

**INCIDENT ACTION PLAN**

Be brief and concise with your entries


Location	Control Level	Operational Period
Bayou Corne Sink Hole	Company Supervisory	From 12/27/12 To 12/28/12

<b>1.0 SITUATION</b> Disease, community, environment  PROMPTS: Weather, disease trends, Resources, Hazards & safety  REFERENCE: Maps, weather reports, Sitreps, appreciation, warnings, alerts	<b>CURRENT</b> Cloudy
	<b>PREDICT</b> Cloudy
<b>2.0 OBJECTIVES (or MISSION)</b>  PROMPTS: Time & space  REFERENCE: Appreciation – control options, courses open to disease	<b>CURRENT</b> <b>Objective 1 - Gas Monitoring:</b>  3 Gas Monitors have been set up in the field and are obtaining data on a continuous basis.  The monitors are running on batteries which must be changed out every morning. Three monitors are located in the swamp and are required to be reached via airboats launched from TBC facilities.  The continuous monitoring data is collected at an office trailer located at Texas Brine Grand Bayou Facility. Monitoring the information on a 24 hours basis. Monitoring is being recorded for LEL, VOC, H2S and O2.  <b>Respec Mining &amp; Energy:</b> In-place inclinometers and tilt meter monitoring system, weekly report  <b>Objective 2-</b> Elevation survey taking place once a week.  <b>Objective 3-</b> Sink hole observation. See attached Map.  Phase 2 of the remediation plan continues. We are using one vacuum truck, and two mop skimmers to remove hydrocarbons. See Attached Plan.
	<b>ALTERNATE</b>
<b>3.0 EXECUTION</b> add safety information as appropriate	
<b>GENERAL OUTLINE</b>  PROMPTS:	<b>Safety Information: See Attached Safe Work Rules</b> <b>Reference IAP dated 8/9/12</b>

Strategies & tactics (current/proposed/alternate)  REFERENCE: Appreciation, Control Options	<b>Additional to our Safe Work Rules for this project we are adding the awareness of insects, reptiles and animals.</b> <b>Inspect location for flammability</b> <b>Daily Safety Meetings</b> <b>PPE Required on site: Respirator w/ VOC Cartridge, Gloves for sampling, eye protection, life preservers, hearing protection.</b>
<b>GROUPINGS</b>	<b>NA</b>
<b>TASKS</b> Including PR & Media	<b>Same as above</b>
<b>COORDINATING INSTRUCTIONS</b>  PROMPTS: Timings, routes, assembly areas, staging areas	<b>Texas Brine Grand Bayou Facility will be used as staging area.</b>
<b>4.0 ADMINISTRATION (Logistics support)</b>  PROMPTS: Unit names, locations, contact names, phone no's, timings, duties/tasks, routes, suppliers, quantities, status (required, organised, stand by, enroute)	
<b>SUPPLY</b> WHO, WHAT, WHERE, WHEN of resources not readily available	<b>NA</b>
<b>GROUND SUPPORT</b> Transport of personnel, traffic mgt, refuelling, mechanical repair/maintenance	<b>NA</b>
<b>COMMUNICATIONS</b> Installation, maintenance, technical advice	<b>Cell Phone &amp; Landline Communications:</b> <b>Kenneth Blanchard – Area Manager – 985- [REDACTED] (985- [REDACTED])</b> <b>kblanchard@texasbrine.com</b> <b>Scott Borne – Facility Manager – 985- [REDACTED] (985- [REDACTED])</b> <b>sborne@texasbrine.com</b> <b>Joel Miller, PE – Consultant – 337- [REDACTED] (337- [REDACTED]) joel.miller@cox-internet.com</b> <b>Bruce Martin – Operations/PR – 713- [REDACTED] (281- [REDACTED])</b>

