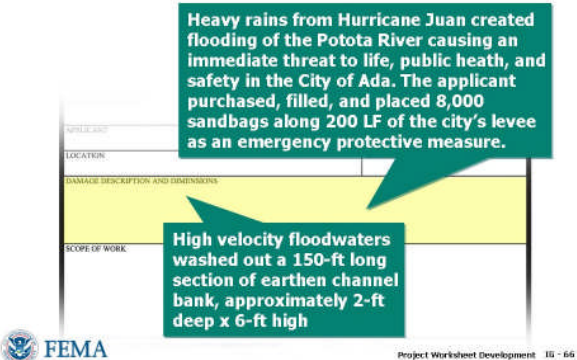


Project Worksheet Development IS - 6.3

References

- *PW Guide*, pp. 42-44

COMPLETING THE PROJECT WORKSHEET

<p>Example: Describe Pre-Disaster Condition</p> 	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 42-44
<p>Quantify Disaster-Related Damages/ Emergency Services Provided</p> <ul style="list-style-type: none"> ▪ Describe general extent of damage ▪ Provide specific dimensions of each damaged element ▪ Describe emergency measure taken as it relates to the "immediate threat" ▪ If some work is complete, describe how determined to be disaster related ▪ Discuss any ineligible damages 	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 44
<p>Example: Quantify Disaster-Related Damages/Emergency Services Provided</p> 	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 44

COMPLETING THE PROJECT WORKSHEET

Identify Latitude and Longitude

- Describe where Latitude and Longitude were recorded
- Jurisdiction wide
 - GPS recorded at City Hall
 - Lat/Long recorded at the County Courthouse
- Multiple sites
 - Primary location recorded at the Department of Public Works
 - 17 sites damaged, Site 1 used for primary location



Project Worksheet Development IS - 67

References

- *PW Guide*, p. 45

Example: Identify Latitude and Longitude

Latitude and Longitude recorded from Mile 0 of County Road 4. (7 sites total, see continuation sheet)

LOCATION	SURVEY	LATITUDE	LONGITUDE
DAMAGE DESCRIPTION AND COMMENTS			
SCENE OF WORK			

GPS reading recorded at the County Administration Building



Project Worksheet Development IS - 68

References

- *PW Guide*, p. 45

Documentation to Support Disaster-Damages

- Calculation Sheets
- Lease agreements
- Maintenance Records
- Inspection/Safety Reports
- Site Location Map
- Latitude/Longitude
- Applicant-provided list of damages
- FIRM
- Photographs
- Drawings, sketches of pre-disaster design
- Drawings, sketches of disaster damages





Project Worksheet Development IS - 69

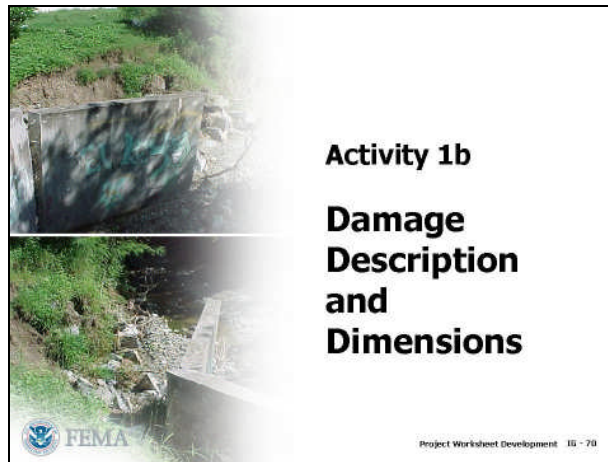
References

- *PW Guide*, pp. 45-48

COMPLETING THE PROJECT WORKSHEET

 <p>Activity 1b Damage Description and Dimensions</p> <p> FEMA</p> <p><small>Project Worksheet Development IS-70</small></p>	<p>References</p> <ul style="list-style-type: none">• Activity 4.1b description is located on the following pages.• Blank forms follow the activity description (Project Worksheet, Continuation Sheets, Special Considerations)
---	--

Activity 4.1b



Purpose of Activity

- To collect project information and prepare complete, concise Project Worksheets using the techniques and knowledge gained from the information presented in this unit.

Group Activity Setting

- You completed the site visit on July 7, 2007.
- Your PAC Crew Leader has requested to see a copy of your Project Worksheet by the end of the day.

