

SAVE OUR GULF

State of the Gulf

Thank you to everyone who has stood by the Gulf Coast Waterkeeper organizations over the past year.

Acknowledgments

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Over a year later, our environment and our communities continue to see impacts on a daily basis. Across the Gulf Coast oil continues to wash ashore along beaches and wetlands. Local and state economies and household budgets are still suffering, and health impacts, potentially from exposure to the mixture of crude oil and toxic dispersant, are being reported.

Introduction

On April 20, 2010, the Deepwater Horizon exploded and the lives of eleven people were lost. Nine days later oil began to hit the wetlands of coastal Louisiana. Between April 22 and July 15, 2010, it is estimated that 250 million gallons of crude oil were discharged from the Deepwater Horizon well and 1.84 million gallons of Corexit 9500 and 9527, toxic oil dispersant products, were applied, making the largest percentage of the oil unrecoverable, with unknown long-term environmental impacts.

Our nation has never seen an environmental disaster of this magnitude. Over a year later, our environment and our communities continue to see impacts on a daily basis. Across the Gulf Coast oil continues to wash ashore along beaches and wetlands. Local and state economies and household budgets are still suffering, and health impacts, potentially from exposure to the mixture of crude oil and toxic dispersant, are being reported.

This State of the Gulf report documents the current conditions of the Gulf Coast from the perspective of seven members of the Waterkeeper Alliance. The initiative Save Our Gulf is made up of the seven

Waterkeeper organizations in the Gulf Coast region that continues to be directly impacted by the BP oil disaster: from west to east they are the Galveston Baykeeper, Atchafalaya Basinkeeper, Lower Mississippi Riverkeeper, Louisiana Bayoukeeper, Mobile Baykeeper, Emerald Coastkeeper and Apalachicola Riverkeeper.

The report explains the government's response, BP's actions, the Save Our Gulf environmental monitoring project, and the continuing calls for help by communities working to restore the Gulf Coast's natural resources and communities. The report also discusses what still needs to be done, from creating a Regional Citizens Advisory Council to securing appropriate environmental restoration projects and building more sustainable communities.

Seven Key Findings

1

The BP Deepwater Horizon oil disaster is an ongoing disaster.

The oil is not gone, and long-term impacts are still unknown. If past oil spills are used as a barometer we can fully expect the Gulf Coast to suffer continued environmental degradation for decades. Leading scientific studies are showing that three fourths of the oil is still lingering on the bottom of the Gulf of Mexico, creating an unprecedented and unknown new environmental reality for the Gulf Coast. Oil is also still along the coastal areas in the form of tarballs, strings, and mats as well as in subsurface sandy beach areas. Our governmental and community leaders must work in concert to find long-term, sustainable solutions for recovery and restoration.

2

The BP deepwater horizon oil disaster is a national disaster.

The Gulf Coast serves as a resource for the entire nation. The Gulf of Mexico has one of the most productive fisheries in the world, providing more than two thirds of the nation's shrimp and oysters along with four of the top seven fishing ports by weight. There are over 5 million acres of coastal wetlands along the Gulf, which is about half of the coastal wetlands in the United States. If the Gulf Coast collapses and these resources are lost, it will have negative consequences for the entire nation.¹

The BP oil disaster also proved that the industry and federal and state governments and agencies are not prepared for Oil Spills of National Significance. Deficiencies in regulations and enforcement continue to threaten communities and ecosystems across the nation. At a minimum, Oil Spill Commission recommendations must be implemented in order to ensure a higher level of safety in offshore drilling.

3

There are growing public health concerns on the gulf coast.

While setting up pathways toward ecosystem restoration, the government continues to ignore citizens' calls for action on public health. Currently there is no government forum for those suffering from and concerned about the short- and long-term health impacts. The impacts extend along the entire Gulf of Mexico states and consist of current and ex oil clean up workers and coastal communities. The people of the Gulf Coast are still in need of proper diagnosis, treatment, and medical monitoring. Our health, economy, and environment are interconnected and solutions must reflect this.

4

Citizens' participation must be placed at the highest priority for appropriate restoration.

