

FINAL HEALTH AND SAFETY PLAN

**Contract No. W91278-06-D-0026
Task Order No. DY02**



Prepared for:

**Camp Stanley Storage Activity
Boerne, Texas**

Prepared by:

PARSONS

Austin, TX

May 2008



TABLE OF CONTENTS

TABLE OF CONTENTS..... 1

ACRONYMS AND ABBREVIATIONS..... 3

SECTION 1 – INTRODUCTION..... 4

1.1 PARSONS WORKPLACE HEALTH & SAFETY POLICY 4

1.2 THE PROJECT SAFETY PLAN/PROGRAM..... 5

1.3 SUBCONTRACTOR SAFETY PLANS 6

SECTION 2 – SCOPE OF WORK..... 7

2.1 SCOPE OF WORK..... 7

2.2 PROJECT SAFETY PLAN APPLICATION 7

SECTION 3 – PROJECT SAFETY MANAGEMENT RESPONSIBILITIES AND AUTHORITY 8

3.1 SAFETY RESPONSIBILITY MATRIX 8

SECTION 4 – ADMINISTRATIVE PHASE..... 12

4.1 PROJECT SAFETY COMMITTEE 12

4.2 PROJECT ORIENTATION 12

4.3 AWARENESS CAMPAIGN 13

4.4 STAKEHOLDER HASP ALIGNMENT MEETING..... 13

4.5 TRAINING 13

4.6 AUDITS AND INSPECTIONS 13

4.7 MEETINGS..... 13

4.8 REPORTING AND MEASUREMENT 14

4.8.1 Reporting 14

4.8.2 Measurement 14

4.8.3 Incident Notification..... 15

4.9 INCIDENT INVESTIGATIONS..... 15

4.10 RESPONSIBILITY/IDENTIFICATION OF KEY LINE PERSONNEL..... 15

4.11 MEDICAL REQUIREMENTS AND WORKERS COMPENSATION..... 16

4.11.1 Functional Capacity Exams 16

4.11.2 Substance Abuse and Alcohol Testing 16

4.11.3 Medical Services and Panel of Physicians..... 16

4.11.4 Emergency Medical Response 16

4.11.5 Workers Compensation Program..... 17

4.11.6 Medical Surveillance Programs and/or Monitoring..... 17



SECTION 5 – PRE-FIELD WORK PHASE..... 19

5.1 RISK ANALYSIS AND SAFETY SPECIFICATION DEVELOPMENT 19

5.2 DESIGN AND REMEDIAL ACTION REVIEW 19

5.3 PRE-BID MEETING 20

5.4 CONTRACTOR SAFETY EVALUATION 20

5.5 PRE-FIELD WORK MEETING..... 20

5.6 COMPETENT PERSON SUBMISSION REVIEW 20

5.7 SUBCONTRACTOR SAFETY PLAN SUBMISSION REVIEW 24

5.7.1 Contractor Site-Specific Safety Plans 24

5.8 MOBILIZATION/KICKOFF SAFETY MEETING..... 25

SECTION 6 – REMEDIATION PHASE..... 27

6.1 SITE RISK ANALYSIS 27

6.2 FIVE HAZARD CONTROL MEASURES – ORDER OF PRECEDENCE..... 27

6.3 ACTIVITY HAZARDS ANALYSIS 29

6.4 SAFETY SYSTEMS ANALYSIS..... 33

6.5 REMEDIATION SITE INSPECTION 33

6.6 DAILY SITE WALK CHECKLIST 33

6.7 SAFETY AND HEALTH ENFORCEMENT 35

6.8 NOTICE OF VIOLATION OF SAFETY AND HEALTH REGULATIONS 35

6.9 COMPETENT FIRST AID PERSON 35

SECTION 7 – SAFETY TRAINING..... 48

7.1 PROJECT SAFETY ORIENTATION 48

7.2 PARSONS U SAFETY MODULES AND START TRAINING – ZERO INCIDENT
TECHNIQUES..... 48

7.3 DAILY TOOLBOX SAFETY MEETINGS..... 52

7.4 ACTIVITY HAZARDS ANALYSIS TRAINING 52

7.5 REGULATORY TRAINING PROGRAMS 52

7.6 OSHA OUTREACH PROGRAMS..... 52

7.7 SPECIALIZED TRAINING AND ORIENTATIONS..... 53

SECTION 8 – RECORDKEEPING AND POSTING 54

SECTION 9 – SAFETY AND HEALTH REQUIREMENTS..... 55

9.1 SAFETY AND HEALTH REQUIREMENTS 55



ACRONYMS AND ABBREVIATIONS

AHA	Activity hazard analysis
CFR	Code of Federal Regulations
CRZ	Contamination reduction zone
CSSA	Camp Stanley Storage Activity
EMS	Emergency medical services
EZ	Exclusion zone
GBU	Global business unit
HASP	Health and Safety Plan
HAZWOPER	Hazardous Waste Operations and Emergency Response
IDW	Investigation-derived waste
PEL	Permissible exposure limit
PPE	Personal protective equipment
PSP	Project Safety Plan/Program
RFP	Request for proposal
SHSO	Site health and safety officer
SSP	Subcontractor Safety Plan
SZ	Support zone
TCEQ	Texas Commission on Environmental Quality
TRRP	Texas Risk Reduction Program
USACE	U.S. Army Corps of Engineers
USEPA	U.S. Environmental Protection Agency
UXO	Unexploded ordnance



SECTION 1 – INTRODUCTION

1.1 PARSONS WORKPLACE HEALTH & SAFETY POLICY

STATEMENT OF POLICY:

As an industry-leading engineering, construction and technical services firm, Parsons is firmly committed to maintaining a safe and healthy working environment at all its offices and project facilities. We share the National Safety Council's Safety and Health Code of Ethics as the principles guiding our commitment to safety.

- We will hold safety and health as our highest core value.
- Executive management will lead the safety improvement process.
- Safety will be a responsibility shared by everyone in our organization.
- Safety performance will be a key indicator of our organizational excellence and will be incorporated into our business processes.
- We will communicate safety performance openly with employees.
- All employees will be given the knowledge and skills necessary to safely perform their jobs.
- We will extend our safety efforts beyond the workplace to include transportation, homes, and communities.
- We will continually strive to improve our safety and health processes.

To meet its health and safety objectives, all Parsons' employees are expected to act proactively with regard to health and safety issues. This requires the combined efforts of a concerned management, responsible and knowledgeable supervision, and conscientious, well-trained employees.

Parsons will take all reasonable action to meet or exceed the applicable occupational health and safety requirements, domestically and internationally, and will continuously monitor and improve operations, procedures, technologies and programs that are conducive to maintaining a safe and healthy working environment.

RESPONSIBILITIES:

Parsons Global Business Unit (GBU) management, project managers and site safety personnel are responsible to:

- Comply with this policy and ensure that the applicable health and safety requirements at each domestic and international office and project facility are effectively implemented and monitored at all times.
- Ensure that the applicable health and safety requirements at each domestic and international project facility are effectively integrated with the preparation of proposals, project planning, and project execution.



- Monitor subcontractor safety performance in accordance with contract specifications as required by the contract with the client.
- Ensure that safety information and statistics are reported to Parsons Corporate Safety Manager on a consistent and regular basis, as shown in Appendix 1, Safety Monthly Report.

Parsons Corporate Safety personnel are responsible to:

- Develop, communicate, and oversee Parsons' health and safety programs at all Parsons' business units.
- Provide assistance to Parsons' business unit managers regarding health and safety regulations, reporting requirements, safety training, and other related issues.
- Monitor the effectiveness of Parsons' health and safety programs, conduct investigations, develop OSHA reporting and worker's compensation claim procedures.
- Collect and maintain safety information and statistics for all Parsons' business units and operations, as shown in corporate policy Workplace Health and Safety, Appendix 2, OSHA Safety and Health Statistics.
- Keep senior management informed of significant internal and external developments regarding health and safety.

Parsons employees are responsible to:

- Exercise maximum appropriate care and good judgment at all times regarding health and safety, and adhere to safety procedures to prevent accidents and injuries.
- Promptly report all accidents and injuries to supervisory personnel.
- Promptly report any near misses, unsafe conditions, equipment, or practices to supervisory personnel.

REFERENCES:

National Safety Council Safety and Health Code of Ethics

Parsons Construction Health and Safety Manual

Parsons Injury and Illness Prevention Program (Cal-OSHA IIPP)

Parsons Safety Monthly Reports, Workplace Health and Safety – Appendix 1

Parsons Health and Safety Statistics, Workplace Health and Safety – Appendix 2

1.2 THE PROJECT SAFETY PLAN/PROGRAM

Parsons goal is zero accidents and zero injuries with work tasks designed to minimize or eliminate hazards to personnel, process, equipment, environment and the general public. No employees should ever perform tasks that may endanger their own safety and health or that of others.

This Project Health and Safety Plan/Program (HASP) outlines safety and health requirements and guidelines developed by Parsons for project work. When implemented, these requirements



will help protect site personnel, visitors, the public and environment from exposure to potential safety and health hazards.

This Plan will be updated as conditions change or situations change, usually by addenda to the model plan. All Parsons and subcontractor personnel must understand and implement the HASP and any addenda. This action is documented by having Parsons' employees sign an acknowledgement form stating that they understand the plan and its requirements.

Parsons has developed a programmatic safety plan for Camp Stanley Storage Activity (CSSA) that can be referenced at [CSSA Health and Safety Plan \(April 2005\)](#).

1.3 SUBCONTRACTOR SAFETY PLANS

Parsons' subcontractors must establish a safety program for their work and employees. Contract specifications require all subcontractors to accept Parsons' HASP, but also prepare their own Subcontractor Safety Plan (SSP) for presentation to Parsons Project Manager and Division Safety Manager before site mobilization. At a minimum, subcontractor safety and health plans must meet the requirements of this HASP and provide safety equipment and safeguards suitable for the hazards involved. This HASP may not cover all potential hazards on the project and subcontractors must ensure that appropriate safety and health information is available for all project tasks. The subcontractors listed below will be directly hired by Parsons.

All HASP requirements for Parsons' personnel (e.g., training, substance abuse screening, and incident reporting) also apply to subcontractor personnel and should be spelled out in the subcontractor's SSP.

If a subcontractor is performing activities that require specialized training (*i.e.* confined space entry, excavation/trenching, scaffold use, HAZWOPER, etc.), then copies of training certifications must be provided for applicable employees and the supervisor.

Subcontractor supervisors must possess the following certifications for applicable operations – HAZWOPER 8-hour Supervisor (29 CFR §1910.120(e)(4) - not to be confused with 8-hour annual refresher).

For this project, there will be two subcontractors directly hired by Parsons for this project, one drilling subcontractor and one analytical laboratory. Since the laboratory will not be involved in field activities for the project, they are not required to have the abovementioned certifications and are not given a safety evaluation grade.

The subcontractor directly hired by Parsons that will be involved in field activities on the project will be Geoprojects for drilling the test well and well completion. During the procurement process, Geoprojects' safety plan was evaluated and determined to be sufficient for this project.



SECTION 2 – SCOPE OF WORK

2.1 SCOPE OF WORK

Parsons, in their contracted role with the U.S. Army Corps of Engineers (USACE), is providing services for the work as specified in the Contract W91278-06-D-0026, Task Order DY02.