Overview of Activities

- This activity involves full class participation.
- All participants are responsible for documenting the activity solutions in the data sheets provided in the *Student Manual*.
- This activity is both interactive and progressive. Each piece builds off the previous section and the answers may vary with each instructor and group of participants.
- Anticipate participants will identify other items not included in the solutions. Be prepared to comment on the validity of those items.
- Part A: Collecting Project Information
- **Part B: Damage Description and Dimensions**
- Part C: Scope of Work
- Part D: Cost and Special Considerations
- Class Activity Review

COMPLETING THE PROJECT WORKSHEET

Part B – Damage Description and Dimensions (15 min)

A blank Project Worksheet, Continuation Sheet, Cost Continuation Sheet, and a Special Considerations form will be provided.

Evaluate the information collected in Part A and prepare the Damage Description and Dimensions section of the Project Worksheet.

COMPLETING THE PROJECT WORKSHEET

<p style="text-align: center;">Scope of Work</p> <p style="text-align: center;">Project Worksheet Development II - 71</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 48-57
<p style="text-align: center;">Define Scope to Restore to Pre-Disaster Condition</p> <ul style="list-style-type: none"> • All project funding relates to the work necessary to restore to pre-disaster condition • Scope items must relate directly to damaged items • Describe design assumptions and methods of repair • Describe work in quantifiable and descriptive terms • Provide all calculations <p style="text-align: center;">Project Worksheet Development II - 72</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 49-50
<p style="text-align: center;">Example: Define Scope to Restore to Pre-Disaster Condition</p> <p style="text-align: center;">Project Worksheet Development II - 73</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 49-50

COMPLETING THE PROJECT WORKSHEET

Separate "Work Completed" from "Work to be Completed"

- Scope and associated costs must be separated
- Provide complete details of work for each condition
- Support how work completed was determined to be necessary

SCOPE OF WORK:

Work Completed:

* Repair to 2000 Ford Crown Victoria (VIN #2FAFP71N02Y328418)

Work to be Completed:

* Repair 2004 Ford Crown Victoria (VIN #2FAFP71N46Y33388)

* Repair 2000 Ford Explorer (VIN #2FMZL8SP4Y0861843)



Project Worksheet Development IS - 74

References

- *PW Guide*, p. 50

Example: Separate "Work Completed" from "Work to be Completed"

SCOPE OF WORK:

Work Completed

- The applicant hired a contractor to remove four 52-inch diameter trees that had fallen on the facility, and placed plywood barriers over the exterior of the windows. Total cost was \$4,500.

Work to be Completed

- Main Floor Library:
- Steel casement windows: Remove and replace two sets of 2 ft x 4 ft steel casement windows and frames



Project Worksheet Development IS - 75

References

- *PW Guide*, p. 50

Define Basis for Any Changes in Pre-Disaster Condition

Replacement Projects (50% Rule)	Codes and Standards	Alternate Projects	Improved Projects	Relocation Projects	Hazard Mitigation
---------------------------------	---------------------	--------------------	-------------------	---------------------	-------------------