To ensure responsible and adequate recovery and restoration for sustainable and resilient communities, public participation must be included in all decision making. A Citizen Advisory Council has been added to provide input to the federal restoration framework, and now a Regional Citizen Advisory Council (RCAC) must be established, funded, and given decision-making authority for the Gulf Coast. An RCAC should be charged to help monitor industry compliance, governmental oversight, and scientific research in the years following the nation's largest environmental disaster, thus protecting our environment, communities and economies from additional oil pollution.



5

Dedicate clean water act penalties to the gulf coast for environmental restoration.

Impacted communities need leadership from their congressional delegations to ensure that Clean Water Act penalties resulting from the BP oil disaster are dedicated to the Gulf Coast for environmental restoration. The Gulf of Mexico is a major economic engine for the entire country, and its restoration must be adequately funded.

6

The gulf coast must restore and rebuild sustainably.

The past seven years have been tumultuous for the Gulf Coast. Hurricanes Ivan, Katrina, Rita, Ike and Gustav and now the BP oil disaster have devastated both important natural resources and local economies. In our changing times and climate, the Gulf Coast must show leadership by rebuilding, recovering, and restoring sustainability. Restoring wetlands, oyster reefs, and natural flow regimes can build resiliency back into our coastal communities. We have an opportunity to make fundamental changes to the way we have cared for our environment and natural resources, and we must not let the lessons of this disaster or the gateway to change be lost.

7

Long-term environmental monitoring is essential.

Save Our Gulf Waterkeepers have collected and analyzed over 100 samples of aquatic organism tissue, soil, and water from Gulf of Mexico coastal areas from Louisiana to Florida. We found petroleum hydrocarbon contamination in all of the areas that were sampled and in the tissue of many of the seafood species. The data that we collected also lead us to believe that Polycyclic Aromatic Hydrocarbon (PAH) contamination in some seafood species may be increasing over time. In light of these results we believe that comprehensive long-term environmental monitoring is essential to understanding, protecting, and restoring the Gulf Coast ecosystem in the wake of the BP oil disaster.

National Importance of the Gulf Coast

While the BP oil disaster is no longer on the nightly news or making national headlines, it continues to be an unfolding disaster that will have significant national consequences for years to come. The health of the Gulf of Mexico and its coastal areas is extremely important for our nation's economy and environmental well-being. The four largest industries—oil, tourism, fishing and shipping—create economic activity of nearly \$156 billion on the Gulf Coast each year.² The Gulf Coast boasts more than 50% of U.S. oil and gas reserves and has ten of the nation's fourteen largest ports; it is the largest supplier of the nation's seafood—40% of all seafood consumed in the lower 48 states and 83% of the nation's shrimp and oyster landings, providing 885,000 seafood-related jobs; and it has record population growth.³ Tourism represents a \$33 billion industry along the Gulf Coast, providing more than 620,000 jobs.

The national environmental significance of the Gulf Coast is hard to deny. The Gulf of Mexico itself is 600,000 square miles and covers 1,631 miles of U.S. shoreline. The diversity and complexity of this region make it one of the most productive bodies of water and wetland systems in the nation. According to the Environmental Protection Agency, "the Gulf of Mexico yields more finfish, shrimp, and shellfish annually than the south and mid-Atlantic, Chesapeake, and New England areas combined."⁴ The marshes, swamps, and barrier islands that extend from Texas to Florida lend strategic protection against severe storms while providing shelter and food to a large cross-section of wildlife, including migratory birds. Those coastal wetlands are needed to keep our nation and communities environmentally sustainable.

In spite of these significant natural resources and their contribution to the United States, Gulf Coast communities have suffered cumulative impacts of an oil pollution legacy that has plagued the region for nearly a century. Despite legislation, most oil spills in the Gulf of Mexico go without penalty, financially incentivizing careless oil discharges into our environment. In March 2011, Bloomberg Business and Financial News published an investigation showing that only one in a hundred oil spills in the Gulf of Mexico results in a penalty.⁵ In a similar CBS investigation it was found that in 2009 alone there were 6,500 leaks, spills, fires, and explosions at oil and gas facilities nationwide, and more than 7,450,000 gallons of oil were discharged in Texas, Florida, and Louisiana.⁶ This lax governmental enforcement puts communities across the nation in jeopardy of suffering additional Spills of National Significance. Comprehensive industry reform that prevents further oil pollution is desperately needed to protect communities and the environment.