	<b>bmartin@texasbrine.com</b> <b>Mark Cartwright – Technical/Engineering – 713- (281- )</b> <b>mcartwright@unitedbrine.com</b> <b>Scott Whitelaw – Environmental/Safety – 713- (713- )</b> <b>swhitelaw@tum.com</b>
<b>STAGING AREA/</b> <b>FCP</b> Setting up, communications, staffing	<b>Texas Brine Grand Bayou Facility</b> <b>1301 Hwy 70 South, Belle Rose, La 70341</b>
<b>5.0 ADMINISTRATION</b> (Logistics services)	
PROMPTS: Unit names, locations, contact names, phone no's, timings, duties/tasks, routes, suppliers, quantities, status (required, organised, stand by, enroute)	
<b>FACILITIES</b> Security, waste, cleaning	<b>NA</b>
<b>CATERING</b>	<b>NA</b>
<b>OH&amp;S/MEDICAL</b> Medical plan, first aid plan	<b>Call 911</b>
<b>FINANCE</b>	<b>NA</b>
<b>TRAVEL</b>	<b>NA</b>
<b>INDUCTION/ TRAINING</b>	<b>NA</b>
<b>ACCOMMODATION</b>	<b>NA</b>
<b>6.0 CONTROL, COORDINATION &amp; COMMUNICATION</b>	
<b>CONTROL &amp; COORDINATION STRUCTURE</b>  REFERENCE Structural Chart	<b>Plant Management Supervision / Contractor Work</b>

<b>COORDINATION &amp; LIAISON</b>  Local knowledge, police, agency reps, emergency mgt reps	<b>NA</b>
<b>COMMUNICATIONS</b>  PROMPTS Communications structure, operational comms plan, information mgt	<b>Plant Management – Contractor Communication via Cell Phone</b>

<b>EXTRAS</b>	
<b>Attachments</b> PROMPTS: maps, weather, organisational charts, resources, comms diagram	<b>Current Weather</b> <b>Safe Work Rules</b>
<b>Plan developers</b> PROMPTS PO, Logs Mgr, Controller	<b>NA</b>
<b>Approval</b> Controller, Ops Director	<b>TBC Company Rep:</b>  <b>FOSC:</b> <b>SOSC:</b> <b>POSC:</b>

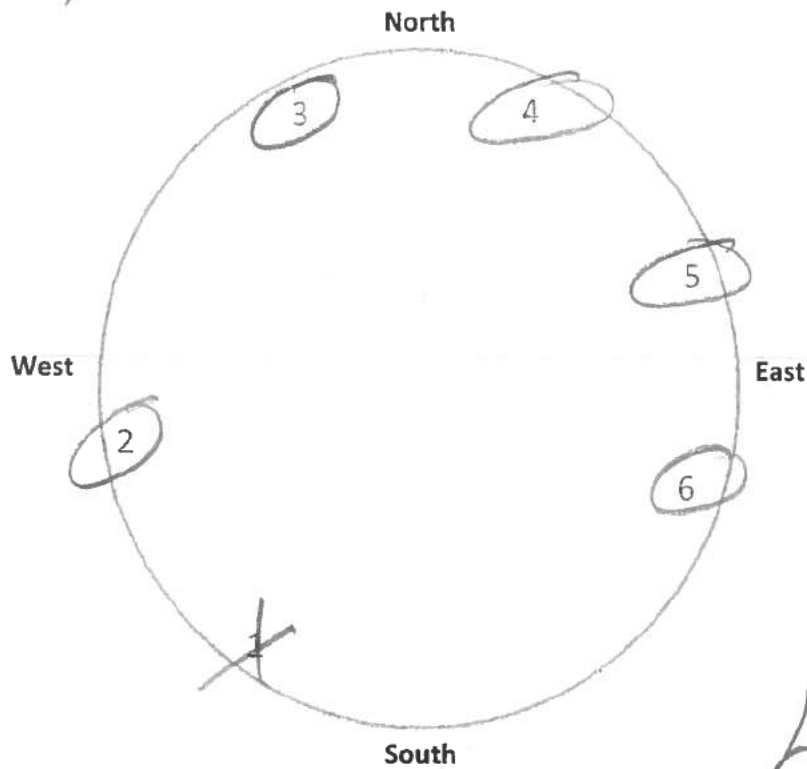
# Bayou Corne Sinkhole

Revised: 11/7/12

Date and Time:

