

2008 State Damage Prevention Program Grants Progress Report
Funding Opportunity Number: DTPH56-08-SN-0001
CFDA Number: 20.720

Award Number: DTPH56-08-G-PHPS15

Project Title: NH State Damage Prevention Program

Date Submitted: Dec 11, 2008

Submitted by: Randall S. Knepper, Jim Brennan NH Public Utilities Commission

Specific Objective(s) of the Agreement

Under this grant award New Public Utilities Commission (NHPUC) will design and implement a computer based system that tracks, measures, analyzes and reports the overall effectiveness of Damage Prevention Program

Workscope

Under the terms of this agreement, the NH PUC will address the following elements listed in 49 USC §60134 through the actions it has specified in its Application.

- *Element (4):* Participation by operators, excavators, and other stakeholders in the development and implementation of effective employee training programs to ensure that operators, the onecall center, the enforcing agency, and the excavators have partnered to design and implement training for the employees of operators, excavators, and locators.

Accomplishments for this period (Item 1 under Agreement Section 9.01 Progress Report: “A comparison of actual accomplishments to the objectives established for the period.”)

The project didn't gain momentum until September 2008. The period from September through November 30, 2008 was characterized by a fairly large and cumbersome administrative processes at the state level.

1. Develop Scope of Work for Project for RFP
2. Research and Contact Vendors for applicable Products in Marketplace
3. Develop and Approve Vendors List for RFQ/RFP
4. Prepare Document for review and request justification to NH Office of Information Technology Director
5. Prepare Grant Awards for signature of Governor and Executive Council Approval
6. Review Proposals, Interview Companies, and Select Proposals for Consideration
7. Assign Contracts Review Insurance requirements, Certifications with State of New Hampshire
8. Contract Award and Execution

This portion of the project took approximately 200 hours of preparation and multiple meetings and was not included in the original estimate for the PHMSA proposal. This approximate of costs for this portion alone was in excess of \$30,000 of costs incurred by the NH PUC.

Final Vendors selected Accent on Systems, Wintellect LLC, Itek Solutions, Inc

While this process was underway, a parallel progression was being made on the planning side

The project is broken down into 6 main elements

1. Business and Technical Planning Requirements
2. Databases
3. Business and Data Tier Application
4. User Interface Systems
5. Security
6. Data Loading

The original 6 elements are the same elements identified in the original grant application. All of the elements showed some progression except for element 5 security in which no advancement had been made. A summary and detail pdf of the project is included which shows which elements and sub elements progress has been advanced.

It quickly became apparent that the Feb 28, 2009 deadline would need to be extended another 60 days because of the administrative process which took 90 days and was originally anticipated to only take 14 days or less.

Meetings were made with the One Call Operator to discuss how data could be exchanged. It was determined that the excavator ID assigned by the One Call Operator could be used to link the Excavators contained in the PUC databases of Damages to the new application of training. Issues of discussion concerned the identification of the individual at the company that received training as opposed to the company had 10 out of 12 employees trained. Using OQ as a model it was decided that individual training statistics with portability would be the preferred path. This complicates the security end and some of the data elements. Initial data elements were chosen

Research was made into various types of trainings for excavators that are given on a regional basis. The training programs were characterized so as to be represented in database. (hours, course elements. National type trainings shall be explored during discussions at CGA meetings and annual conference as well as contacting training companies individually.

Quantifiable Metrics/Measures of Effectiveness (Item 2 under Agreement Section 9.01 Project Report: “Where the output of the project can be quantified, a computation of the cost per unit of output.”)

Overall 18 of the 47 identified project sub elements have had progress on or are substantially completed. They are listed on the attached Project Detail. From an overall perspective this represents 38% but there are no elements in which have been totally completed. The break down is as follows:

Business and Technical Planning Requirements	2 of 12 sub elements (16% substantially completed)
Databases	5 of 13 sub elements (38% substantially completed)
Business and Data Tier Application	4 of 7 sub elements (57% substantially completed)
User Interface Systems	4 of 6 sub elements (66% substantially completed)
Security	0 of 4 sub elements (0 % substantially completed)

Data Loading

3of 5 sub elements (60% substantially completed)

The above can be misleading because the man hours associated with each task are breaking down differently than originally projected. Since this is a project that will not be undertaken every year it is decided to not track manhours by each sub task but just associate man hours to the total project.