The lack of both national enforcement and resources dedicated to environmental protection and restoration have led to additional signifi-

156
billion dollars is created by the four largest industries—oil, tourism, fishing and shipping—on the Gulf Coast each year.²

50%
of U.S. oil and gas reserves is from the Gulf Coast

620
thousand jobs are provided by the Gulf Coast tourism industry—a \$33 billion industry.

cant detrimental impacts to the Gulf Coast and its marine environment. Over the history of the regional watershed programs, the Chesapeake Bay Region has received over \$480 million and the Great Lakes region over \$1 billion, compared to the Gulf Region being funded at just over \$86 million. According to the Gulf of Mexico Foundation, an estimated 50% of the Gulf Coast's inland and coastal wetlands have been lost, and up to 80% of the Gulf's sea grasses have been lost in some areas.

The Gulf of Mexico is home to 24 endangered and threatened species and critical habitats. Relative sea level rise impacts along the Gulf Coast have been higher than average due to local land subsidence and an increasing amount of water in the sea. Additionally, the Gulf of Mexico serves as the drainage basin for more than two thirds of the land area of the United States, receiving all the pollution that flows downstream, which results in the well-known dead zone. Without the proper funding and protections in place, we stand to lose the ecological diversity and economic productivity that the Gulf provides to the region and the nation.

Timeline of the BP Oil Disaster and Community Response

March 31, 2010

President Obama announces the opening of the eastern Gulf of Mexico for off-shore drilling.

April 12, 2010

Halliburton runs second set of tests on a new cement blend on the Deepwater Horizon rig, finding it unstable.

April 18, 2010

Halliburton runs another test on cement blend on the Deepwater Horizon rig but does not send results to BP until 6 days after blowout.

April 20, 2010

The first explosion occurs at 9:49 pm at the Deepwater Horizon rig, also known as the Macondo well, or MC252. A short time later a second explosion occurs; 11 people are reported missing and 17 injured.

April 22, 2010

The rig sinks and reports of a 5-mile-long oil slick begin reaching the U.S. Coast Guard. Coast Guard Petty Officer Ashely Butler estimates the leak to be 8,000 barrels of oil a day.

April 23, 2010

U.S. Coast Guard makes the decision to suspend the rescue effort for the 11 missing rig workers. White House Press Secretary Robert Gibbs states, "I doubt this is the first accident that has happened and I doubt it will be the last." BP CEO Tony Hayward arrives on the Gulf Coast, mobilizing senior management in what is already being called potentially the largest crisis the company has seen since a fire that killed 15 people in a Texas refinery in 2005.

April 25, 2010

U.S. Coast Guard, based on underwater camera footage, reports that 1,000 barrels a day are being discharged. An oil sheen covering 600 square miles lies about 70 miles south of the Mississippi and Alabama shoreline.

April 26, 2010

The Wall Street Journal states, "The fallout for BP and the oil industry could largely depend on the spill's severity and the extent of its ecological impact. . . . The job of shutting off the well is made all the more difficult by its location. Much of the critical equipment is under almost 5,000 feet of water on the seafloor. A well in such deep water was unthinkable in prior decades, but the industry has pushed the technological envelope in recent years in its search for new sources of oil and natural gas."

April 27, 2010

The oil is sighted 20 miles off the coast of Louisiana. Mineral Management Service approves two relief wells.

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April 28, 2010

Waterkeeper Alliance learns the true scope of the oil disaster as an environmental disaster unlike any the nation has ever seen.

April 28, 2010

Oil begins reaching Louisiana marshes as governor declares a state of emergency. White House press briefing includes all departments charged with some portion of the BP oil disaster. It is clearly stated that BP is in charge of the operation, will pay for all clean up, and that discharge amounts will change as the days go by and more information comes to light.