Under this contract, Parsons will perform six groundwater monitoring events at selected monitoring wells both on- and off-post, as well as semi-annual sampling events on four Westbay-equipped monitoring wells. Specific schedules and requirements for periodic monitoring shall be included in the Work Plan and SAP and shall conform to the approved well optimization study completed for Camp Stanley.

The water supply well task consists of the following subtasks: 1) prepare work plan, 2) drill test well, 3) conduct pumping test on test well, 4) prepare pumping test report, 5) prepare TCEQ-required documentation for new supply well, and 6) complete supply well.

The B-3 Bioreactor Operation and Maintenance task consists of periodic sampling of sumps, Westbay-equipped wells, and surrounding monitoring wells to assist in evaluating contaminant removal capacity of the bioreactor. Parsons will provide semi-monthly checks, sample following rain events, sample for twelve monthly events and sample for four quarterly events.

The SVE Treatability Study Operation and Maintenance task consists of performing O&M activities in accordance with the current approved version of the O&M Manual for the SVE systems at AOC 65. The Contractor shall update the O&M plan to incorporate the expanded SVE system and operate the SVE systems at AOC 65 in accordance with the updated and approved O&M Manual.

The project meetings/management task is to manage its professional services under this task order, including the activities of any subcontractors, to provide the most efficient completion of the project. Under this task, the Contractor will prepare a letter formatted project management plan; provide scope, schedule, and cost control services; and negotiate and administer prime and subconsultants. In addition to the kickoff meeting Parsons shall attend four additional 1-day project meetings.

Subcontractor support will be required for drilling and analytical services. The subcontractors that will perform work on this project are currently being procured.

2.2 PROJECT SAFETY PLAN APPLICATION

This HASP and referenced documents applies to all locations, facilities, operations, and projects associated with contract work performed by Parsons and its subcontractors. Locations/sites covered under this contract include only CSSA, Boerne, TX.



SECTION 3 – PROJECT SAFETY MANAGEMENT RESPONSIBILITIES AND AUTHORITY

3.1 SAFETY RESPONSIBILITY MATRIX

[Exhibit 3-1](#) summarizes the responsibilities of selected roles for Parsons Project, Division, GBU and Corporate personnel related to the primary safety activities identified in this HASP.

The Project team assigned to the project is outlined below:

Parsons Technical Director	Ross Miller, P.E.
Parsons Project Manager	Julie Burdey, P.G.
Parsons Project Health and Safety Manager	Brian Vanderglas, P.G.
Parsons Field Team Leader	Samantha Elliott
Parsons Site Health and Safety Officer	Kyle Caskey
CSSA Project Manager	Glaré Sanchez
COE Contact	Wayne Elliott

Parsons project personnel responsibilities are outlined in the following table. The site safety organization is structured such that field team members report to the site Health and Safety Officer (SHSO) who, in turn, reports to the Project Health and Safety Manager for safety-related issues. Subcontractors report to their own health and safety personnel.

Personnel Responsibilities

Title	General Description	Responsibilities
Technical Director	Upper management. Assists project personnel on technical issues.	<ul style="list-style-type: none"> • Provide technical information for field activities. • Advise Project Manager.
Project Manager	Reports to upper-level management. Has authority to direct response operations. Assumes total control over site activities.	<ul style="list-style-type: none"> • Prepares and organizes the background review of the situation, the work plan, the site safety plan, and the field team. • Obtains permission for site access and coordinates activities with appropriate officials. • Ensures that the work plan is completed and on schedule. • Briefs the field teams on their specific assignments. • Uses the Site Health and Safety Officer to ensure that safety and health requirements are met. • Prepares the final report and support files on the response activities. • Serves as liaison with public officials.
Project Health and Safety Manager	Advises the Project Manager and Site Health and Safety Officer on safety related issues.	<ul style="list-style-type: none"> • Oversees preparation of Health and Safety Plan. • Approve SSP. • Provides information regarding project safety issues to Site Health and Safety Officers. • Serves as a liaison with public officials.



Title	General Description	Responsibilities
Site Health and Safety Officer	Advise the Project Manager on all aspects of health and safety on-site. Stops work if any operation threatens worker or public health or safety.	<ul style="list-style-type: none"> • Periodically inspects protective clothing and equipment. • Ensures that protective clothing and equipment are properly stored and maintained. • Controls entry and exit at the access control points. • Coordinates safety and health program activities with project safety officer. • Confirms each team member's suitability for work based on a physician's recommendation. • Monitors the work parties for signs of stress, such as cold exposure, heat stress, and fatigue. • Implements the site safety plan. • Conducts periodic inspections to determine if the site safety plan is being followed. • Knows emergency procedures, evacuation routes, and the telephone numbers for ambulance, local hospital, poison control center, fire department, and police department. • Notifies, when necessary, local public emergency officials. • Coordinates emergency medical care. • Sets up decontamination lines and the decontamination solution appropriate for the type of chemical contamination on site. • Controls the decontamination of all equipment, personnel, and samples from the contaminated areas. • Assures proper disposal of contaminated clothing and materials. • Ensures that all required equipment is available. • Advises medical personnel of potential exposures and consequences. • Notifies emergency response personnel by telephone or radio in the event of an emergency.
Field Team Leader	Responsible for field team operations and safety.	<ul style="list-style-type: none"> • Manages field operations. • Executes the work plan and schedule. • Enforces safety procedures. • Coordinates with the Site Health and Safety Officer in determining protection level. • Enforces site control. • Documents field activities and sample collection. • Serves as liaison with public officials.



Title	General Description	Responsibilities
Work Team	The work party must consist of at least two people, one of whom is a Parsons employee.	<ul style="list-style-type: none"> • Safely complete the onsite tasks required to fulfill the work plan. • Notify project health and safety officer or supervisor of suspected unsafe conditions. Take precautions necessary to prevent injury to themselves and other employees. • Take precautions necessary to prevent injury to themselves and other employees. • Implement the site and personnel air monitoring program. • Comply with Health and Safety Plan. • Maintain visual contact between partners (buddy system). • Perform only those tasks they believe they can do safely. • Immediately report any accidents and/or unsafe conditions to the Field Team Leader, or any deviations from this plan.



Exhibit 3-1 – Roles and Responsibilities

Work Elements		Project Manager	Project Safety Manager	Project Controls Manager	Project HR Manager	Sector Manager	Division Manager	GBU Safety Manager	GBU QC Manager	GBU Risk Manager	GBU President	Corporate Workers Compensation Analyst	Corporate Safety	Resident Engineer/ Superintendent	GBU BD Manager	Parsons CEO/President
1. Zero Incident Techniques and SHARP Management		X	D	P	P	R	R	R	E	S	E		E	S	S	E
2. Business Development Phase		X	P	P	P	R	E	S	S	E		E	P	D	E	
Startup Phase	3. Initial Hazards Analysis and Planning	X	P	P	P	R	E	R	E	P	E	P		P		
	4. Project Safety Plan (PSP)	X	D		P	R	E	R		R	E		C			E
	5. Stakeholder PSP Alignment Meeting	X	D			E	E	P					C	P		
Administration/ Design Phase	6. Awareness Campaign	X	D	P	P	E	A	R					C	P		
	7. Employee Orientation	P	P	P	D	R	A	E					C	P		
	8. Training	X	D	P	P	R	A	E					C			E
	9. Health and Safety Committee	X	D	P	P	R	A	R					C			
	10. Incident Investigations	X	P	P	P	R	R	A				P	E			E
	11. Measurement and Reporting	X	D	P	P	R	R	S				P	E			E
	12. Audits, Inspections and Record Keeping	X	X	P	P	R	R	S	R	R			E			E
Construction or Field Phase	13. Preconstruction Safety Activities	X	X			E	E	R					C			
	14. Project Site Orientation	X	D	P	P	E	E	S					C			
	15. Meet Local OSHA, Building Trades, and Other Agencies	X	D			E	E	S					C			
	16. Review Contractor/Subcontractor Safety Programs	E	X			E	E	S					C	P		
	17. Subcontractor Premobilization Meeting	X	P	P		E	E	S					C	P		
	18. Risk Mitigation Planning (Two-week Look-ahead)	P	P			E	E	S					E	X		
	19. Activity Hazard Analysis	E	P			E	E	S					E	X		
	20. Recurring Field Safety Meetings/Training	X	D	P	P			S					E	P		
21. Project Management Site Safety Inspections	X	D					S					E	P			
Testing, Commissioning, Operations, and Decommissioning Phases		(to be developed)														
Closeout Phase	22. Lessons Learned and Final Safety Report	E	X		X	E	E	S	R				E	P		
	23. Records Retention	E	X		P	A	A	R					E			

Legend:

- A – Approves tools, plans, etc. established by the project.
- C – Consultant providing expert advice to the development leader.
- D – Development leader tasked to establish the tools, plans, etc. needed for the work element.
- E – Sponsor responsible to reinforce the need to comply with the established requirements.
- P – Participants in team or group implementation efforts, supporting the implementation leader.
- R – Reviews and comments on tools, plans, etc. established by the project to achieve the goal of the work element.
- S – Establishes requirements applicable to the project.
- X – Accountable and responsible to ensure that the project develops and implements the work element in accordance with established requirements.



SECTION 4 – ADMINISTRATIVE PHASE

4.1 PROJECT SAFETY COMMITTEE

Depending on the size and type of project, a safety committee that includes representation from all project stakeholders shall be formed. If the project has less than five Parsons' employees or 25 subcontractors, then a Project Safety Committee will be handled at the Program or Facility level. The Program or Facility H&S Representative is responsible for communicating information from the Division Safety Manager conference call with the project personnel on a monthly basis. Review of the meeting minutes from the Division Safety Manager conference call will take place at times and locations to be determined by the Project Manager.

For this project, which has less than five Parsons' employees or 25 subcontractors, no safety committee is required at the Project level. However, the CSSA/Parsons safety committee will serve as a Safety Committee for all CSSA projects. As an incentive for completion of project tasks in compliance with this HASP; Parsons' employees and subcontractor employees will receive lunch after the successful conclusion of project activities.

4.2 PROJECT ORIENTATION

The field team leader, or designee, will conduct an orientation with all project personnel, including subcontractors.

The Project Safety Representative meets with new workers to review site procedures and requirements listed in the HASP Orientation. Topics covered in the HASP orientation include:

- Names of personnel responsible for site safety and health issues
- Reporting emergencies, incidents, and unsafe conditions
- Emergency/evacuation plans
- Safety, health, and other hazards at the site
- Review of all activities on site and related Activity Hazard Analyses (AHA)
- Proper use of personal protective equipment (PPE)
- Work practices by which a worker can minimize risk from hazards
- Safe use of engineering controls and equipment on site
- Acute effects of compounds at the site
- Decontamination procedures

All personnel, including subcontractors and visitors, on a project must receive a HASP orientation prior to starting work or accessing the site and sign an acknowledgment form indicating they received and understood the orientation. Any individual who is unsure of any information presented in the orientation must request clarification. Individuals who do not participate in the orientation or refuse to sign the applicable HASP acknowledgment cannot work on or access the site.



4.3 AWARENESS CAMPAIGN

The project has established an awareness program consistent with the Parsons' safety awareness campaign and its various elements (e.g., signs, posters, banners, and focus briefings). This program promotes worker awareness of safety goals and daily risks, hazards, and exposures in the field.