Issues, Problems or Challenges (Item 3 under Agreement Section 9.01 Project Report: “The reasons for slippage if established objectives were not met. “)

The largest challenge initially was it was misunderstood or miscalculated the large amount of administration required at the State level in accepting funds and soliciting an RFP that involves databasing and interfacing with a separate agency the NH Office of Information Technology. Other grants received do not have this administrative process since they are controlled by the NH PUC Safety Division. The amount of technology administrative requirements that are imposed on a project are burdensome and caused delays of certain aspects of the project. Despite that the project has moved forward and some smaller unanticipated components have arisen but have been able to be met. User passwords for excavators, right to know information, maintaining of certain data elements are examples of such. The NH PUC has a more thorough understanding of the complexity of programming required for what was considered a straight forward task. Long term it will be beneficial to have ownership for modifications to the database in future years and not pay annual licensing fees required by outside firms but in the development phase it is proving to be challenging.

Other pertinent information including, when appropriate, actions taken to address the recommendations PHMSA provided in correspondence dated [Different for each] (Item 4 under Agreement Section 9.01).

Mid-term Financial Status Report

An SF 270 was not originally submitted with grant and to date no reimbursement or advance has been issued by PHMSA. The NH PUC intends to submit on an attachment and SF 270 for one half of the project awarded with the initial Progress Report and submit the remaining half of the SF270

Plans for next period (remainder of grant)

The uncheckmarked boxes on the attached schedule will be worked on. See attached pdf. If any changes to detailed workscope are encountered the project scheduler will be updated.

Requests of the AOTR and/or PHMSA

The NH PUC requests the project to be extended until April 30, 2009. It is anticipated that after that date screen shots will be ready to be included in a final report. It is readily apparent that this project will take in excess of 1.5 to 2 times what was originally projected and has consumed many more man hours than what was originally projected. While the NH PUC has not asked for any increase in funds per section 17 of the

agreement and will keep the project amount contribution from PHMSA as to the original amount of \$57, 500 it is anticipated that total costs will be in excess of \$100,000 once this is completed.

ID	Task Name	a	Start	Finish	1st Half		2nd Half		1st Half		2nd Ha
					Qtr 1	Qtr 2	Qtr 3	Qtr 4	Qtr 1	Qtr 2	Qtr 3
1	SAFETY TRAINING TRACKING SYSTEM v20081211	#	Mon 6/23/08	Thu 4/30/09			████████████████████		████████████████████		
2	BUSINESS & TECHNICAL PLANNING REQUIREMENTS	#	Mon 6/23/08	Fri 2/27/09			████████████████████		████████████████████		
16	DATABASES	#	Mon 7/7/08	Fri 3/27/09			████████████████████		████████████████████		
32	BUSINESS AND DATA TIER APPLICATION	#	Wed 10/1/08	Thu 4/30/09			████████████████████		████████████████████		
43	USER INTERFACE SYSTEMS	#	Tue 7/8/08	Tue 3/31/09			████████████████████		████████████████████		
50	SECURITY	#	Thu 7/31/08	Thu 4/30/09			████████████████████		████████████████████		
55	DATA LOADING	#	Mon 7/7/08	Thu 4/30/09			████████████████████		████████████████████		

Project: Date: Thu 12/11/08	Task		Milestone		External Tasks	
	Split		Summary		External Milestone	
	Progress		Project Summary		Deadline	