April 30, 2010

President Obama suspends new drilling offshore until the cause of the disaster is known.

May 1, 2010

Mobile Baykeeper's Casi Callaway, appearing on CNN, expresses her community's concerns of the serious potential for destruction of vital fisheries and warning about the dangerous impacts associated with use of chemical dispersants.

May 29

Oil washes ashore on Alabama's beaches.

May 30

Latest attempt to cap the well fails.

May 31, 2010

A new attempt to cap the well begins, involving slicing the top off the leaking pipe and siphoning oil into a container on the surface.

June 1, 2010

Save Our Gulf officially launched by Waterkeeper Alliance and seven Gulf Coast Waterkeeper organizations.

June 2

Florida officials confirm oily sheen within 10 miles of Pensacola Beach.

June 3, 2010

Kindra Arnesen of Venice, Louisiana, wife of a cleanup worker, tells CNN reporter that Gulf Coast residents are scared to speak up about the growing public health concerns and the rules against the use of adequate protective gear while working to clean up the oil for BP.

June 14, 2010

President Obama visits Alabama, Mississippi and Florida and calls BP reckless in White House address.

May 3

BP says it will pay for all cleanup costs.

May 4, 2010

Louisiana Environmental Action Network (LEAN) and Lower Mississippi Riverkeeper (LMRK) received and began distributing protective gear to the fishermen to utilize during cleanup activities. The protective gear consisted of half face respirators with organic cartridges, goggles, gloves and sleeve protectors. LEAN and LMRK have continued to provide protective gear to fishermen and individuals going into the polluted areas.

May 6, 2010

Galveston Baykeeper partners with Sierra Club Lone Star to host a press event at the Reliant Center in Houston to demand a moratorium on offshore drilling.

May 10, 2010

A Temporary Restraining Order, was brought by a team of layers led by attorney Stuart Smith on behalf of LEAN and United Commercial Fishermans Association, requiring BP to provide Vessel Of Opportunity (VOO) clean up workers with safety gear.

May 11, 2010

Transocean, BP, and Halliburton executives testify before Congress about the series of events that led to the two rig explosions and the discharging oil. All three executives pin liability on one another.

June 14, 2010

Seven oyster samples are collected, by Apalachicola Riverkeeper volunteers and DACS employee, from summer and winter oyster bars covering the breadth of Apalachicola Bay's oyster harvesting areas.

June 15, 2010

Marylee Orr, executive director of Louisiana Environmental Action Network, speaks to MSNBC's Keith Olberman about the emerging public health crisis on the Gulf Coast resulting from the BP oil disaster.

June 17

BP CEO Tony Hayward testifies before Congress. He apologizes for the oil disaster.

June 30

BP CEO Tony Hayward relinquishes oversight of cleanup and oil containment to Robert Dudley.

July 2, 2010

Hurricane Creekkeeper John Wathen and Waterkeeper Alliance Founder and President Robert F Kennedy Jr. appear on MSNBC Countdown with Keith Olberman to speak the truth about the continuing BP oil disaster.

July 3, 2010

Galveston Baykeeper responds to reports of oil washing ashore on Bolivar Peninsula.

May 14, 2010

Tracy Kuhns and Mike Roberts from Louisiana Bayoukeeper are featured on Time.com to tell the story of Barataria Bay during the height of the BP oil disaster.

May 14, 2010

During a monitoring flight Atchafalaya Basinkeeper, Dean Wilson, finds subsurface oil going into Barataria Bay for the first time. Also he finds a line of surface oil about 2 miles offshore along Grand Isle, Louisiana. He immediately notifies Louisiana Bayoukeeper and his Atakapa-Ishak friends. The oil is coming!

May 19, 2010

Oil cleanup workers demand more protective gear and express concerns about health problems.

May 20

EPA demands that BP use less toxic dispersants to break up oil in the Gulf of Mexico.

May 25, 2010

Louisiana Bayoukeeper, Tracy Kuhns, finds oil sludge on Louisiana shoreline.

May 28, 2010

President Obama visits Louisiana and states that if the latest attempt to cap the well failed, experts will intervene.