Safety bulletin boards for this project are located at CSSA in the Environmental Office. This HASP will be available at all times during the field activities for anyone to access by hard copy during field activities or on the Environmental Encyclopedia in the **TO DY02 Project Safety Plan**.

4.4 STAKEHOLDER HASP ALIGNMENT MEETING

This project is considered a low health and safety risk because the activities associated with this project are performed regularly by the associated staff. As a result, the stakeholder HASP alignment meeting was incorporated into the project kickoff meeting.

4.5 TRAINING

The project has a comprehensive health and safety training program tailored to the scope of work. All employees receive a Project Orientation, as outlined in Section 4.2, upon assignment to the project. All Parsons new hires shall receive a facility [Employee Orientation](#) within the first 7 days of employment, provided by Human Resources, Facility Manager, Safety Representative and Staff Coordinator, or their designee. Specific training requirements for this project will include:

- *40-hour HAZWOPER and 8-hour annual HAZWOPER refresher. All personnel engaged in hazardous substance removal or other activities that expose or potentially expose them to hazardous substances or health hazards shall receive appropriate training as required by 29 CFR §1910.120, including, but not limited to, initial 40-hour, 8-hour Supervisor and annual 8-hour refresher training.*

4.6 AUDITS AND INSPECTIONS

The Project Safety Representative has implemented an audit and inspection program in conjunction with the GBU and corporate safety and quality assurance departments. The Project Manager, together with the Project Safety Representative, or their designee, conduct safety inspections as deemed necessary. The standards are detailed in Section 6.5 of this HASP. Office work areas (including trailers) are audited according to those corporate office audit standards.

Additional information on audits and inspections during field activities is also provided in Section 6.5. The fieldwork portion of this project is expected to occur over several weeks. A formal audit or inspection is not anticipated to be necessary for this project.

4.7 MEETINGS

All project meetings of three or more people must begin with a safety topic. The meeting chairperson may present the safety topic or ask for a volunteer to open the discussion. In



general, the “safety moment” is only 1-2 minutes long and is directly relevant to the work at hand or applicable to most individuals outside the workplace.

Daily toolbox safety meetings are held with all personnel at the beginning of each day of field activities to review current site conditions, incidents or injuries from the previous shift activities, safe or at-risk observations from the previous shift, activities planned for the current shift, anticipated hazards, engineering controls-work practices-PPE to protect against hazards, and any additional safety topic or comments. Toolbox safety meetings shall be documented and signed by all individuals accessing the site using a Safety Meeting Sign-In Sheet ([Exhibit 7.2](#)) or may be logged in the field logbook.

4.8 REPORTING AND MEASUREMENT

4.8.1 Reporting

To accurately measure performance and comply with corporate and regulatory requirements, Parsons utilizes an [online safety reporting system](#) to report monthly work hours, personnel injuries, property damage, environmental releases and near-miss incidents for its employees and subcontractors. Parsons Incident Reporting Guidelines include:

Procedures following a Parsons/Subcontractor Incident

- *Incident Definition: any unexpected or unplanned event involving the above. This includes near-misses, personal injuries, property damage or environmental releases.*
- *NOTE: Personal injuries involving medical treatment and incidents resulting in more than \$1K shall be verbally reported and submitted on the PWeb within four (4) hours.*
- *Within four (4) hours, verbally notify the following:*
- *Program Manager, Project Manager and Safety Manager.*
- *Within 72 hrs of an incident (except as noted otherwise):*
- *Enter incident information on the PWeb using the Online Safety Reporting System.*
- *Complete an incident investigation report to determine root causes and corrective actions to prevent recurrence.*

4.8.2 Measurement

The Safety Manager and Project Manager establish and post a measurement system to provide indicators of safety performance, including the following metrics for the project:

- *Project start date*
- *Days without a recordable injury – updated every month*
- *Date of last OSHA recordable injury (if applicable)*
- *Percent of safe observations from each monthly audit*

Subcontractors must submit a monthly report of exposure hours (hours worked on the project, paid or unpaid) to the Parsons Project Manager within 3 days after the end of each month. The Project Manager compiles the figures and submits them to the Program Manager (or via the online safety reporting system if instructed by the Program Manager) by the first Friday of each month. When necessary, estimated figures are acceptable. If a project involves air monitoring or personnel wearing any type of respirator, a monthly Field Project Report is also completed and submitted to the Division Safety Manager by the 3rd calendar day after the end of each month.



4.8.3 Incident Notification

An incident is any unplanned or unexpected event involving a Parsons employee or subcontractor that results (or could have resulted in the case of a near-miss) in a personal injury, property damage, or environmental release. Employees involved in or witnessing an incident or near-miss incident must immediately report it to the responsible supervisor or foreman, who in turn immediately relays the report to Parsons Project Manager, Julie Burdey (512-825-4281). Near-miss incidents that could cause significant injury or loss of life must be immediately reported, in the same manner as an actual incident. No supervisor may decline to accept or relay a report of injury or significant near-miss incident from a subordinate.

The Project Manager must ensure that all incidents are reported to the GBU Safety Manager and other management personnel (as required) within 4 hours. The Project Manager (who has been trained on Parsons' reporting requirements and Online Safety Reporting System), or designee, then prepares and submits the incident information.

The GBU Safety Manager, or their designee, must notify the local OSHA office immediately if an accident involves the death of an employee or hospitalization of three or more workers.

4.9 INCIDENT INVESTIGATIONS

All incidents and significant near-miss incidents are investigated by an individual or team with training in accident investigation and root cause analysis. Subcontractors (if applicable) must investigate incidents involving their employees or activities and submit an investigation report to the Parsons Project Manager within 48 hours of an incident.

In Parsons, the GBU Safety Manager investigates or assigns an investigator to each significant incident. The investigator submits a final investigation report using the online safety reporting system within 72 hours of the incident. The Parsons' Site Health and Safety Manager maintains the investigation file.

4.10 RESPONSIBILITY/IDENTIFICATION OF KEY LINE PERSONNEL

A listing of the personnel that have the authority and responsibility for implementing the provisions of the Safety, Health, and Risk Program (SHARP) Management program are provided below.

<u>Project Name/Office:</u>	GWM, Water Supply Well, Treatability Studies, USACE DY02, Austin, Texas	
<u>Address:</u>	8000 Centre Park Drive, Suite 200, Austin, Texas, 78754	
<u>Telephone</u>	<u>Fax</u>	<u>Email</u>
512-719-6000	512-719-6099	julie.burdey@parsons.com
<u>Project Manager</u>		<u>Contact No.</u>
Julie Burdey		512-825-4281
<u>Site Health & Safety Representative</u>		<u>Contact No.</u>
Kyle Caskey		210-204-8529
<u>Field Team Leader</u>		<u>Contact No.</u>
Samantha Elliott		210-347-6012



4.11 MEDICAL REQUIREMENTS AND WORKERS COMPENSATION

In accordance with corporate requirements the Division Safety Manager has established and implemented the medical requirements described below for the project.

4.11.1 Functional Capacity Exams

Functional Capacity Exams are not applicable for this project.

4.11.2 Substance Abuse and Alcohol Testing

The Division Safety Manager administers required substance abuse tests, including random drug and alcohol testing. A link to the corporate policy follows:

[Parsons corporate policy on drug and alcohol testing.](#)

The project/client does not require drug and/or alcohol testing.

4.11.3 Medical Services and Panel of Physicians

The Project Manager in conjunction with the Parsons Workers Compensation Analyst establishes a panel of medical providers for the project and selects medical facilities to treat nonemergency work-related injuries and illnesses, as follows:

- *Methodist Hospital, 7700 Floyd Curl Drive, San Antonio, TX (210) 575-4000*

NOTE: Transportation to a medical facility for nonemergencies must be done by at least two (2) individuals (i.e. driver and observer).

Directions to Methodist Hospital from CSSA:

- Exit CSSA at the main gate of the facility
- Travel south (left) 0.75 mile on Ralph Fair Road to Interstate 10
- Travel south (left) 12.5 miles on Interstate 10
- Exit at Fredericksburg Road and travel south (straight) 2 miles on Fredericksburg Road to Medical Drive
- Turn west (right) onto Medical Drive
- Travel west for 0.5 mile on Medical Drive to intersection of Medical Drive and Floyd Curl Drive
- Methodist Hospital is on the left

A map of the hospital route is included at the end of this HASP. It is approximately 15 minutes from CSSA to Methodist Hospital during routine traffic.

4.11.4 Emergency Medical Response

This HASP with emergency telephone numbers and locations of facilities will be present in the project area.



Emergency Contacts for CSSA

Organization	Telephone Number
CSSA Security, Building 79	(210) 295-7408
Camp Bullis Fire Department	(210) 295-7517
CSSA Project Manger – Glaré Sanchez	(210) 698-5208
CSSA Safety Coordinator – Teresa Benavides	(210) 698-5208
Poison Control Center	(800) 492-2414
National Response Center	(800) 424-8802
Parsons Project Health and Safety Manager – Brian Vanderglas	(512) 719-6059
Parsons Site Health and Safety Officer – Kyle Caskey	(210) 204-8529
Parsons Project Manager – Julie Burdey	(512) 775-7848
USACE Project Manager –Wayne Elliott	(817) 886-1666

Medical Emergency Contacts

Hospital	Methodist Hospital 7700 Floyd Curl Drive San Antonio, TX (210) 575-4000
Ambulance	911

Note: When using CSSA phone system, dial "1" and the last four numbers (except for 911).

For toll-free and local calls dial "9".

Mobile cell phones need to dial the entire number.

Should any suspected unexploded ordnance (UXO) be found during field activities during this project, Parsons personnel will leave the item in place and immediately contact Glaré Sanchez (210-698-5208) and Roland Abney (210-859-9780) or John Ferguson (210-240-5677) to coordinate the notification of Fort Sam Houston personnel through CSSA security. Fort Sam Houston will be responsible for assessing the item and rendering the material inert, destroying, recycling, and disposing of any UXO item(s).

Access into the north and east pastures must be cleared with Will Morris in the ammo division at (210) 861-9680 and security must be informed to unlock the gates.

4.11.5 Workers Compensation Program

The Corporate Risk Management department establishes the appropriate workers compensation carrier. If a workers compensation loss occurs, the Corporate Workers Compensation Analyst (Donna Miller, 661-904-0978) handles all communication with the carrier.

4.11.6 Medical Surveillance Programs and/or Monitoring

All personnel engaged in activities that result in the exposure to chemicals at or above the OSHA Permissible Exposure Limit (PEL) or wear a respirator for more than 30 days in a year, must comply with 29 CFR §1910.120(f) – Medical Surveillance. All personnel who wear a respirator must be medically qualified by a physician, trained and fit-tested on an annual basis, even if they are not required to participate in a medical surveillance program under 29 CFR §1910.120(f).

Based on the activities listed in Section 2.1, the following potential hazards or activities are associated with this project. As a result of potential chemical exposure, medical surveillance will be required.



Name/Job Classification	Hazard/Activity	Medical Surveillance/Training
Field sampling crew, drilling and trenching crew	Chemical exposures - sampling activities Drilling hazards	If an employee is exposed at or above the PEL of a chemical for more than 30 days in a year, they must participate in a Medical Surveillance Program.