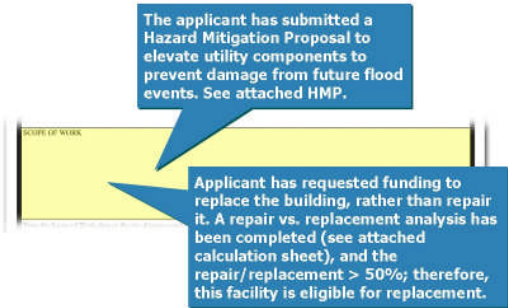



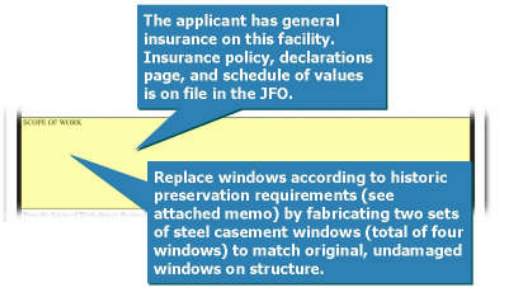



Project Worksheet Development IS - 76





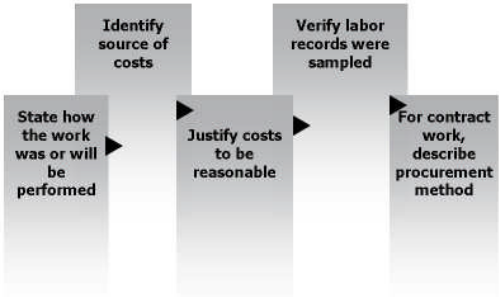

References

- *PW Guide*, pp. 50-51





COMPLETING THE PROJECT WORKSHEET

<p>Example: Define Basis for Any Changes in Pre-Disaster Condition</p>  <p> FEMA</p> <p><small>Project Worksheet Development IS - 77</small></p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 50-51
<p>Describe Any Special Considerations</p>  <ul style="list-style-type: none"> ▪ Identify and describe – DO NOT resolve <ul style="list-style-type: none"> ▪ Insurance ▪ Hazard Mitigation ▪ Environmental Compliance ▪ Floodplain Management ▪ Historic Preservation Compliance <p> FEMA</p> <p><small>Project Worksheet Development IS - 78</small></p>	<p>References</p> <p><i>PW Guide</i>, p. 51</p>
<p>Example: Describe Any Special Considerations</p>  <p> FEMA</p> <p><small>Project Worksheet Development IS - 79</small></p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 51

COMPLETING THE PROJECT WORKSHEET

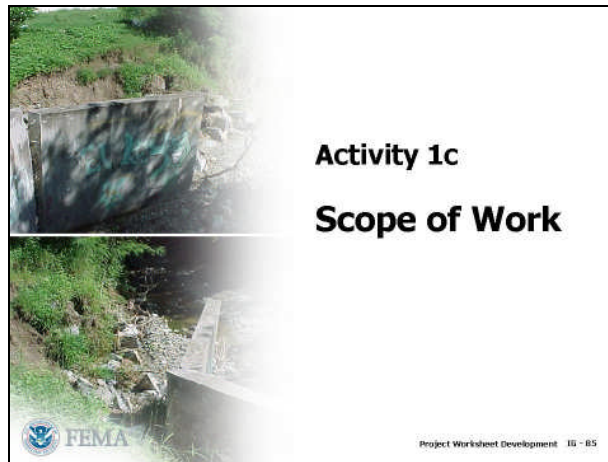
<p>Document Ineligible Work</p> <ul style="list-style-type: none"> ▪ Provide a brief description of work ▪ Provide cost estimate if provided by applicant ▪ Document why the applicant thinks it is eligible ▪ Identify why you think it is not eligible <ul style="list-style-type: none"> ▪ Support your recommendation using the regulations  <p> FEMA</p> <p><small>Project Worksheet Development IS - 80</small></p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 51-52
<p>Example: Document Ineligible Work</p> <p>Applicant requested funding for riprap slope protection along the earthen channel bank asserting that the work was required by local code; however, no supporting documents have been provided to support the code requirement.</p>  <p>In accordance with 44CFR 206.226(d), applicable standards requiring this work must be formally adopted and implemented on or before the declaration date.</p> <p>As indicated by the applicant, the city is in the "process" of formally adopting such standards. Therefore, this project is not eligible for a Codes & Standards upgrade.</p> <p> FEMA</p> <p><small>Project Worksheet Development IS - 81</small></p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 51-52
<p>Describe Basis for Costs</p>  <p>State how the work was or will be performed</p> <p>Identify source of costs</p> <p>Justify costs to be reasonable</p> <p>Verify labor records were sampled</p> <p>For contract work, describe procurement method</p> <p> FEMA</p> <p><small>Project Worksheet Development IS - 82</small></p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 52

COMPLETING THE PROJECT WORKSHEET

<p>Example: Describe Basis for Costs</p> <div> <p>Work to be Completed:</p> <ul style="list-style-type: none"> • Work to be performed by contract. Bids received. • Cost estimates based on FEMA Cost Codes. • Cost estimated using Cost Estimating Format (CEF). R.S. Means used for Unit Prices. See attached CEF. • Work to be performed by force account. </div> <div> <p>Work Completed:</p> <ul style="list-style-type: none"> • Costs based on contractor invoices. Contractor selected based on competitive bid process. 40% base costs validated. • 50% of applicant's force account records verified. Records were found to be complete and accurate. </div> <p> <small>Project Worksheet Development IS - B3</small></p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, p. 52
<p>Documentation to Support Scope of Work</p> <ul style="list-style-type: none"> • Photographs of completed work • Engineering Reports • Specifications • Drawings, sketches, calculations • Code or Standard • Insurance Policy • Hazard Mitigation Proposal • Compliance Documents • Contacts/bids • Mutual Aid Agreements • Rental Agreements • Receipts • Time/Equipment Records <p> <small>Project Worksheet Development IS - B4</small></p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 52-57
<p></p> <p>Activity 1c Scope of Work</p> <p> <small>Project Worksheet Development IS - B5</small></p>	<p>References</p> <ul style="list-style-type: none"> • Activity 4.1c description is located on the following page. • Continue on forms provided in Activity 4.1b (Project Worksheet, Continuation Sheets, Special Considerations)

COMPLETING THE PROJECT WORKSHEET

Activity 4.1c



Purpose of Activity

- To collect project information and prepare complete, concise Project Worksheets using the techniques and knowledge gained from the information presented in this unit.