July 10, 2010

Atchafalaya Basinkeeper, in partnership with Lower Mississippi Riverkeeper, goes into the Gulf with Drew Wheelan of the American Birding Association to monitor the effects of oil on colonies of breeding seabirds. Government creates rules with huge fines for getting close to the boom around islands, making it very difficult to document oiled birds in breeding colonies. There are no bird rescuers in the area. All Royal Tern chicks in the colony on Queen Bess appear to be dead.

July 16

BP CEO Dean Wilson, Atchafalaya Basinkeeper, becomes a certified bird rescuer.

July 15, 2010

Macondo well is finally capped.

July 21, 2010

Community outrage over the use of toxic dispersants continues to bubble over within the Gulf Coast.

July 26, 2010

Galveston Baykeeper hosts the protest event Hands Across the Sand: Yes to Clean Energy, No to Offshore Drilling

July 27, 2010

Robert Dudley is announced as replacing CEO BP Tony Hayward as of October 1.

August 2, 2010

Lower Mississippi Riverkeeper makes first sampling trip. Water, soil, crab and oyster samples taken from the Big Oyster Bayou area in Terrebonne Parish, Louisiana.

August 9, 2010

Emerald Coastkeeper collects first round of samples of oysters in local fishing and swimming locations.

August 26, 2010

Lower Mississippi Riverkeeper makes a sampling trip to the southern Breton Sound area in Plaquemine Parish, Louisiana. Soil samples are taken.

Sept 19

The government states the Ma-condo well has been permanently sealed.

September 27, 2010

Navy Secretary Ray Mabus releases restoration and recovery report stating that Clean Water Act monetary penalties resulting from the BP oil disaster should return to Gulf Coast, and proposing the formation of a Gulf Coast Ecosystem Restoration Task Force.

Sept 30, 2010

Emerald Coastkeeper collects second set of samples of oysters in local fishing and swimming locations.

October 1, 2010

Emerald Coastkeeper collects third set of samples of oysters in local fishing and swimming locations.

October 5, 2010

President Obama announces formation of the Gulf Coast Ecosystem Restoration Task Force, with EPA Administrator Lisa Jackson as chair.

October 8, 2010

Atchafalaya Basinkeeper samples the Atchafalaya River Delta for blue crab and snails

October 13, 2010

[Earthjustice submits a letter of intent to sue the U.S. Environmental Protection Agency on behalf of Alaska Community Action on Toxics, Cook Inletkeeper, Florida Wildlife Federation, Gulf Restoration Network, Louisiana Shrimp Association, Sierra Club, and Waterkeeper Alliance. This is a result of EPA failing to publish a schedule identifying the waters in which dispersants, other chemicals, and other spill mitigating devices and substances may be used.](#)

October 26, 2010

Lower Mississippi Riverkeeper makes a sampling trip to western Breton Sound area in St. Bernard Parish, Louisiana. Redfish, shrimp, crab and oyster samples taken.

Nov 10, 2010

Tar ball sample collected by Apalachicola Riverkeeper OSPREY project volunteer on Carrabelle Beach, Florida.

Dec 21, 2010

Apalachicola Riverkeeper OSPREY project volunteers return to oyster bar sampling sites from June to resample, and include an additional site where local oystermen had reported seeing suspected oil product.

January 11, 2011

Oil Spill Commission Report is released.

January 11, 2011 – March 3, 2011

Lower Mississippi Riverkeeper makes an on-the-water patrol to the Breton Island area in Plaquemine Parish, Louisiana, in response to reports of oil sheen sightings in Breton Sound. Long trails of heavily oiled sand and scattered tarballs are found spread along the center of Breton Island.

March 3, 2011

Mobile Baykeeper collects water samples at the public beach in Fort Morgan, Alabama, and water and sediment samples in Fairhope, Alabama.

March 16, 17, and 18, 2011

Emerald Coastkeeper collects fourth, fifth and sixth sets of oyster samples in local fishing and swimming locations.