12-26-12

	Time	Time	Time	Time
	9:00			
Tree 1	N/O			
Tree 2	VPS			
Tree 3	VPS			
Tree 4	VPS			
Tree 5	VPS			
Tree 6	VPS			



Luke Deigh

## **Site Specific Safety Plan for Remediation of the Bayou Corne Sink Hole**

The following plan is a site specific plan for the remediation of the Bayou Corne sink hole which will be achieved in two Phases. Phase one will include the construction of an access road to the sink hole which will allow the use of a long reach excavator. The excavator will be used to remove vegetation near the access road and place into roll off boxes. Phase two will consist of placing one or more airboats with attached rakes that will be used to push vegetation towards the access road where it will be removed and placed in roll off boxes. By removing the vegetation this allow us the use of skimmers and absorbent booms to aid in hydrocarbon removal.

### **Site Setting**

The Texas Brine facility is located at 1301 Hwy 70, Belle Rose, LA 70341. The facility is located South of 70. The site is located on raised pads and roads but the property is otherwise swamp. A site map is attached. The nearest hospital Our Lady of the Lake is located in Napoleonville, LA. which is a 15 minute trip.

### **Site Specific Hazards**

The site is located in a swamp setting and potential dangers may be present. Personnel should be aware of

Alligators

Wasps

Snakes

Spiders

### **Emergency Contact**

911 will used in any emergency.

Cell phones on site

### **Site Safety**

#### **Safety Meeting**

Held at the beginning of each shift.

#### **PPE Requirements**

Hard hat

Safety Glasses

Steel toe boots

#### **Air Monitoring**

A system of air monitoring devices have been placed across the property surrounding the sink hole. One air monitoring device is located next to the access road.

Airboats will have hand held monitors on there person at all times when on the sink hole

#### **Spotters and Warnings**

A person or persons armed with an air horn will be placed on site looking for safety issues such as

Leaning trees

Falling trees

Ground Movement

Driver of the truck attached to the roll off box will remain in the truck at all times and will be ready to vacate the access road on signal.

#### **Heavy Equipment**

Long reach excavator

#### **Environmental**

Vegetation will be placed in lined roll off boxes and disposed of.

Airboats will remain inside the containment boom once entered.

Decon of airboats will take place on location pad next to access road.

10-12-2012

(THIS PLAN CAN BE ADJUSTED BY TBC FOR WEATHER RELATED ISSUES, OR SITE CONDITIONS)

This plan is being followed as an approach to sinkhole management. The primary focus for this plan is to:

1. Recover liquid hydrocarbons that are found on the surface of the sinkhole. By removing the free phase Hydrocarbons that are found on the surface of the sinkhole, off-site migration of these Hydrocarbons will be greatly reduced. Thus, limiting the impacts of the Hydrocarbons to the sinkhole surface and the immediate area. Additionally, the removal of the free phase Hydrocarbons will greatly reduce the "smell" associated with the sinkhole.
2. To further understand the dynamics of the sinkhole, through profiling and visual observation of the surface of the sinkhole.

Phase One focused on the removal of floating vegetation and debris within the sinkhole. To date, the vast majority of floating vegetation and debris has been cleaned and cleared off of the surface of the sinkhole area. On October 8, 2012, we began to bring on site equipment and staffing to move into Phase Two of the Sinkhole Management, Crude Oil Removal.

Crude Oil removal will take place on near the mat road that was constructed on September 24, 2012. Texas Brine began reconstruction of the mat road at well pad #3, going toward the sinkhole. This road has been constructed of river sand, filter fabric and wooden mats. The mat road has been constructed in the previous footprint, to the outside and on the eastern side of the sinkhole.

As discussed in the Phase One Plan for Sinkhole Management, the mat road will play a vital part in our recovery of oiled vegetation and crude oil removal. Texas Brine plans to collect crude oil via physical means with skimmers, and vacuums. We will also use Air Boats to sweep the surface of the sinkhole. Texas Brine has fabricated an oil collection box that will be placed at the end of the mat road, in the water, that will assist in the collection of crude oil.