SECTION 5 – PRE-FIELD WORK PHASE

5.1 RISK ANALYSIS AND SAFETY SPECIFICATION DEVELOPMENT

Procurement procedures require that a site-specific risk analysis be conducted before issuance of investigation and remediation request for proposals (RFP). Using the pre-bid risk analysis checklist (attached), the Project Manager, or designee, leads this analysis, which documents existing exposures that may impact the work, surrounding facilities, equipment, workers, or the public at large. The analysis includes locating, documenting, and photographing items such as:

- Overhead and underground power lines
- Sewer and water utilities
- Existing building interferences
- Heavy equipment access ways
- Traffic
- Security
- Fences
- Water hazards
- Existing geographical and environmental conditions
- Investigation-derived waste (IDW) Disposal
- Confined spaces

Upon completion of the site risk analysis, high-risk activities are listed in the RFPs (as applicable), and bidders must describe controls and mitigation strategies in their proposals. The RFP notes that the list is representative and that the selected contractor must identify and control all work-related hazards.

Pre-field work activities include a detailed analysis of the scope of work and safety specifications in the prime contract, Parsons' project schedule and HASP, draft RFPs, and proposed subcontractor agreements. The Project's standard safety specifications are given below.

- Pre-Field Work Safety Meeting Checklist – [Exhibit 5-1](#)
- Subcontractor Prequalification Scorecard – [Exhibit 5-2](#)
- Mobilization/Kickoff Safety Meeting Checklist – [Exhibit 5-3](#)

5.2 DESIGN AND REMEDIAL ACTION REVIEW

Periodic remedial action reviews are held in accordance with the project management plan. The Parsons Site Health and Safety Manager, or designee, participates in the review to ensure that safety issues are adequately addressed. During the remedial action review, the discussion focuses on how work is sequenced, interferences with continuing operations, and safe work approaches. Specific activity hazards analyses conducted before the scheduled work can mitigate identified/presumed risks.

Remedial action reviews will be scheduled as deemed necessary by the project manager.



5.3 PRE-BID MEETING

A pre-bid meeting may be held pending judgment of the project manager. Subcontractors must complete a Parsons Safety Evaluation package as outlined in Section 5.4, prior to attending a pre-bid meeting. During the pre-bid meeting, the Project Manager, or designee, uses the Pre-Field Work Safety Meeting Checklist ([Exhibit 5-1](#)) to review project safety philosophy, principles, and Parsons requirements with all prospective bidders. Although this information is included in the RFP, the meeting reinforces the message.

5.4 CONTRACTOR SAFETY EVALUATION

Project procurement procedures require that all contractors (and any lower tier subcontractor) submit prequalification documentation for evaluation. The Procurement Manager or Division Safety Manager conducts the safety evaluation in accordance with the Parsons Contractor Safety Evaluation process and package posted on ParShare.

For this project, there will be two field subcontractors directly hired by Parsons. The subcontractor prequalification scorecard is included as [Exhibit 5-2](#).

5.5 PRE-FIELD WORK MEETING

The Project Manager, or designee, holds a pre-field work safety meeting before the subcontractor begins work. The meeting includes subcontractor representatives and Parsons' representatives. During the safety review, the meeting participants review specific safety site/area and site-specific safety plan requirements. In addition, the Project Manager, or designee, obtains a safety point-of-contact and emergency management information. The attached Mobilization/Kickoff Safety Meeting Checklist ([Exhibit 5-3](#)) is attached to document the meeting. If this form is not used, documentation of safety discussions must be completed in the field logbook.

5.6 COMPETENT PERSON SUBMISSION REVIEW

Parsons and its subcontractors must identify OSHA-regulated and certified competent persons for work or tasks requiring that level of supervision. A competent person certification will be required for equipment operators who will accomplish the trenching activities. A driller licensed in the state of Texas will be required for the borings to be installed. The Parsons personnel listed below will be assigned to the project. Other individuals not yet identified may also provide field or technical support. A current list of training for Parsons employee(s) can be obtained from the Austin, Texas records maintained by Maria Gage (Health and Safety Administrator), and at least one of these individuals will be on site at all times when work is being performed and will have a valid certificate in CPR and first aid.

Kyle Caskey, Samantha Elliott, Eric Tennyson, Eric North, or Kimberly Vaughn.



Exhibit 5-1 – Standard Pre-Field Work Safety Meeting Checklist

PARSONS

Pre-Field Work Safety Meeting

Date:	_____	Project/Location:	_____
Subcontractor Representative:	_____	Parsons Project Manager:	_____
Phone:	_____	Phone:	_____
Subcontractor Safety Rep:	_____	Parsons Safety Manager:	_____
Phone:	_____	Phone:	_____

The following items were identified and reviewed with the subcontractor.

Health & Safety	Medical
Site-Specific Safety Plans/Model Program	Substance Abuse Screening
Competent/Qualified Person Documentation	Emergency Procedures
Safety Audits/Inspections	Site Security
Subcontractor Responsibilities	Smoking Policy
Site Orientation Requirements	Medical Services Requirements
Mobilization/Kickoff Safety Meeting/Date	Treatment Locations/Addresses/Phone List
Crane Inspection Certification	Other
Personal Protective Equipment (PPE)	
Environmental Hazards	
Other	

Additional Notes/Comments:



Exhibit 5-2 – Subcontractor Prequalification Scorecard

PARSONS

Parsons employee completing and/or reviewing this Scorecard: _____

Date: _____

Project: _____

Site location: _____

Subcontractor: _____

Please answer the following questions.

- 1. ___Yes ___No Do you have a written safety program? If yes, provide a copy of the table of contents and a copy of your firm's policy statement.
- 2. ___Yes ___No Do your safety procedures comply with government agency requirements? If yes, provide name of agency/agencies. _____
- 3. ___Yes ___No Do you require and use site-specific safety plans?
- 4. ___Yes ___No Does your worker's compensation carrier provide site audits on a regular basis?
- 5. ___Yes ___No Does your company have a written drug/substance abuse policy?
- 6. ___Yes ___No Do you have an orientation program for new hires?
- 7. ___Yes ___No If you have an orientation program for new hires, does it include subcontractors?
- 8. ___Yes ___No Do you require subcontractors to submit safety plans?
- 9. ___Yes ___No Do you hold site safety meetings for field supervisors?
How often? Weekly___ Biweekly___ Monthly___ Daily___
- 10. ___Yes ___No Do you hold craft toolbox safety meetings?
How often? Weekly___ Biweekly___ Monthly___ Daily___
- 11. ___Yes ___No Have you been inspected by OSHA or received any OSHA citations in the past 3 years? If yes, provide an attachment describing the outcome of the inspection along with copies of citations received. Provide a description of the actions taken to abate the citations as an attachment to this application. Respond to any open citations shown on the OSHA website (www.osha.gov).
- 12. Identify below by name, phone number, and title the person in your firm directly responsible for the firm's Safety Program management and attach a copy of his or her résumé to this application.

- 13. How do you conduct project safety inspections, and how often are they performed?

- 14. Describe your firm's program to motivate, encourage, and monitor safe work performance.



OSHA INFORMATION:

*Please use your OSHA 200 Log and/or 300 Log to fill in the number of injuries and illnesses for the last 3 years				Total employee hours worked in the last 3 years (do not include any nonwork time, even though paid)	
Year	1	2	3	Year	Hours (B)
				1	_____
				2	_____
				3	_____
Number of lost/restricted workday cases (Totals OSHA 200 Log, columns 2 and 9; Totals OSHA 300 Log, columns K and L).	_____	_____	_____	Recordable Injury Frequency Rate	
Number of recordable cases without restricted activity or lost workdays (Totals OSHA 200 Log, columns 6 and 13; Totals OSHA 300 Log, column I and J).	+ _____	_____	_____	Multiply total for each year (A) x 200,000 and divide by total employee hours for that year (B)	
Number of fatalities (Totals OSHA 200 Log, columns 1 and 8; Totals OSHA 300 Log column G).	+ _____	_____	_____	$\frac{A \times 200,000}{B}$	
Total OSHA Log (A)	_____	_____	_____	Year	Rate
				1	_____
				2	_____
				3	_____
				Experience Modification Rate (EMR)	
				Policy Year	EMR
				1	_____
				2	_____
				3	_____

Are the following accident records and accident summaries kept? How often are they recorded?				
	No	Yes	Monthly	Annually
Accidents totaled for the entire company	_____	_____	_____	_____
Accidents totaled by project	_____	_____	_____	_____

The Applicant shall maintain records of such evaluations and make them available for review and approval of Parsons representatives at all reasonable times should Applicant be awarded a contract based on this application.

By submitting this application, the Applicant agrees to use the above criteria and this form when selecting lower tier subcontractors.



5.7 SUBCONTRACTOR SAFETY PLAN SUBMISSION REVIEW

All subcontractors must submit safety programs to the Parsons Project Manager and Division Safety Manager for review before they begin work on site. The Plan will be reviewed for adequacy in accordance with the SSP template provided to the subcontractor during procurement. For this project, there will be two field subcontractors directly hired by Parsons.

5.7.1 Subcontractor Site-Specific Safety Plans

Before work begins, each subcontractor must submit two copies of its SSP to the Parsons Project Manager and Division Safety Manager for review. The Project Manager and Division Safety Manager review the SSP to ensure that it meets Parson's requirements.

If a subcontractor needs assistance developing an SSP, an electronic copy of Parsons' HAZWOPER Model SSP template will be provided.

The SSP must address the following elements:

- Responsibility
- Compliance
- Communication
- Hazard assessment
- Accident exposure and investigation
- Hazard correction
- Training and instruction
- Recordkeeping

The SSP must include applicable requirements of Parsons HASP and OSHA CFR §1910/1926:

- Scope-of-work evaluation that describes the sequence of work and associated hazardous activities.
- Specific AHA.
- A project site employee orientation program that addresses location specific issues relative to safety and health.
- A site-specific emergency action plan that includes a list of key management contacts with home office, project site, home, and cellular telephone numbers.
- A site-specific medical emergency plan that lists qualified first aid personnel by name and includes copies of their current certificates.
- Key line management personnel, by name and position, who will enforce the SSP.
- Key competent or qualified personnel by name and copy of current documentation identifying specific certified competency (e.g., scaffolding, excavations, and fall protection).
- Written progressive disciplinary program for violations of safety procedures.
- HAZWOPER training documentation (if applicable).
- Subcontractor task hazard planning.



- Subcontractor weekly safety planning submission.
- Subcontractor workers daily task safety planning.

5.8 MOBILIZATION/KICKOFF SAFETY MEETING

Project Manager, or designee, conducts the Mobilization/Kickoff Safety Meeting on the first day of subcontractor mobilization in the field and at the work site. [Exhibit 5-3](#) shows the checklist used for the safety portion of this meeting.



Exhibit 5-3 – Mobilization/Kickoff Safety Meeting Checklist

PARSONS

Mobilization/Kickoff Safety Meeting

Date: _____ Project/Location: _____

Parsons Representative: _____ Subcontractor Representative: _____

The following project site safety, health and security requirements, procedures, and hazards have been identified and reviewed with the Subcontractor.