March 24, 2011

Mobile Baykeeper collects water samples at Helen Wood Park on the western shore of Mobile Bay near the mouth of Dog River as well as sediment samples at the public beach on Dauphin Island.

Timeline Sources

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The Ongoing BP Oil Disaster

Though our nation has never experienced an environmental disaster of this magnitude, there are lessons we can learn from past oil spills, the most famous of which is the Exxon Valdez disaster in Alaska in 1989. Unfortunately, the Valdez spill taught us that the Gulf Coast stands at the very beginning of a developing disaster. For instance, it was more than four years after the Alaska spill that the salmon and herring stocks in the area crashed. It took ten years for salmon stocks to recover, and herring stocks remain depleted over twenty years later. We will not know for many years the true cost to our Gulf communities, our economy, and our environment. We must be vigilant in mitigating long-term impacts by dedicating resources to environmental monitoring and management.



Creating an Action Plan for Recovery

In the wake of the disaster, President Obama appointed Navy Secretary Ray Mabus to develop a long-term plan for Gulf Coast restoration. After a series of public listening sessions, Secretary Mabus released a report with recommendations critical to the recovery of the Gulf Coast.

Mabus Report and National Commission on Deepwater Horizon Oil Spill

The “Mabus Report” determined that in order to fund needed restoration, a “significant amount” of all BP fine dollars should be dedicated to Gulf Coast recovery efforts. He urged Congress to pass legislation to this effect, placing the funds in a Gulf Coast Recovery Fund managed by the Gulf Coast Recovery Council. He determined that local communities must lead their own recovery and suggested citizen stakeholders play a critical role in the Gulf Coast Recovery Council to ensure that local concerns were addressed. On July 22, 2011, legislation was introduced in the Senate requiring that 80% of the Clean Water Act penalties return to the region. At the time of printing, congressional negotiations were still under way to pass a bill in both chambers.

The second finding in the Mabus Report was the need for long-term ecosystem restoration. He recommended the formation of a Gulf Coast Ecosystem Restoration Task Force (GCERTF), not only to address damage caused by the oil disaster but also to address the longstanding ecological decline of the region. On October 5, 2010, the GCERTF was created by executive order.

In addition to these findings, the Mabus Report recommended that federal efforts should address the needs for monitoring of the presence of oil, dispersants, and other toxic agents in seafood and to lead research on the long-term effects of oil spills on the environment and human health. These recommendations have yet to be fully addressed. Legislation in the Senate would create, among other things, a fisheries endowment and Centers of Excellence in each of the five Gulf states to conduct long-term research, but no mechanism is currently in place to address the human health component.

Besides appointing Secretary Mabus to address the issue of recovery and restoration, on May 21, 2010, President Obama created by executive order the National Commission on the Deepwater Horizon Oil Spill and Offshore Drilling, generally known as the Oil Spill Commission. Its charge was to examine the “relevant facts and circumstances concerning the root causes of the Deepwater Horizon explosion, fire and oil spill and develop options to guard against, and mitigate the impact of, any oil spills associated with offshore drilling in the future.”

The Oil Spill Commission released its final report on January 11, 2011, with seven categories:

- 1 Improving the safety of offshore operations
- 2 Safeguarding the environment
- 3 Strengthening oil spill response, planning, and capacity
- 4 Advancing well-containment capabilities
- 5 Overcoming the impacts of the Deepwater Horizon spill and restoring the Gulf
- 6 Ensuring financial responsibility
- 7 Promoting congressional engagement to ensure responsible offshore drilling.

The recommendations pointed to a lax regulatory and enforcement atmosphere that eventually led to the nation’s worst environmental disaster. It is our assertion that at a minimum, recommendations by the Oil Spill Commission be implemented to address safety concerns about deepwater drilling.