ID	Task Name	a	Start	Finish	1st Half		2nd Half		1st Half		2nd Half					
					Qtr 1	Qtr 2	Qtr 3	Qtr 4	Qtr 1	Qtr 2	Qtr 3	Qtr 4				
1	SAFETY TRAINING TRACKING SYSTEM v20081211	#	Mon 6/23/08	Thu 4/30/09												
2	BUSINESS & TECHNICAL PLANNING REQUIREMENTS	#	Mon 6/23/08	Fri 2/27/09												
3	Data Elements	#	Mon 6/23/08	Tue 1/20/09												
4	Determin data elements	#	Mon 6/23/08	Thu 7/31/08												
5	Map data elements to AgencyDatabase	#	Mon 9/15/08	Tue 1/20/09												
6	Map data elements to EDM IBM/FileNet P8 database	#	Mon 9/15/08	Tue 1/20/09												
7	Determin tracking metrics	#	Mon 6/23/08	Wed 12/31/08												
8	Determin access requirements	#	Mon 8/4/08	Fri 1/30/09												
9	Determin GUI Graphical User Interface	#	Mon 8/4/08	Fri 1/30/09												
10	Define reporting needs	#	Mon 8/4/08	Fri 1/30/09												
11	Determin platform requirements (windows,web,dataabse)	#	Mon 6/23/08	Thu 7/31/08												
12	Define functional rules	#	Mon 6/23/08	Wed 12/31/08												
13	Plan database security	#	Mon 6/23/08	Fri 2/27/09												
14	Plan communication and protocol for remote access	#	Mon 6/23/08	Fri 1/30/09												
15	Plan user access security - role based and AD	#	Mon 6/23/08	Fri 2/27/09												
16	DATABASES	#	Mon 7/7/08	Fri 3/27/09												
17	Identify physical database required for project	#	Mon 7/7/08	Fri 8/29/08												
18	AgencyDatabase (SQL Server2005)	#	Mon 7/7/08	Fri 8/29/08												
19	IBM/FileNetP8 Database (SQL Server 2005)	#	Mon 7/7/08	Fri 8/29/08												
20	AltienADM Database (SQL Server 2005)	#	Mon 7/7/08	Fri 8/29/08												
21	pucaspnetdb (SQL Server2005)	#	Mon 7/7/08	Fri 8/29/08												
22	Design/Configure	#	Fri 8/1/08	Fri 2/27/09												
23	Design logical schema	#	Fri 8/1/08	Fri 2/27/09												
24	Design objects, views, stored procedures	#	Fri 8/1/08	Fri 2/27/09												
25	Develop DDL code (SQL Server driver)	#	Fri 8/1/08	Fri 2/27/09												
26	Build phical database	#	Fri 8/1/08	Fri 2/27/09												
27	Install DB on test server	#	Fri 8/1/08	Fri 2/27/09												
28	Test	#	Fri 8/1/08	Fri 3/27/09												
29	Unit testing	#	Fri 8/1/08	Wed 12/31/08												
30	UAT testing	#	Tue 1/6/09	Fri 3/27/09												
31	Security access testing	#	Tue 1/6/09	Fri 3/27/09												
32	BUSINESS AND DATA TIER APPLICATION	#	Wed 10/1/08	Thu 4/30/09												

Project: Date: Thu 12/11/08	Task		Milestone		External Tasks	
	Split		Summary		External Milestone	
	Progress		Project Summary		Deadline	

ID	Task Name	a	Start	Finish	1st Half		2nd Half		1st Half		2nd Half	
					Qtr 1	Qtr 2	Qtr 3	Qtr 4	Qtr 1	Qtr 2	Qtr 3	Qtr 4
33	Design	#	Wed 10/1/08	Fri 1/30/09								
34	Design .NET assemblies	#	Wed 10/1/08	Mon 12/1/08								
35	Design configuration	#	Wed 10/1/08	Mon 12/1/08								
36	Integrate database, data tier and business	#	Wed 10/1/08	Fri 1/30/09								
37	Test	#	Wed 10/1/08	Thu 4/30/09								
38	Unit testing	#	Wed 10/1/08	Mon 12/1/08								
39	UAT testing	#	Wed 10/1/08	Tue 12/2/08								
40	Virtulazation and configuration	#	Mon 12/22/08	Thu 4/30/09								
41	Integration testing	#	Mon 12/22/08	Thu 4/30/09								
42	Security testing	#	Mon 12/22/08	Thu 4/30/09								
43	USER INTERFACE SYSTEMS	#	Tue 7/8/08	Tue 3/31/09								
44	Identify User Interface Systems for project	#	Tue 7/8/08	Fri 8/29/08								
45	PUCDataSystem	#	Tue 7/8/08	Fri 8/29/08								
46	AltienADMPPro	#	Tue 7/8/08	Fri 8/29/08								
47	eCase system	#	Tue 7/8/08	Fri 8/29/08								
48	design input screens	#	Mon 12/1/08	Tue 3/31/09								
49	Design publid access screens	#	Mon 12/1/08	Tue 3/31/09								
50	SECURITY	#	Thu 7/31/08	Thu 4/30/09								
51	Plan security model	#	Thu 7/31/08	Wed 2/25/09								
52	Design security infrastructure Framework 3.0	#	Mon 12/1/08	Mon 3/2/09								
53	Security Integration across software, hardware and network systems	#	Fri 8/8/08	Fri 4/3/09								
54	Test and audit security (outside vendor)	#	Mon 12/8/08	Thu 4/30/09								
55	DATA LOADING	#	Mon 7/7/08	Thu 4/30/09								
56	Identify systems for data loading	#	Mon 7/7/08	Mon 12/1/08								
57	AgencyDatabase	#	Mon 7/7/08	Mon 12/1/08								
58	IBM/FileNet system	#	Mon 7/7/08	Mon 12/1/08								
59	Design	#	Mon 12/1/08	Thu 4/30/09								
60	Design import loading modules	#	Mon 12/1/08	Thu 4/30/09								
61	Start - Load data and content	#	Thu 4/9/09	Mon 4/27/09								

Project: Date: Thu 12/11/08	Task		Milestone		External Tasks	
	Split		Summary		External Milestone	
	Progress		Project Summary		Deadline	