SSP/Emergency Planning/Response Plan		Demolition	
Competent/Qualified Person		Personal Protective Equipment	
Hazardous Materials/Waste		Cranes/Hoists/Annual Inspection Certificate	
Vehicle/Heavy Equipment		Overhead Power Lines	
Lockout/Tagout		Confined Spaces (Permit/Nonpermit)	
Electrical		Excavations/Trenching	
Fire Protection		Site Security/Visitor Control/Public Exposure	
Hot Work/Welding/Cutting		Process Safety Management (PSM)	
Fall Protection/Guardrails/ Scaffolding/Ladders		Permits (Excavation/Scaffolding/Demolition/Traffic/ Confined Space/etc.)	

Additional Project Concerns:

Other Attendees:

Name	Title	Company
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____



SECTION 6 – REMEDIATION PHASE

6.1 SITE RISK ANALYSIS

Before work begins, Project Manager, or designee, will lead a team that performs a risk analysis at each work site to identify hazards that require specific control measures. This analysis will be conducted in conjunction with the mobilization/kick-off safety meeting. Site-specific activities requiring an AHA will be reviewed and the AHA completed at this time. Potential hazards for this project are listed below.

- *Environmental – cold/heat stress, animals, insects, poisonous plants/vegetation*
- *Heavy equipment operation*
- *Lifting heavy loads*
- *Noise*
- *Overhead and underground electrical*
- *Potential for ordnance material*
- *Hazardous materials*
- *Traffic*

6.2 FIVE HAZARD CONTROL MEASURES – ORDER OF PRECEDENCE

Site hazards and hazards resulting from investigation and remediation activities are controlled using one or more of the control measures listed below. The order of precedence is as follows:

1. **Engineer/design to eliminate or minimize hazards.** A major component of the design phase is to select appropriate safety features to eliminate a hazard and render it fail-safe or provide redundancy using backup components.
2. **Guard the hazard.** Hazards that cannot be eliminated by design must be reduced to an acceptable risk level by safety guards or isolation devices that render them inactive.
3. **Provide warnings.** Hazards that cannot be totally eliminated by design or guarding are controlled through using a warning or alarm device.

Should workers be required to work in known contaminated areas, a designated work zone or exclusion zone (EZ) will be established for those areas of the work site with known or suspected contamination. The EZ represents the area of the work site where there is the greatest likelihood of exposure to physical or chemical hazards. The need for establishing an EZ will be limited to those areas where active work is being performed. The size and shape of the EZ will be determined by the SHSO based upon potential hazards, site-specific conditions, site limitations, and the nature of the work tasks to be performed. The EZ will be limited to appropriately trained, qualified, and authorized field personnel. The EZ will be clearly marked at a minimum radius of 20 feet from the sampling location and all operation work vehicles (i.e., drilling rigs, support vehicles, and trailers). Visitors must supply their own PPE.



A contamination reduction zone (CRZ), will be established, if deemed necessary by the SHSO, to provide a buffer zone where personnel will conduct personal and equipment decontamination. The support zone (SZ) will constitute the clean safe area used for work site support and administrative activities. The SZ, if possible, should be located in an area of the work site upwind of the EZ and CRZ.

4. **Provide special procedures or training.** When design, guarding, or warnings cannot eliminate hazards, subcontractors must develop procedures, training, and audits to ensure safe completion of work. Training cannot be a substitute for hazard elimination when life-threatening hazards are present.

Personnel Decontamination: All disposable PPE and other equipment will be discarded and properly disposed of in plastic trash bags. Any reusable PPE that has been in contact with hazardous substances or contaminated media will be decontaminated in accordance with the following procedures:

- When air-purifying respirators are used, the following doffing and decontamination sequence will be followed:
- Exit EZ, or designated workzone, and enter the pre-established CRZ.
- Remove respirator by loosening straps and gently pulling the respirator over the top of the head.
- Remove cartridges and dispose of in plastic trash bag or lined container.
- Place respirator on clean plastic sheet or in plastic bags for subsequent cleaning, disinfection, inspection, and storage.
- Boots encrusted or heavily soiled with potentially contaminated soils or other substances will be cleaned using a stiff brush and water. All disposable coveralls and outer gloves will be discarded in a lined trash can or plastic bag for subsequent disposal.
- Rubber boots are to be washed using a scrub brush and a nonphosphate detergent-water solution (Alconox or Liquinox) followed by a thorough rinse with clean water.
- Hard hats and safety glasses will be cleaned with a damp cloth or paper towel and rinsed with clean water.
- Personnel will remove gloves, protective coveralls, or other protective outer garments using the inside-out method. All disposable items will be deposited in a lined trash can or plastic bag.
- Personnel are encouraged to shower or bathe as soon as possible after leaving the work site.

A system of sequential decontamination stations will be established only if deemed necessary by the SHSO. The stations, when practical, should be separated by a minimum distance of 3 feet to reduce the spread of contaminants during decontamination procedures and doffing of PPE.

Equipment Decontamination: Much of the sampling and light equipment used at the work site will be disposable. Reusable equipment will be decontaminated by washing, or a series of washings, using a detergent-water solution (Alconox or Liquinox) followed by a series of rinsing using generous amounts of water. Equipment decontamination will take place on-site and may generate liquids from washing and rinsing procedures. All liquids will be



containerized and disposed in accordance with the approved workplan. The rinse water will be collected in clean containers for appropriate disposal. Changes in the equipment decontamination may be made at the discretion of the SHSO. Decontamination equipment will include all or some of the following:

- Plastic buckets and pails;
- Scrub brushes and long-handled brushes;
- Detergent (e.g., Alconox or Liquinox);
- Isopropyl alcohol;
- Paper towels;
- Plastic garbage bags;
- Potable water;
- Disposal drums;
- Plastic liner material;
- **Provide personal protective equipment.** To protect workers from injury, the last method in the order of precedence is the use of personal protective equipment, such as hard hats, gloves, eye protection, life jackets, and other protective equipment with the understanding that bulky, cumbersome, and heavy personal protective equipment is often discarded or not used, rendering this method ineffective without proper controls.

6.3 *ACTIVITY HAZARDS ANALYSIS*

Parsons and its subcontractors will conduct an AHA for applicable aspects of the work. The AHA consists of the following three steps:

- Identify the key task and break it down into steps.
- Identify the primary hazards associated with the task.
- Identify the specific hazard control measure used for each step in accordance with the order-of-precedence method of control.

The following have been identified as possible activities to be included under this SOW:

- **Field Activities.** Many different types of activities occur in the field from drilling, soil sampling, and trenching. A variety of hazards could be incurred with each activity such as biological, slip/trips/falls, and lacerations. An activity hazard analysis has been prepared for each different field activity to identify the hazards and controls. AHAs for the field activities anticipated on this project are presented in Exhibit 6-5.
- **Field Visit.** When a field visit occurs, it may be before any field activities are taking place. However, there may still be hazards present such as walking or driving in fields with uneven terrain, poisonous vegetation, etc. Although personal protective equipment such as a hard hat and safety glasses may not be needed, sturdy work boots, long pants, long sleeve shirts, and sunscreen may be necessary.
- **Heavy Equipment Operation.** Evaluate the use of heavy equipment in operations such as site clearing, grading, drilling and excavation or lifting. Controls should include



equipment alarms, use of qualified and competent operators, equipment inspections, and any specific OSHA regulatory requirements.

- **Material Handling.** Consider the size and weight of loads, the equipment to be used, how the equipment is set up and protected, and safety and maintenance inspections of material handling and rigging equipment. Also consider employee training in the use of the equipment or personal body mechanics when engaged in manual material handling activities.
- **Material Storage.** Consider where materials and equipment will be stored on site. Implement measures to protect against chemical spills/releases, fire, vandalism and theft of tools, equipment, or materials. Also consider the hazards that may exist for workers when they are storing or retrieving those materials.
- **Mobilization/Demobilization.** Conduct an initial site inspection for pre-job planning. The inspection should cover potential exposures such as the location of electrical lines, underground utilities, nearby structures, traffic conditions, site security needs, public exposures general liability, and other potential exposures.
- **Portable Hand and Power Tools.** Evaluate the tools to be used and the ways that workers are protected from the hazards associated with the use of tools. Consider tool maintenance requirements; electrical requirements; the use of ground fault circuit interrupters, grounding, extension cords, and tool inspection procedures; and employee training and PPE requirements.
- **Traffic Controls.** Control measures include warning signs, flagmen, traffic stoppage and control, and unloading procedures. Internal traffic control plans should include ways to restrict the number of vehicles on site, the flow of vehicles accessing the site and driving through the site, haul roads, speed controls, subcontractor employee parking areas, merging of site traffic with local vehicle traffic, pedestrian controls in traffic zones, access by emergency and rescue vehicles and operator controls.
- **Vehicle Operation.** Although driving a vehicle may be second nature to many individuals, there are many hazards and controls that need to be identified. Fatigue and distractions are two hazards that many individuals do not think about on a regular basis. Operating off-road vehicles such as an All-Terrain Vehicle also require training.

[Exhibit 6-1](#) is a sample activity hazards analysis form. [Exhibit 6-2](#) shows a training record to be completed and kept on file for each activity hazards analysis.

Exhibit 6-5 includes the activity hazards analyses created for this project.

Exhibit 6-1 – Activity Hazards Analysis Form

PARSONS

Activity Hazards Analysis

Page ____ of ____



Project Name & Number: 745428 CSSA SWMU and AOC Investigation		AHA No. 1	Date:	New:
Location: CSSA, Boerne, Texas		Contractor: USA Environment, Parsons		Revised:
Required Personal Protective Equipment: Level D		Analysis by: Eric North		Date:
		Superintendent/Competent Person	Reviewed by:	Date:
Work Task/Activity:		Approved by:		Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
Geophysical Survey	Driving Gator safely, potential exposed UXO items	Keeps legs and arms inside Gator, drive at safe speeds, check all sides of Gator before driving; UXO personnel stay on lookout for potential exposed UXO during all portions of survey, stop survey to deal with UXO encounters in a safe and timely manner	None	
UXO Excavation Activities	Detonating a piece of UXO	Perform anomaly digs in a safe manner so that any potential UXO items are not struck violently during digging	None	
UXO Removal Activities	Possible detonation of UXO during removal and staging of UXO items	UXO personnel will perform all actions necessary to ensure that hazards associated with removing UXO from clearance areas and staging UXO items are mitigated	None	
Soil Pile Sampling and Disposal	Potential UXO, driving hazards associated with trucks picking up soil from site	UXO personnel should inspect any soil pile that is to be sampled or disposed; coordinate with truck drivers to establish a safe routine for traveling in and around the site	None	

Training Requirements:

All assigned employees are required to familiarize themselves with the contents of this AHA before starting a work activity and review it with their Supervisor during their Daily Safety Huddle.

Note: Any additional hazards noted during the project that are not included in this AHA will be logged in the project field book.

Appendix A1 – Model Project Safety Plan (PSP)

Version 1.0, August 2004

SHARP Management Manual



6.4 SAFETY SYSTEMS ANALYSIS

GBU Safety Managers use the safety systems analysis for field staff and subcontractors whose work requires that they be on site for over 6 months. The analysis provides management with a rating that reflects the safety and health program effectiveness. Appendix 3 of the SHARP Management manual provides the program, protocol, and methodology.