“Despite the administration's never-again rhetoric and avowed commitment to reform, Interior continues to kowtow to offshore drillers. Congress has been even more derelict in its duty. The House introduced eighty-four bills in response to the BP spill. It passed just two of them. They both died in the Senate. As a result, America is not meaningfully safer from a petro-catastrophe today than it was on the eve of the BP blowout.” — Rolling Stone

Offshore Drilling Moratorium

In the aftermath of the 1969 blowout of the offshore rig Platform Alpha, off the coast of Santa Barbara, California, a moratorium on offshore drilling was put into effect, but the majority of the Gulf of Mexico region was exempted. That exemption highlights how the oil and gas industry wields more power over governmental regulations and enforcement in the Gulf than elsewhere in the country. On March 31, 2010, President Obama stated he would end the moratorium still in effect off America's Atlantic coast and parts of Alaska. He promised that this expansion of U.S. offshore drilling would include ways to protect our environment, stating, “Oil rigs generally don't cause oil spills.”

On May 11, 2010, just twenty days after the Deepwater Horizon exploded and an estimated 250 million gallons of oil began discharging into the Gulf of Mexico, the Obama Administration issued a moratorium on all deepwater exploratory activity.⁷ The ban impacted 36 rigs exploring oil and gas reservoirs in water deeper than 500 feet. The vast majority of rigs extracting oil and gas were not affected, but concerns about possible economic ripples were heard throughout the region. The temporary ban on deepwater exploratory drilling was lifted a month early on October 13, 2010, before the 2010 midterm elections and prior to the release of the Oil Spill Commission's report. Since the ban was lifted, permits are being released at a much slower pace, with the first post-disaster deepwater drilling permit issued on February 28, 2011.⁸

Discovered and then made painfully clear during the BP oil disaster was the federal government's inability to inspect sufficiently the numerous wells under their jurisdiction for safety compliance. There were complex failures in the lead-up to the BP oil disaster. Three of the largest contributing factors are lack of government regulation, inadequate safety requirements, and industry's technological advancements allowing deeper drilling without overhauling and modernizing their protocols for spill response.

Having watched the permitting process for decades, many environmental groups and community organizations consider drilling permits to have been handed out too easily, leaving many Gulf Coast communities referring to themselves as a “sacrifice zone.” When pushed about too little oversight and too much oil pollution, industry executives have repeatedly stated that environmental degradation is nothing more than a justified impact relative to the economic benefits the region enjoys. Due to these systemic industry problems and the government's inability to regulate the industry sufficiently, Gulf Coast Waterkeeper organizations support a continued moratorium until adequate inspection of these rigs can occur.

In response to concerns over permitting, Mobile Baykeeper has reviewed several oil drilling and exploration permit requests made to the Board of Ocean Energy Management, Regulation and Enforcement (BOEMRE) and the Alabama Department of Environmental Management (ADEM) over the past year. Written comments were submitted on three separate occasions requesting a public hearing due to serious concerns about proposed projects' potential for direct and indirect impacts to water quality, wetlands, and wildlife habitat in light of the BP/Deepwater Horizon oil disaster. On both Alabama projects the request was denied and permits were approved. The status of comments regarding drilling off the coast of Louisiana is still pending.

In addition, Mobile Baykeeper has submitted written requests urging the Branch of Environmental Assessment to analyze the long-term impacts from the recent disaster thoroughly; to assess the real costs to the public resulting from offshore drilling implementation of the Oil Spill Commission's recommendations; and to allow ample public input in future drilling decisions.

Where Did the Oil Go?

In the report Deepwater Horizon MC252 Gulf Incident Oil Budget released in August 4, 2010, the National Oceanic and Atmospheric Administration (NOAA) estimated that a large part of the oil discharged into the Gulf of Mexico by the Deepwater Horizon spill was gone.⁹ However, just weeks later, a NOAA official conceded that three fourths of the oil discharged into the Gulf were still lingering in the environment, either as hydrocarbons in dispersed form or possibly evaporated into the atmosphere. “The spill is far from over,” admitted Bill Lehr, senior scientist with NOAA’s Office of Restoration and Response, when questioned during testimony before a U.S. House of Representatives subcommittee.¹⁰

Concerns linger over the unknowns about what has transpired on the Gulf of Mexico bottom and in its depths due to the BP oil disaster. We want to assume the substances will continue to degrade as the Gulf of Mexico ecosystem physically, chemically and biologically processes an unprecedented volume of crude oil, the equivalent of 18 Exxon Valdez spills. The toxicity of the mixture is particularly troubling because of the unprecedented use of large quantities of dispersants, applied both at the wellhead and on the surface. This discharge is a new concoction that was infused into warm Gulf waters, under pressure, at depths of nearly a mile.