Product that is recovered will be placed into a frac tank and stored for disposal. These Frac tanks are stored near the sinkhole in an orderly fashion. The vacuum trucks that are used are inspected for leaks and drips prior to leaving the facility for disposal. Occasionally, the Long-reach boom and operator may have to go back out on the mat road to sweep in additional debris that has been swept in by the air boats. The additional debris will be handled as discussed in Phase One. As a safety precaution, the truck driver will be instructed to remain in his vehicle with on ready should any movement be observed on the sinkhole. The truck driver will remain at/in his vehicle during the loading process. A spotter will be placed in a stationary location on Well Pad # 3 to watch for any movement of trees or debris in the sinkhole. Additionally, there will be supervision of the project entire project by TBC Employees.

Texas Brine is following the advice offered by LA DNR and pursuing the use of Oil Gator, as an in-situ remediation of crude oil in hard to reach places or in marginal places where oil may have escaped the containment boom. Texas Brine will not proceed with the use of this material or other materials until approval has been issued by the lead agency on this incident. The use of any such absorbent material will be used to augment the traditional physical oil removal procedures.

If any personnel or contractors are allowed onto the sinkhole, then air monitoring devises will be used to monitor the levels of VOC's on the site.

The safe execution of this activity is the goal of TBC. This is why every person entering the property, must wear proper PPE (Hard Hat, Long Pants, Steel Toed Boots, and Safety Glasses).



34°F Belle Rose, Louisiana ▼

Enter City, State, Country or U.S. Zip code or Airport Id

Local Weather

Local National Global Storms Health Travel Community Forecast Current Radar Satellite wxMap iNav

## Weather Report

Home » Local » Weather Report

### Belle Rose, Louisiana

Weather Report | Interactive Weather Map | Extended Forecast | Hourly Forecast | Past Observations | Historic Averages | Related ▼

#### Current Conditions - °F | °C

As of 6:53 AM on Thursday 27 Dec 2012 (Local Time) from KBTR Reporting Station



Overcast

34°F

Feels Like: 30°

Wind Chill: 30°  
Heat Index: 34°  
Dew Point: 30°  
Humidity: 85%  
Pressure: 30.16"

Ceiling: 1000  
Visibility: 10mi  
Wind: 5mph  
Direction: 90° (E)  
Gusts: NA

Report Text: KBTR 271253Z AUTO 09004KT 10SM OVC010 01/M01 A3016 RMK AO2 SLP213 T00111011 TSNO

View Detailed Observations for the last  
48 Hours · 14 Days

#### Today's Forecast

8 AM P Cloudy 40°  
9 AM P Cloudy 42°  
10 AM P Cloudy 46°

#### Local Information



No Weather Alerts  
for this location

View Complete Hourly Forecast »

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#### 10 Day Forecast - °F | °C

View the Detailed Extended Forecast »

thu	fri	sat	sun	mon	tue	wed	thu	fri	sat
dec 27	dec 28	dec 29	dec 30	dec 31	jan 01	jan 02	jan 03	jan 04	jan 05
P Cloudy	T-Storms	P Cloudy	P Cloudy	M Cloudy	Showers	Showers	Showers	Sct Showers	P Cloudy
59° 48°	72° 44°	56° 32°	56° 39°	65° 53°	62° 43°	59° 36°	61° 41°	61° 42°	61° 43°

#### Details for Thursday, December 27

Sun and clouds mixed. High 59F. Winds E at 5 to 10 mph.

Evening: Cloudy skies this evening. A few showers developing late. Low 48F. Winds ESE at 5 to 10 mph. Chance of rain 30%.

UV Index: 4 (Moderate)

Relative Humidity: 65%

Precipitation: 30%

Snow: 2%

Cloud Coverage: 39%



Sunrise: 6:59 AM  
Sunset: 5:12 PM

Moonrise: 4:54 PM  
Moonset: 6:12 AM



Moonphase: Full



Direction: E (89°)  
Speed: 8Mph(13Km, 7Kts)

#### Daily Forecast Chart

Chart Options: Temperature ▼