Group Activity Setting

- You completed the site visit on July 7, 2007.
- Your PAC Crew Leader has requested to see a copy of your Project Worksheet by the end of the day.

Overview of Activities

- This activity involves full class participation.
- All participants are responsible for documenting the activity solutions in the data sheets provided in the *Student Manual*.
- This activity is both interactive and progressive. Each piece builds off the previous section and the answers may vary with each instructor and group of participants.
- Anticipate participants will identify other items not included in the solutions. Be prepared to comment on the validity of those items.
- Part A: Collecting Project Information
- Part B: Damage Description and Dimensions
- **Part C: Scope of Work**
- Part D: Cost and Special Considerations
- Class Activity Review

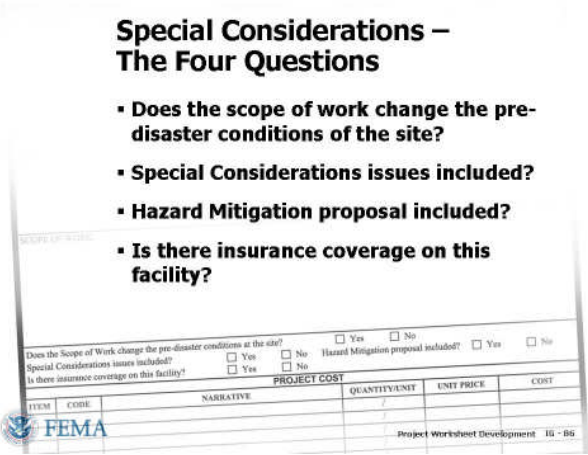
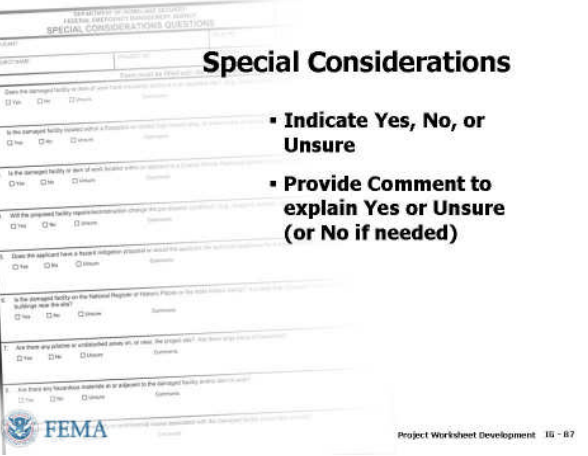
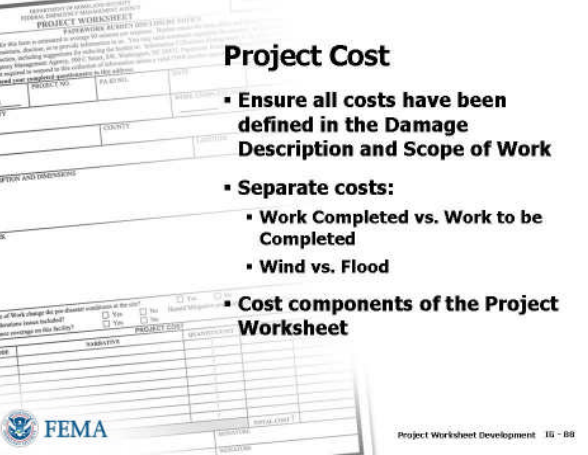
COMPLETING THE PROJECT WORKSHEET

Part C – Scope of Work (15 min)

Continue with the same Project Worksheet, Continuation Sheets, and Special Considerations forms from Part B.

Evaluate the information collected in Part A and the Damage Description and Dimensions prepared in Part B and prepare the Scope of Work section of the Project Worksheet.