Text of link: <https://parsharesites.parsons.com/parcomm/indsafety/safety/forms/allitems.aspx>

6.5 REMEDIATION SITE INSPECTION

The remediation site inspection is a protocol designed to identify and correct unsafe acts and conditions, as well as recognize safe work practices and accomplishments, in Parsons' or subcontractors' scope-of-work. The Project Manager or Parsons Site Health and Safety Manager should develop standard safety checklists appropriate to the work being performed. [Exhibit 6-3](#) is an example of a simple checklist to evaluate a project's status. The Project Manager shall develop a checklist based on questions from the audit programs in Appendix 3 taken from the SHARP Manual.

Items found to be out-of-compliance must be assigned to the responsible party for corrective action and the corrective action tracked to completion. Subcontractors shall be advised of noncompliance items using a Notice of Subcontractor Violation, included as [Exhibit 6-4](#).

6.6 DAILY SITE WALK CHECKLIST

Depending on the scope of work, type of activities (i.e. low risk versus high risk), and duration of the project, the Project Manager or their designee shall conduct a daily safety site walk using the Remediation Safety and Health Inspection Checklist in [Exhibit 6-3](#) to identify problem areas. Items found to be out-of-compliance must be assigned corrective action and the corrective action tracked to completion.



6.7 SAFETY AND HEALTH ENFORCEMENT

Parsons and its subcontractors enforce all applicable requirements of OSHA 29 CFR §§1910 and 1926 as well as EM 385.1, where applicable. In addition, subcontractors must comply with and enforce Parsons' site requirements.

Parsons and its subcontractors have written progressive disciplinary systems available for review in the respective Human Resources departments.

6.8 NOTICE OF VIOLATION OF SAFETY AND HEALTH REGULATIONS

The project has a formal notice of subcontractor violation of safety and health regulations program to ensure that violations are issued in an immediately dangerous to life and health (IDLH) situation or when the subcontractor repeatedly fails to comply with safety and health requirements.

The notice ([Exhibit 6-4](#)) documents poor performance and requires a response from subcontractor senior management. The notice contains five distinct levels of discipline, from submission of a recovery plan to contract termination.

6.9 COMPETENT FIRST AID PERSON

The OSHA Regulations (29 CFR §§1910.151 and 1926.50) state the employer shall ensure the ready availability of medical personnel for advice and consultation on matters of occupational health. In the absence of an infirmary, clinic, hospital, or physician, that is reasonably accessible in terms of time and distance to the worksite (*i.e.* 4 minutes for activities that can be expected to result in an accident involving suffocation, severe bleeding, or other life threatening or permanently disabling injury or illness and 15 minutes for other types of injuries), which is available for the treatment of injured employees, a person who has a valid certificate in first-aid training from the U.S. Bureau of Mines, the American Red Cross, or equivalent training that can be verified by documentary evidence, shall be available at the worksite to render first aid. First-aid supplies must be accessible for immediate use and be of sufficient size and number to handle common first aid incidents.

The response time and distance to the nearest clinic, hospital or physician identified in section 4.11.4 has been determined to be 15 minutes. Since the response time for Emergency Medical Services (EMS) based on the activities for this project is reasonably accessible, the project will require at least one individual on site, at all times that work is being performed, to have a valid certificate in CPR and first aid. A current list of training for Parsons employee(s) can be obtained from the Austin, Texas records maintained by Maria Gage (Health and Safety Administrator), and at least one of these individuals will be on site at all times when work is being performed and will have a valid certificate in CPR and first aid.

CSSA Security personnel all maintain current First Aid certifications and can be used as alternative First Aid responders in the case of a health emergency occurring at the project site.



Exhibit 6-4 – Notice of Subcontractor Violation of Safety and Health Regulations

PARSONS

Notice of Subcontractor Violation of Safety and Health Regulations

Date: _____

Contractor Name: _____

Address: _____

Attention: _____

This letter officially notifies you that you have been found to be in violation of the following Safety Regulations:

_____ on (date) _____, by _____.

- | | | | | | | | |
|------------------------------|-----|-----------------------------|-----|--------------------|-----|--|-----|
| Confined Space Entry | ___ | Lockout/Tagout | ___ | Hot Work | ___ | Personal Protective Equipment | ___ |
| Knowledge of the environment | ___ | Awareness of warning alarms | ___ | Evacuation routes | ___ | Back-up Alarms | ___ |
| Assembly locations | ___ | Fall Protection | ___ | Scaffolding | ___ | Environmental/Hazardous Material Storage | ___ |
| Trenching | ___ | Safe Work Practices | ___ | Security Practices | ___ | | |

Other: _____

This/These violations occurred at the following locations: _____

at the following times _____ and dates _____

The name of the employees was/were _____

under the supervision of _____.



PARSONS

Notice of Noncompliance with Safety and Health Regulations

Under conditions of this enforcement procedure check all items that apply:

- _____ 1. You are being notified of this violation and should take corrective action to prevent a reoccurrence. The corrective action shall be documented to the Parsons Construction Management representative immediately.

- _____ 2. You must submit a plan for compliance to your Parsons Construction Management representative and the Construction Safety Manager within two days of receipt of this letter. The compliance plan must include the means or methods of compliance and the date that the requirements for compliance will be completed. Once compliance has been achieved, a follow up letter must be sent to the Parsons Construction Management representative and Construction Safety Manager. Failure to comply will result in disciplinary action against your Company.

- _____ 3. You are required to review the stated procedures with your Parsons Construction Management representative. Work may not commence on the site until the review is complete and the Subcontractor responds formally that the procedure is understood and will comply.

- _____ 4. You are required to review the stated procedures with your Parsons Construction Management representative. Work may not commence on the site until the review is complete and you **must** confirm formally the disciplinary action to be taken against the supervisor and employees.

- _____ 5. All work on the site will stop until the Parsons Construction Management representative reviews all the facts with the Subcontractor and determines if the contract between the parties will be terminated.

Sincerely,

Parsons Representative

cc: Issuing Construction Manager Representative
Job File
GBU Safety Manager
Project Manager



Exhibit 6-5 Activity Hazards Analyses

PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-1	Date: 3-Oct-07	New:
Location: CSSA, Boerne, Texas		Contractor: Parsons		Revised:
Required Personal Protective Equipment:		Level D	Analysis by: Teresa Anderson	Date: 3-Oct-07
Superintendent/Competent Person:		Kyle Caskey	Reviewed by: Kimberly Vaughn	Date:
Work Task/Activity:		Moving groundwater sampling equipment	Approved by: Brian Vanderglas	Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
Operation of Motor Vehicle	General	Drivers will have a valid driver's license and will wear a seat belt at all times. Drivers are prohibited from using any communication devices (e.g., cell phones) while operating any motor vehicles. Be aware of road conditions and hazards. Observe posted speed limits.		
	Unfamiliar Vehicles	Make adjustments to mirrors, seats, electronic controls, and steering wheel before driving vehicle.		
	Navigating in Unfamiliar Areas	Read and memorize directions prior to driving. Obtain map of area from rental car agency. Do not attempt to read maps or directions while driving. Be aware of local laws applicable to motor vehicle operation.		
	Unsafe Vehicles	Do not attempt to drive a vehicle that is known to be unsafe. Perform vehicle inspection prior to operation.		



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-1	Date: 3-Oct-07	New:
Location: CSSA, Boerne, Texas		Contractor: Parsons		Revised:
Required Personal Protective Equipment:		Level D	Analysis by: Teresa Anderson	Date: 3-Oct-07
Superintendent/Competent Person:		Kyle Caskey	Reviewed by: Kimberly Vaughn	Date:
Work Task/Activity:		Moving groundwater sampling equipment	Approved by: Brian Vanderglas	Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
Refueling	General	No smoking during refueling. All motor vehicles shall be shut down prior to and during fueling operations. Workers shall be required to guard carefully against any part of their clothing becoming contaminated with flammable or combustible fluids. They shall not be allowed to continue work when their clothing becomes so contaminated. Remain outside the vehicle during refueling.		
Hauling equipment in vehicles transporting to and from areas oversize loads loading and unloading equipment	Road and traffic hazards, Load width and weight-load movement Obscured vision	Check for distribution of weight, Secure load with chains and cables or tie downs. Utilize an assistant driver to warn of any danger. Practice Defensive Driving		

Training Requirements:

All assigned employees are required to familiarize themselves with the contents of this AHA before starting a work activity and review it with their Supervisor during their Daily Safety Huddle.

Note: Any additional hazards noted during the project that are not included in this AHA will be logged in the project field book.



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-2	Date: 3-Oct-07	New:
Location: CSSA, Boerne, Texas		Contractor: Parsons		Revised:
Required Personal Protective Equipment:		Level D	Analysis by: Teresa Anderson	Date: 3-Oct-07
Superintendent/Competent Person		Kyle Caskey	Reviewed by: Kimberly Vaughn	Date:
Work Task/Activity:		Site Visits for Sampling	Approved by: Brian Vanderglas	Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
Driving to the site	Operation of Motor Vehicle	Drivers will have a valid driver's license and will wear a seat belt at all times. Drivers are prohibited from using any communication devices (e.g., cell phones) while operating any motor vehicles (Parsons only). Visitors will be aware of road conditions and hazards. Visitors will practice defensive driving techniques.		
Walking at the Site	Tripping Hazards	Visitor awareness of potential slippery surfaces and tripping hazards. Inform field coordinator or Site Safety Manger of any slip, trip, or fall hazards.		
Walking at the Site	Biological Hazard (ticks, bees, mosquitoes, snakes, spiders, etc.)	Personnel awareness of potential exposure to biological hazards. Wear appropriate clothing (hat, long-sleeve shirt, long pants, gloves, and boots) and insect repellants.		
Walking at the Site	High Noise Levels	<ul style="list-style-type: none"> • Use hearing protection when exposed to excessive noise levels (greater than 85 dBA over an 8-hour work period) • The need to raise your voice at 1 foot or shout at 3 feet is a sign hear protection is required 	Use hearing protection as necessary	
Walking at the Site	Vehicle and heavy equipment traffic in work area	Visitors will be alert when walking around heavy equipment.		

Training Requirements:

All assigned employees are required to familiarize themselves with the contents of this AHA before starting a work activity and review it with their Supervisor during their Daily Safety Huddle.

Note: Any additional hazards noted during the project that are not included in this AHA will be logged in the project field book.