COMPLETING THE PROJECT WORKSHEET

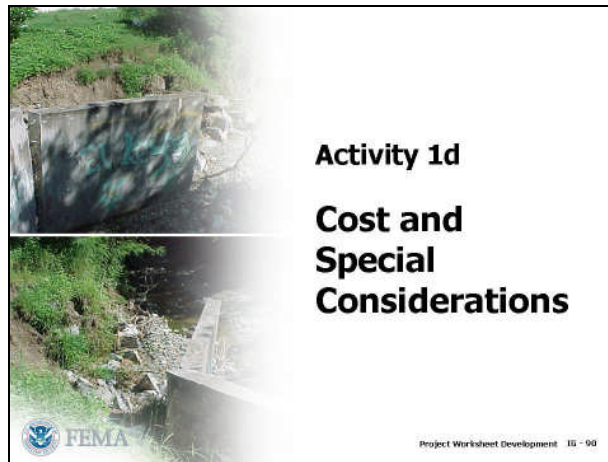
 <p>Special Considerations – The Four Questions</p> <ul style="list-style-type: none"> Does the scope of work change the pre-disaster conditions of the site? Special Considerations issues included? Hazard Mitigation proposal included? Is there insurance coverage on this facility? 	<p>References</p> <ul style="list-style-type: none"> <i>PW Guide</i>, pp. 57-58
 <p>Special Considerations</p> <ul style="list-style-type: none"> Indicate Yes, No, or Unsure Provide Comment to explain Yes or Unsure (or No if needed) 	<p>References</p> <ul style="list-style-type: none"> Special Considerations Questions, FEMA Form 90-120 <i>PW Guide</i>, Section III, pp. 65-81
 <p>Project Cost</p> <ul style="list-style-type: none"> Ensure all costs have been defined in the Damage Description and Scope of Work Separate costs: <ul style="list-style-type: none"> Work Completed vs. Work to be Completed Wind vs. Flood Cost components of the Project Worksheet 	<p>References</p> <ul style="list-style-type: none"> <i>PW Guide</i>, pp. 52-57

- *PW Guide*, pp. 58-61



- Activity 4.1d description is located on the following page.
- Continue on forms provided in Activity 4.1b (Project Worksheet, Continuation Sheets, Special Considerations)

Activity 4.1d



Purpose of Activity

- To collect project information and prepare complete, concise Project Worksheets using the techniques and knowledge gained from the information presented in this unit.

Group Activity Setting

- You completed the site visit on July 7, 2007.
- Your PAC Crew Leader has requested to see a copy of your Project Worksheet by the end of the day.

Overview of Activities

- This activity involves full class participation.
- All participants are responsible for documenting the activity solutions in the data sheets provided in the *Student Manual*.
- This activity is both interactive and progressive. Each piece builds off the previous section and the answers may vary with each instructor and group of participants.
- Anticipate participants will identify other items not included in the solutions. Be prepared to comment on the validity of those items.
- Part A: Collecting Project Information
- Part B: Damage Description and Dimensions
- Part C: Scope of Work
- **Part D: Cost and Special Considerations**
- **Class Activity Review**

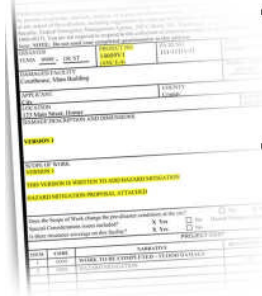




COMPLETING THE PROJECT WORKSHEET

Part D – Cost and Special Considerations (10 min)

Continue with the same Project Worksheet, Continuation Sheets, and Special Considerations forms from Parts B and C.

Evaluate the information collected in Part A and the Damage Description and Dimensions prepared in Part B and Scope of Work prepared in Part C and develop the Project Cost section of the Project Worksheet and complete the Special Considerations questions.

COMPLETING THE PROJECT WORKSHEET

<p>Versions</p>  <ul style="list-style-type: none"> ▪ Written to modify: <ul style="list-style-type: none"> ▪ Scope of Work ▪ Period of Performance (time extension) ▪ Cost ▪ Versions <ul style="list-style-type: none"> ▪ Basic information remains the same ▪ Damage Description does not change ▪ Indicate the version number ▪ Include only relative costs <p> Project Worksheet Development II - 91</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 51-62
<p>Before you submit your Project Worksheet – ask yourself</p> <ul style="list-style-type: none"> ▪ Are all blocks of the Project Worksheet complete? ▪ Are the Damage Description and Dimension, Scope of Work, and project cost consistent? ▪ Is documentation referenced? ▪ Are sufficient photos provided? ▪ Would a sketch enhance the Project Worksheet ? ▪ Could someone read this in the future and understand the project? <p> Project Worksheet Development II - 92</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i>, pp. 62-63
<p>Sample Project Worksheets</p>  <p> Project Worksheet Development II - 93</p>	<p>References</p> <ul style="list-style-type: none"> • <i>PW Guide</i> – Appendix H

COMPLETING THE PROJECT WORKSHEET



Class Discussion Damage Description and Dimensions/Scope of Work



Project Worksheet Development IS - 94

References

- Activity 4.2 will be complete as a class. Engage in group discussion to determine what is wrong about the following Damage Description and Dimensions and Scopes of Work.
- Provide suggestions as to what would make them better.

Class Discussion Damage Description and Dimensions/Scope of Work (Cont'd)

LOCATION	LATITUDE	LONGITUDE
DAMAGE DESCRIPTION AND DIMENSIONS <i>A portion of a retaining wall located along County Route 5 at mile marker 36 collapsed.</i>		
SCOPE OF WORK <i>Work to repair the wall is not eligible because the disaster did not cause the damage.</i>		
Does the Scope of Work change the pre-disaster conditions at the site? <input type="checkbox"/> Yes <input type="checkbox"/> No		
Special Considerations issues included? <input type="checkbox"/> Yes <input type="checkbox"/> No		
Is there insurance coverage on this facility? <input type="checkbox"/> Yes <input type="checkbox"/> No		
Hazard Mitigation proposal included? <input type="checkbox"/> Yes <input type="checkbox"/> No		
PROJECT COST		
TYPE 1	TYPE 2	TYPE 3
NARRATION	DEVELOPMENT	UNIT PRICE
COST		



Project Worksheet Development IS - 95

References

- What is wrong about this Damage Description and Dimensions and Scopes of Work?
- Provide suggestions as to what would make it better.

Class Discussion Damage Description and Dimensions/Scope of Work (Cont'd)

LOCATION	LATITUDE	LONGITUDE
DAMAGE DESCRIPTION AND DIMENSIONS <i>Debris littered runoff clogged the John's Creek culvert on Walker Road causing storm water to sheet across the road and eroded the embankment at the culvert outlet.</i>		
SCOPE OF WORK <i>Excavate loose material and place slope protection (riprap) near culvert outlet.</i>		
Does the Scope of Work change the pre-disaster conditions at the site? <input type="checkbox"/> Yes <input type="checkbox"/> No		
Special Considerations issues included? <input type="checkbox"/> Yes <input type="checkbox"/> No		
Is there insurance coverage on this facility? <input type="checkbox"/> Yes <input type="checkbox"/> No		
Hazard Mitigation proposal included? <input type="checkbox"/> Yes <input type="checkbox"/> No		
PROJECT COST		
TYPE 1	TYPE 2	TYPE 3
NARRATION	DEVELOPMENT	UNIT PRICE
COST		



Project Worksheet Development IS - 96

References


- What is wrong about this Damage Description and Dimensions and Scopes of Work?
- Provide suggestions as to what would make it better.

COMPLETING THE PROJECT WORKSHEET

Class Discussion

Damage Description and Dimensions/Scope of Work (Cont'd)

LOCATION		LATITUDE		LONGITUDE	
DAMAGE DESCRIPTION AND DIMENSIONS <i>The facility was damaged.</i>					
SCOPE OF WORK <i>Repair incident related damage to pre-disaster condition by utilizing force account labor and equipment to replace lost grouted riprap at the subject facility.</i>					
Does the Scope of Work change the pre-disaster conditions at the site?		<input type="checkbox"/> Yes <input type="checkbox"/> No		Hazard Mitigation proposal included?	
Special Considerations issues included?		<input type="checkbox"/> Yes <input type="checkbox"/> No		<input type="checkbox"/> Yes <input type="checkbox"/> No	
Is there insurance coverage on this facility?		<input type="checkbox"/> Yes <input type="checkbox"/> No			
PROJECT COST					
TOTAL		ESTIMATE		COST	

 Project Worksheet Development IS - 97


References

- What is wrong about this Damage Description and Dimensions and Scopes of Work?
- Provide suggestions as to what would make it better.

Class Discussion

Damage Description and Dimensions/Scope of Work (Cont'd)

LOCATION		LATITUDE		LONGITUDE	
DAMAGE DESCRIPTION AND DIMENSIONS <i>Floodwaters filled with debris damaged the trash rack at Camino dam, allowing trees and limbs into the intake. Debris traveled to the powerhouse where it entered and damaged the turbine.</i>					
SCOPE OF WORK <i>The applicant repaired the damage with force account and contract labor.</i>					
Does the Scope of Work change the pre-disaster conditions at the site?		<input type="checkbox"/> Yes <input type="checkbox"/> No		Hazard Mitigation proposal included?	
Special Considerations issues included?		<input type="checkbox"/> Yes <input type="checkbox"/> No		<input type="checkbox"/> Yes <input type="checkbox"/> No	
Is there insurance coverage on this facility?		<input type="checkbox"/> Yes <input type="checkbox"/> No			
PROJECT COST					
TOTAL		ESTIMATE		COST	

 Project Worksheet Development IS - 98


References

- What is wrong about this Damage Description and Dimensions and Scopes of Work?
- Provide suggestions as to what would make it better.