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-3	Date: 3-Oct-07	New:
Location: CSSA, Boerne, Texas		Contractor: Parsons,		Revised:
Required Personal Protective Equipment:		Level D	Analysis by: Teresa Anderson	Date: 3-Oct-07
Site Safety Officer: Kyle Caskey		Superintendent/Competent Person	Reviewed by: Kimberly Vaughn	Date:
Work Task/Activity:		Drilling and Sampling	Approved by: Brian Vanderglas	Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
Groundwater Sampling	Inhalation and contact with hazardous substances	<p>Provide field personnel with proper skin, eye, and respiratory protection based on the exposure hazards</p> <p>Review hazardous properties of site contaminants and control measures, including PPE, prior to field operations</p> <p>Orient operator cross-wind; stay upwind</p> <p>Keep all sampling supplies and bottles upwind or cross-wind</p>	Tyvek® coveralls, nitrile gloves, latex or neoprene boots	
	Electrical hazards	<p>Electrical work will be performed only by qualified and authorized contractor personnel</p> <p>Assume all electrical wires and circuits as "live" unless positively determined otherwise</p> <p>All electrical equipment/tools will be properly grounded and class-approved</p> <p>No safety devices will be made inoperative by removing guards</p> <p>Ground fault circuit interrupter receptacles and circuit breakers will be installed as required by National Electric Code and regulations</p>		



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-3	Date: 3-Oct-07	New:
Location: CSSA, Boerne, Texas		Contractor: Parsons,		Revised:
Required Personal Protective Equipment:		Level D	Analysis by: Teresa Anderson	Date: 3-Oct-07
Site Safety Officer: Kyle Caskey		Superintendent/Competent Person	Reviewed by: Kimberly Vaughn	Date:
Work Task/Activity:		Drilling and Sampling	Approved by: Brian Vanderglas	Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
	Struck by/against flying particles, protruding objects, liquid splashes	Wear hard hats, safety glasses with side shields, and steel-toed safety boot at all times Wear safety glasses when cleaning or decontaminating equipment Wear safety glasses when filling sample bottles and performing field test kit analyses.		
	High noise levels	Use hearing protection when exposed to excessive noise levels (greater than 85 dBA over an 8-hour work period) The need to raise your voice at 1 foot or shout at 3 feet is a sign hear protection is required		
	Back injuries; musculoskeletal disorders (MSD)	Observe proper lifting/carrying techniques Obey sensible lifting limits (60 lb. maximum per person for manual lifting) Use mechanical lifting equipment (handcarts, trucks) or more than one person to move large, awkward loads		



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-3	Date: 3-Oct-07	New:
Location: CSSA, Boerne, Texas		Contractor: Parsons,		Revised:
Required Personal Protective Equipment:		Level D	Analysis by: Teresa Anderson	Date: 3-Oct-07
Site Safety Officer: Kyle Caskey		Superintendent/Competent Person	Reviewed by: Kimberly Vaughn	Date:
Work Task/Activity:		Drilling and Sampling	Approved by: Brian Vanderglas	Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
	Injuries from improper use of hand tools and equipment	Maintain all tools in a safe, good working condition Provide training on proper operation of tools and equipment Keep guards in place during use All power tools will have insulated handles, be electrically grounded, or be double insulated When using cutting tool, always cutting away from body and hands Take damaged or worn tools out of service	Leather gloves and proper cutting tool	
Groundwater Sampling	Caught in or between moving parts	Identify and understand parts of equipment that may cause crushing, pinching, rotating, or similar injuries Assure that guards are in place to protect from these parts of equipment during operation Provide and use proper work glove when the possibility of pinching or other injury may be caused by moving or handling large or heavy objects Maintain all equipment in safe condition Keep all guards in place during use De-energize and lock-out machinery before maintenance or service		



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-3	Date: 3-Oct-07	New:
Location: CSSA, Boerne, Texas		Contractor: Parsons,		Revised:
Required Personal Protective Equipment:		Level D	Analysis by: Teresa Anderson	Date: 3-Oct-07
Site Safety Officer: Kyle Caskey		Superintendent/Competent Person	Reviewed by: Kimberly Vaughn	Date:
Work Task/Activity:		Drilling and Sampling	Approved by: Brian Vanderglas	Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
	Flammable, explosive atmospheres	Turn engines or generators off before refueling Eliminate sources of ignition from the work area Monitor for O2 and LEL. Prohibit smoking in well or treatment system area Provide ABC (or equivalent) fire extinguishers Store flammable liquids in well ventilated areas Prohibit storage of flammable liquids in plastic containers Store combustible materials away from flammables Separate flammables and oxidizers by 20 feet minimum		
	Heat stress	Monitor for heat stress in accordance with health and safety procedures Provide fluids to prevent work dehydration Give frequent breaks		
Groundwater Sampling	Slip, Trip, Fall, Loss of Balance	Site safety briefing Stay alert Maintain firm footing Use "buddy" system Watch for obstacles		

Training Requirements:

All assigned employees are required to familiarize themselves with the contents of this AHA before starting a work activity and review it with their Supervisor during their Daily Safety Huddle.

Note: Any additional hazards noted during the project that are not included in this AHA will be logged in the project field book.



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-4	Date: 3-Oct-07	New:
Location: CSSA, Boerne, Texas		Contractor: Parsons		Revised:
Required Personal Protective Equipment:		Level D	Analysis by: Teresa Anderson	Date: 3-Oct-07
Superintendent/Competent Person:		Kyle Caskey	Reviewed by: Kimberly Vaughn	Date:
Work Task/Activity:		Office Hazards	Approved by: Brian Vanderglas	Date:
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements	
Working with file cabinets	Shifting weight causes cabinet to fall	Close all drawers not in use to prevent weight of drawers from causing cabinet to tip.		
	Cuts, abrasions, bruises to the skin	Ensure that hands and fingers are clear before opening and closing drawers. Use hand protection if tasks will require that the hands are subject to injury		
	Falls or trips	Keep drawers closed after use to avoid tripping		
	Pinch point injuries	Keep hands clear of drawer edges when closing. Use drawer handle to close drawer and always close slowly		
Servicing copier machines	Electrical shock	De-energize machine before services		
	Burns to skin	Be familiar with the equipment and manufacturers' recommended procedures and warnings.		



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-4		Date: 3-Oct-07		New:	
Location: CSSA, Boerne, Texas		Contractor: Parsons				Revised:	
Required Personal Protective Equipment:		Level D		Analysis by: Teresa Anderson		Date: 3-Oct-07	
Superintendent/Competent Person:		Kyle Caskey		Reviewed by: Kimberly Vaughn		Date:	
Work Task/Activity:		Office Hazards		Approved by: Brian Vanderglas		Date:	
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements				
	Chemical irritation to skin or eyes	All harmful chemicals shall only be handled under the supervision of a qualified person. Use protective clothing if necessary and immediately wash chemicals from skin if contact occurs.					
	Becoming entangled in machinery by jewelry or extremities	Be careful not to wear loose or dangling jewelry when servicing equipment. Do not attempt to correct malfunctioning equipment with hands unless you are a qualified service technician authorized to make repairs.					
Walking to and from offices during ice, snow or rain conditions	Falls from loss of footing	Take the necessary steps to clear walkways of snow or ice by machinery or chemical thawing agents.					
Operating standard office equipment	Electric shock	Make sure outlets are properly grounded. Make sure equipment is not used if there are frayed or damaged electrical cords.					
Moving equipment or office furnishings	Back strain	Use proper lifting techniques. Use back support while attempting to lift moderate or heavy loads.					



PARSONS

Activity Hazards Analysis

Project Name & Number: 745953 CSSA GW Monitoring, Water Supply Well Installation, B-3/SVE Treatability Studies		AHA No. 745953-4		Date: 3-Oct-07		New:	
Location: CSSA, Boerne, Texas		Contractor: Parsons				Revised:	
Required Personal Protective Equipment:		Level D		Analysis by: Teresa Anderson		Date: 3-Oct-07	
Superintendent/Competent Person:		Kyle Caskey		Reviewed by: Kimberly Vaughn		Date:	
Work Task/Activity:		Office Hazards		Approved by: Brian Vanderglas		Date:	
Job Step	Potential Hazards	Preventive or Corrective Measures	Inspection Requirements				
	Electrical shock	Disengage electrical supplies before moving equipment					
	Pinch points	Ensure that there is adequate clearance before moving furnishings or equipment Be sure of your physical abilities and do not attempt a job outside of the employee's strength					
	Cuts or abrasions to skin	Inspect hand hold locations before attempting to lift and/or move objects					



SECTION 7 – SAFETY TRAINING

7.1 PROJECT SAFETY ORIENTATION

The Parsons Project Manager, Project Engineer, or Parsons Site Health and Safety Manager conducts the site-specific orientation for all new Parsons staff and subcontractor management personnel.

The Orientation takes approximately 0.5 hours to complete and consists of applicable owner, Parsons, and regulatory reference material, including:

- Owner – Contractor Safety Program and Manual of Safety Regulations Handbook and security requirements
- Applicable OSHA 1910 General Industry and 1926 Construction Regulations and others as required
- Parsons applicable requirements, including items covered in Section 4.2
- Subcontractor requirements

All visitors must receive a brief orientation as described in Section 4.2, and be escorted by the Project Manager, Project Engineer, Parsons Site Health and Safety Manager or a designee familiar with the potential hazards on the project.

Subcontractors must conduct similar orientations for their staff and craft employees and must document all orientations using the Employee/Subcontractor Training Acknowledgement and sample form ([Exhibit 7-1](#)). The Project Manager maintains the orientation documents and acknowledgement forms.

7.2 PARSONSU SAFETY MODULES AND START TRAINING – ZERO INCIDENT TECHNIQUES

Consistent with Parsons corporate initiatives in safety training, the Project Manager will identify all applicable personnel (i.e. managers, engineers and supervisors, including subcontractor personnel), that shall be current in the completion of [safety modules](#) on ParsonsU and that should receive START training to further Parsons' goal of zero incidents.

The GBU and Division Safety Manager serve as the certified trainers for periodic START training sessions for new personnel. They should be contacted if personnel need to receive training.



Exhibit 7-1

PARSONS

Employee/Subcontractor Training Acknowledgement

Name of Trainer: _____

Training Subject: _____

Training materials used: _____

Name of employee: _____

Date of hire/assignment: _____

I, _____, hereby certify that I have received training as described above in the following areas:

- Names of personnel responsible for site safety and health.
- Safety, health or other hazards at the site.
- The proper use of personal protective equipment.
- The potential occupational hazards in general in the work area and associated with my job assignment.
- Work practices by which a worker can minimize risks from hazards.
- Safe use of engineering controls and equipment on the site.
- Acute effects of compounds on the site.
- Decontamination procedures.
- General safety requirements indicate the safe work conditions, safe work practices and personal protective equipment required for my work.
- The hazards of any chemicals to which I may be exposed and my right to information contained on material safety data sheets for those chemicals, and how to understand this information.
- My right to ask questions, or provide any information to the employer on safety either directly or anonymously without any fear of reprisal.
- Disciplinary procedures the employer will use to enforce compliance with general safety requirements.

I understand this training and agree to comply with general safety requirements for my work area.

Employee Signature

Date



Exhibit 7-2 - Safety Meeting Sign-In Sheet

Safety Meeting Presenter: _____ Date: _____

Current Weather Conditions:

Temperature (°F) = _____ Wind Direction = _____ Wind Speed = _____

Clear - Sunny – Cloudy – Rain - Snow Forecast = _____

Current Site Conditions (circle as appropriate):

Dry - Wet - Muddy - Frozen - Snow Covered - Other (describe) _____

1. Incidents or Injuries to report from Previous Day Activities: No Yes - explain below:

2. Safe and/or At-Risk Observations from Previous Day Activities: _____

3. Activities Taking Place Today: _____

3. Anticipated Hazards: _____

4. Engineering Controls-Work Practices-PPE to Protect Against Hazards: _____

5. Additional Safety Topic or Comments: _____



7.3 DAILY TOOLBOX SAFETY MEETINGS

Parsons and its subcontractors conduct daily safety meetings at the beginning of each day. These meetings include topics relevant to upcoming work and may include reviews of recent incidents on the project. The Project Manager, or designee, is responsible for the toolbox safety training content and documenting and retaining attendance records using [Exhibit 7-2](#) or recording in the field logbook.

7.4 ACTIVITY HAZARDS ANALYSIS TRAINING

When activity hazards analysis is necessary, the Parsons Project Manager/Engineer/Supervisor or subcontractor conducts a training session with all employees involved with the analyzed task. The training may be informal and at the site where the task is performed. Employees should be given an opportunity to provide input regarding task steps, hazards identified, and appropriate control measures.

The Project Manager documents and maintains the activity hazards analyses using [Exhibit 6-2](#) or the field logbook.

7.5 REGULATORY TRAINING PROGRAMS

OSHA regulations require specific training in certain circumstances. Based on the scope of work and meetings with regulatory officials, the following training topics are provided on the project:

- *Hazard Communication – as per 29 CFR §1910.1200*
- *General – all workers engaged in activities which are potentially exposed to hazardous substances and health hazards must be trained to meet 29 CFR §1910.120(e)(1). Annual 8-hour refresher training as per 29 CFR §1910.120(e)(3) is required for workers and supervisors must be trained to meet 29 CFR §1910.120(e)(4).*
- *CPR/AED/First aid – provided to personnel based on project activities identified in the Scope of Work (i.e. life threatening) and EMS response time (i.e. less than 15 minutes). See Section 6.9.*
- *Respiratory protection – as per 29 CFR §1910.134. Medical qualification by a physician is required to wear a respirator. Annual fit testing and training is also required.*
- *Signaling*

The Project Manager, or designee, determines the necessary training and coordinates the training with the Parsons Site Health and Safety Manager.

7.6 OSHA OUTREACH PROGRAMS

When applicable, the project may use qualified instructors and online courses to conduct OSHA 10-hour construction safety training. If applicable, supervisory staff must complete the 30-hour course. Depending on the scope of work, similar requirements may be included in all subcontracts. Participants successfully completing the course receive a certificate of completion from OSHA. This is not expected to be necessary for this project.



7.7 SPECIALIZED TRAINING AND ORIENTATIONS

Project personnel receive specialized training on client rules and requirements as well as the unique tools, equipment, and procedures used to perform the work. The project does not require any specialized training or orientations.



SECTION 8 – RECORDKEEPING AND POSTING

Parsons and its subcontractors must comply with the recordkeeping requirements of OSHA, Owner, Parsons Corporation, and this safety program, including:

- OSHA 300 logs
- Medical treatment and follow up
- Heavy equipment inspection logs
- Training
- Inspections
- Audits
- Others as required

The Project Manager is the official record keeper for files relating to Parsons employees. Each subcontractor maintains its files.



SECTION 9 – SAFETY AND HEALTH REQUIREMENTS

9.1 SAFETY AND HEALTH REQUIREMENTS

Table 9-1 represents OSHA, owner, and Parsons corporate regulations and requirements applicable to the project. Based on the most recent risk assessments, Parsons Project Manager and Parsons Site Health and Safety Manager update the listed topics periodically. Training and other requirements are updated in this HASP as required by changes to Table 9-1.

Parsons and its subcontractors are individually responsible for training their respective employees and for complying with all project requirements. Failure to comply could lead to disciplinary actions against Parsons employees and subcontractors or their employees.

Exhibit 9-1 – Competent Person and Activity Hazards Analysis Requirements

Safety and Health Requirement	OSHA Regulation	EM 385-1-1 Regulation	Competent Qualified Person-Supv	Training Required	AHA Required
1. General Safety & Health	40 CFR §1926.20	01.A	Yes	Yes	Yes
2. Safety Training	40 CFR §1926.21	01.B.01	Yes	Yes	Yes
3. Confined Spaces	40 CFR §§1910.146; 1926.21	06.01	Yes; Supv	Yes	Yes
4. Confined Space Permit System	40 CFR §1910.146	06.01	Yes	Yes	Yes
5. First Aid and Medical	40 CFR §§1926.23, 50	03.A	Yes	Yes	Yes
6. Fire Protection and Prevention	40 CFR §§1926.24, 150-155, 352	09.A	Yes	Yes	Yes
7. Housekeeping	40 CFR §1926.25	14.C	N/A	N/A	N/A
8. Illumination	40 CFR §§1926.26, 56	07.A	Recommended	N/A	N/A
9. Sanitation	40 CFR §§1926.27, 51	02.A	N/A	N/A	N/A
10. Personal Protective Equipment	40 CFR §§1926.28, 95-98, 100-107	05.A	Yes	Yes	Yes
11. Acceptable Certifications	40 CFR §1926.29		Yes	Yes	Yes
12. Incorporation by Reference	40 CFR §1926.31	Preamble	N/A	N/A	N/A
13. Emergency Employee Action Plans	40 CFR §1926.35	01.E	Recommended	Yes	Yes
14. Noise Exposure	40 CFR §§1910.95; 1926.52	05.C	Yes	Yes	Yes
15. Radiation Protection	40 CFR §§1926.53, 54		Yes	Yes	Yes
16. Gases, Vapors, Dusts and Mists	40 CFR §§1926.1926.55		Yes	Yes	Yes
17. Ventilation	40 CFR §§1926.57, 353		Recommended	Yes	Yes
18. Hazard Communication	40 CFR §1926.59	1.B.06	Yes	Yes	Yes
19. Process Safety Management	40 CFR §§1910.119; 1926.64		Yes	Yes	Yes
20. Hazardous Waste Operations and Emergency Response	40 CFR §§1910.120; 1926.65	28.A	Yes Supv – 8 hr	Yes	Yes
21. Accident prevention signs and tags	40 CFR §1926.200	08.A	N/A	N/A	N/A
22. Signaling	40 CFR §1926.201	08.B	Recommended	N/A	Yes
23. Barricades	40 CFR §1926.202		N/A	N/A	N/A
24. Material Storage	40 CFR §1926.250	14.B	N/A	Yes	Yes



Exhibit 9-1 – Competent Person and Activity Hazards Analysis Requirements (Contd)

Safety and Health Requirement	OSHA Regulation	EM 385-1-1 Regulation	Competent Qualified Person	Training Required	AHA Required
25. Rigging	40 CFR §1926.251	15.A	Yes	Yes	Yes
26. Waste Disposal	40 CFR §1926.252	14.D	Yes	Yes	Yes
27. Tools	40 CFR §§1926.300-307	13.A	N/A	N/A	Yes
28. Gas Welding and Cutting	40 CFR §1926.350	10.A	Recommended	Yes	Yes
29. Arc Welding	40 CFR §1926.351	10.E	Recommended	Yes	Yes
30. Electrical	40 CFR §§1926.400-415	11.E	Yes	Yes	Yes
31. General Electrical	40 CFR §1926.416	11.A	Yes	Yes	Yes
32. Lockout Tagout	40 CFR §§1910.147; 1926.417	12.A	Yes	Yes	Yes
33. Lockout Tagout Permit System	40 CFR §1910.147	12.A	Yes	Yes	Yes
34. Maintenance of Electrical Equipment	40 CFR §1926.431	11A	Yes	Yes	Yes
35. Environmental Deterioration of Electrical Equipment	40 CFR §1926.432		Yes	Yes	Yes
36. Batteries/Battery Charging Equipment	40 CFR §1926.441	11.E	N/A	Yes	Yes
37. Scaffolding	40 CFR §§1926.450-454	22.A	Yes	Yes	Yes
38. Aerial Lifts	40 CFR §1926.453	22.J and K	Yes	Yes	Yes
39. Fall Protection	40 CFR §§1926.500-503	21.A	Yes	Yes	Yes
40. Cranes, Derricks, Hoists, Elevators and Conveyors	40 CFR §1926.550	16.A	Yes	Yes	Yes
41. Motor Vehicles, Mechanized Equipment	40 CFR §§1926.600-603	18.A	Yes	Yes	Yes
42. Powered Industrial Trucks (forklifts)	40 CFR §1910.178		Yes	Yes	Yes
43. Site Clearing	40 CFR §1926.604	31.A	N/A	Yes	Yes
44. Marine Operations and Equipment	40 CFR §1926.606	16.F	Yes	Yes	Yes
45. Excavations	40 CFR §§1926.650-652	25.A	Yes	Yes	Yes
46. Excavation Permit	N/A	N/A	Yes	Yes	Yes
47. Concrete and Masonry Construction	40 CFR §§1926.700-706	27.A	Yes	Yes	Yes
48. Steel Erection	40 CFR §§1926.750-761 and SENRAC		Yes	Yes	Yes
49. Underground Construction	40 CFR §1926.800	26.A	Yes	Yes	Yes
50. Caissons	40 CFR §1926.801	26.H	Yes	Yes	Yes
51. Cofferdams	40 CFR §1926.802		Yes	Yes	Yes
52. Compressed Air	40 CFR §1926.803	26.I	Yes	Yes	Yes
53. Demolition	40 CFR §§1926.850-860 inclusive	23.A	Yes	Yes	Yes
54. Power Transmission and Distribution	40 CFR §§1926.950-960 inclusive	11.H	Yes	Yes	Yes
55. Rollover Protective Structures; Overhead Protection	40 CFR §§1926.1000-1003 inclusive		N/A	N/A	Yes
56. Stairways and Ladders Scope	40 CFR §1926.1050	21.A	N/A	Yes	Yes



Exhibit 9-1 – Competent Person and Activity Hazards Analysis Requirements (Contd)

Safety and Health Requirement	OSHA Regulation	EM 385-1-1 Regulation	Competent Qualified Person	Training Required	AHA Required
57. S/L General Requirements	40 CFR §1926.1051		Yes	Yes	Yes
58. Stairways	40 CFR §1926.1052	21.E	Recommended	Yes	N/A
59. Ladders	40 CFR §1926.1053	21.D	Yes	Yes	Yes
60. Ladder/Stair Training	40 CFR §1926.1060		Yes	Yes	Yes
61. Diving Scope	40 CFR §§1926.1071-1072	30.A	Yes	Yes	Yes
62. Dive Team Quals	40 CFR §1926.1076	30.A.08	Yes	Yes	Yes
63. Dive Safe Practices Manual	40 CFR §1926.1080	30.A.16	Yes	Yes	Yes
64. Pre-dive Procedures	40 CFR §1926.1081		Yes	Yes	Yes
65. Procedures During Dive	40 CFR §1926.1082	30.A.15	Yes	Yes	Yes
66. Post Dive Procedures	40 CFR §1926.1083	30.A.22	Yes	Yes	Yes
67. SCUBA Diving	40 CFR §1926.1084	30.B	Yes	Yes	Yes
68. Surface-Supplied Air Diving	40 CFR §1926.1085	30.A.04	Yes	Yes	Yes
69. Mixed-gas Diving	1926.1086	30.D	Yes	Yes	Yes
70. Liveboating	1926.1087	30.A.05	Yes	Yes	Yes
71. Diving Equipment	1926.1090	30.E	Yes	Yes	Yes
72. Diving Recordkeeping Requirements	1926.1092	30.A.06	Yes	Yes	Yes
73. Internal Traffic Control	N/A	8.D	N/A	Yes	Yes
74. Traffic Movement Restriction Times	N/A	8.C	N/A	Yes	Yes
75. Line Breaking	40 CFR §§1910.119 and 1926.54		Yes	Yes	Yes
76. Major Material Movements	N/A	N/A	N/A	Yes	Yes
77. Right-of-way Restrictions	N/A	N/A	N/A	Yes	Yes
78. Bicycles/Golf Carts	N/A	18.D	N/A	Yes	N/A
79. IIPP/SSPP	Cal 3203	Cal 3203	Yes	Yes	Yes