Class Discussion

Damage Description and Dimensions/Scope of Work (Cont'd)

LOCATION		LATITUDE		LONGITUDE	
DAMAGE DESCRIPTION AND DIMENSIONS <i>Hurricane Nancy caused extensive damage and displacement of medical services in the City of Columbia and surrounding areas.</i>					
SCOPE OF WORK <i>Provide meals and supplies during Hurricane Nancy. The hospital provided services to 37 evacuees for a total of 40 hospital days. Estimated cost per patient is based on a 2004 Medicare Cost Report at \$522.15. It is recommended that the applicant be reimbursed in the amount of \$19,319.55, which is 37 patients times \$522.15.</i>					
Does the Scope of Work change the pre-disaster conditions at the site?		<input type="checkbox"/> Yes <input type="checkbox"/> No		Hazard Mitigation proposal included?	
Special Considerations issues included?		<input type="checkbox"/> Yes <input type="checkbox"/> No		<input type="checkbox"/> Yes <input type="checkbox"/> No	
Is there insurance coverage on this facility?		<input type="checkbox"/> Yes <input type="checkbox"/> No			
PROJECT COST					
TOTAL		ESTIMATE		COST	

 Project Worksheet Development IS - 99


References

- What is wrong about this Damage Description and Dimensions and Scopes of Work?
- Provide suggestions as to what would make it better.

COMPLETING THE PROJECT WORKSHEET

Class Discussion

Damage Description and Dimensions/Scope of Work (Cont'd)


LOCATION		LATITUDE		LONGITUDE	
DAMAGE DESCRIPTION AND DIMENSIONS					
<i>A pipe was damaged by the storm.</i>					
SCOPE OF WORK					
<i>Relocate 100 LF of the 10-inch ductile iron intake pipe at the Arroyo Simi water quality control plant.</i>					
Does the Scope of Work change the pre-disaster conditions at the site? <input type="checkbox"/> Yes <input type="checkbox"/> No Special Considerations issues included? <input type="checkbox"/> Yes <input type="checkbox"/> No Hazard Mitigation proposal included? <input type="checkbox"/> Yes <input type="checkbox"/> No Is there insurance coverage on this facility? <input type="checkbox"/> Yes <input type="checkbox"/> No					
PROJECT COST					
ITEM	QTY	UNIT	DESCRIPTION	UNIT PRICE	TOTAL
 Project Worksheet Development 10 - 100					

References

- What is wrong about this Damage Description and Dimensions and Scopes of Work?
- Provide suggestions as to what would make it better.

Class Discussion

Damage Description and Dimensions/Scope of Work (Cont'd)

LOCATION		LATITUDE		LONGITUDE	
DAMAGE DESCRIPTION AND DIMENSIONS					
<i>The storm caused debris.</i>					
SCOPE OF WORK					
<i>Remove 2-3 feet of flood debris and mud county-wide.</i>					
Does the Scope of Work change the pre-disaster conditions at the site? <input type="checkbox"/> Yes <input type="checkbox"/> No Special Considerations issues included? <input type="checkbox"/> Yes <input type="checkbox"/> No Hazard Mitigation proposal included? <input type="checkbox"/> Yes <input type="checkbox"/> No Is there insurance coverage on this facility? <input type="checkbox"/> Yes <input type="checkbox"/> No					
PROJECT COST					
ITEM	QTY	UNIT	DESCRIPTION	UNIT PRICE	TOTAL
 Project Worksheet Development 10 - 101					

Activity 2

Project Worksheet Preparation



Project Worksheet Development 102

References

- Project Worksheet Preparation Activity scenario can be found on the following pages.
- Blank Project Worksheet forms including Continuation Sheets and a Special Considerations form are included on the following pages.

COMPLETING THE PROJECT WORKSHEET

Activity 2 Project Worksheet Preparation



Project Worksheet Development 103

COMPLETING THE PROJECT WORKSHEET

Activity 2: Project Worksheet Preparation

Activity 2 Project Worksheet Preparation



Project Worksheet Development 103

-
- The purpose of this activity is to develop complete and accurate Project Worksheets using the techniques and knowledge presented in this unit. Remember, the intent is to focus on documenting project information rather than eligibility issues.
 - Each participant will independently evaluate the given scenario and complete the appropriate sections of the Project Worksheet—primarily Damage Description and Dimensions, Scope of Work, Project Cost and Special Considerations along with any pertinent attachments.
 - Each participant must complete the appropriate provided forms.
 - Participants should refer to the *PW Guide* for guidance in preparing the Project Worksheet.
 - After participants complete the Project Worksheets, the instructor will lead a group discussion to review.
 - Instructors will be available for any questions.

COMPLETING THE PROJECT WORKSHEET

Scenario

Disaster: FEMA-5002-DR-KY

PA ID: 000-U9A30-00

Date: June 19, 2007

Project No. A-2-C



The City of Maryville is located at the three forks of the Kentucky River in Daly County, Kentucky. Severe storms, tornadoes, flooding, and mudslides that began on May 26, 2007 affected the entire State of Kentucky. In Daly County, up to 6 inches of rains in the Appalachian Mountains caused washouts downstream due to high flow velocities. Numerous culverts that provide stream crossings for Maryville streets were completely washed out.

Site is located in an "AE" zone of the 100-year floodplain. See FIRM Map No. 48029C0428 F.

On June 19, 2007, a site visit was completed where Morris Street crosses Willow Creek (37.57245, -83.70842). At this location, a 36-inch dia. by 30-foot long CMP culvert with 6-foot by 6-foot concrete headwalls on each end, and roadway section approximately 24 ft. wide and 40 ft. long, were completely washed out. The roadway is 24 ft. wide, with 4-inch thick asphalt, underlain by 6 inches of aggregate base. Six feet of fill material surrounds the pipe.

The washed out material (broken asphalt, aggregate, backfill, CMP pipe and concrete) has been removed from the stream and funded under PW-27.

The Applicant is interested in possible Hazard Mitigation opportunities and has requested that a Hazard Mitigation Technical Specialist visit the site.

COMPLETING THE PROJECT WORKSHEET

The City of Maryville Public Works Department set up a detour so traffic would be redirected, which will be written up on another Project Worksheet.

At the time of the site visit on June 8, 2007, the work was roughly 70% complete.

The following work was completed by Joe's Restoration Company. Joe's Restoration is on the They applicant provided the following itemized invoice to restore the stream crossing to its pre-disaster condition:

1. Furnish and install a 36-inch by 30-foot long CMP. (CMP 36" = $\$125 / \text{LF} \times 30 \text{ ft.} = \$3,750$).
2. Replace two 6-foot by 6-foot concrete headwalls. (Concrete Headwall = $\$50 / \text{SF} \times 36 \text{ SF} \times 2 = \$3,600$).
3. Replace roadway embankment with granular backfill ($\$15/\text{CY}$): 24-ft wide x 40-ft long x 6-ft high (5,760 CF), less area of pipe under roadway [36-inch diameter x 24-ft long (170 CF)] = $5,590 \text{ CF} / 27 = 207 \text{ CY} \times \$15 = \$3,105$.

Total Cost = \$10,455.00

The following work still need to be completed in order to restore the stream crossing to its pre-disaster condition:

1. Replace aggregate base 40 ft. x 24 ft. x 6 in. = $480 \text{ CF} / 27 = 18 \text{ CY}$. Cost Code 3091, Aggregate Base Course, $\$19.50 \text{ per CY} \times 18 \text{ CY} = \351.00 .
2. Replace asphalt with 4-inch thick bituminous cold patch 24 ft. x 10 ft. ($240 \text{ SF} / 9 = 27 \text{ SY}$) Cost Code 3100, Bituminous Cold Patch, $\$5.30 \text{ per SY per inch} \times 27 \text{ SY} = \572.40 .

The City of Maryville Department of Public Works will complete the remaining work at this site. The Director of Public Works agrees that the above costs are accurate estimates to complete the work with the City's own forces.

COMPLETING THE PROJECT WORKSHEET

The Project Worksheet ...

...Tells a story

What was there before the disaster?
Basic Project Worksheet Info

What did the disaster do to the facility?
Damage Description

What is necessary to fix the facility?
Scope of Work

How will the facility be restored?
Scope of Work

Are there any Special Considerations?
4 Questions

How much will it cost?
Cost

Project Worksheet Development 10 - 104

Review Relationship between Project Specialists and the Project Worksheet



Project Worksheet Development 10 - 105

Example: Demonstrate Applicant Responsibility



Project Worksheet Development 10 - 62

COMPLETING THE PROJECT WORKSHEET



Project Worksheet Development

Questions?

References

- FEMA Field Course Evaluation Form