Over the past year the tracking effort has been undertaken primarily by three different groups of investigators, each with their own strengths and approaches. The groups can be loosely categorized as **(1)** officials under Unified Command—the rapid response coordination of BP, plus the federal and state agencies, **(2)** independent research scientists, and **(3)** non-governmental organizations (NGOs) and local citizens.

1

Unified Command – Operation Science Advisory Team (OSAT)

In early August of 2010, after the final dissipation of surface oil from the capped well, the focus of Unified Command’s sampling turned to cleanup and determining the locations where actionable oil remained in the Gulf; where “oil removal actions are feasible and consistent with net environment benefit.”¹¹ For the first time, the sampling included analysis of water and sediment for the presence of dispersant compounds as well as PAH compounds and metals.¹² OSAT surveys in the fall of 2010 obtained screening samples for analysis of oil, dispersant, and metals in water and sediments.¹³ The findings discuss a signifi-

cant amount of remaining oil found in varying states of weathering:

“The residual oil evaluated in this report contained high molecular weight hydrocarbons including the more toxic PAHs that are recalcitrant to weathering and microbial biodegradation.”¹⁴

Report findings include 1,426 toxicity tests performed on various water, sediment, and marine species at 647 nearshore locations after August 3; and they indicate that “significant effects” were observed in samples from 18% of the sediment test locations and in samples from 13% of the water sampling locations. These post-August 3 results compared pre-impact sampling from 104 locations with a post-sample size of 137 tests. The graphics in OSAT’s follow-up Ecotoxicity Report demonstrate an increase in the amount of significant effects in toxicity tests for “matched” locations.¹⁵

2

Independent Research Scientists

The independent research scientists include many individuals from research institutions, including but not limited to:

University of South Florida
Mote Marine Lab
Florida State University
Berkeley Lab
University of Georgia
Texas A&M University
Louisiana State University
Georgia Institute of Technology
National Aquarium Conservation Center
Mississippi State University

There is some disagreement within the ranks of the independent researchers as to the fate of the oil and methane dispersed at the MC252

wellhead.¹⁶ For instance, Dr. Samantha Joye, a University of Georgia researcher collecting data in the area in September 2010 and again in February 2011, confirmed lingering plumes of oil and methane, and also found patches of oil up to 2 inches thick on the Gulf floor that stretched as far as 70 miles away from the wellhead. Other researchers, such as Dr. Terry Hazen at Berkeley Lab, maintain that due to a significant bloom of a previously unknown species of microbe in the area of the plume, a large portion of this oil had been consumed by midsummer of 2010.

3

Non-governmental Organizations (NGOs) and Local Citizens

During the year following the BP oil spill, communities along the Gulf Coast came to realize that each step of the restoration process must be watched and thoroughly vetted carefully. The seven Gulf Coast Waterkeepers are in accord that long-term environmental monitoring is essential to understanding, protecting, and restoring the Gulf Coast ecosystem. Waterkeeper Alliance has built relationships with scientists and institutions as they also attempt to understand better the long-term ecosystem consequences of this disaster.

Due to the legal nature of the Natural Resources Damage Assessment (NRDA) process, scientific data are being held until the government is able to build a strong enough case against BP to prove the true scope of environmental damage. This will take several years. Meanwhile, while all parties remain in a vacuum as regards to reliable data, early restoration projects will be funded via a billion-dollar agreement from BP to jumpstart the recovery of the region’s economy and ecology. Over the past year, Save Our Gulf Waterkeepers have conducted an environmental monitoring project from Louisiana to Florida in an attempt to address the information vacuum on the scope of ecological impacts from the BP oil disaster. The results of these tests are presented in the Citizen Environmental Monitoring section of the present report.

Inconclusive Results

The information flow regarding the fate of the oil has slowed considerably since January 2011, because the pre-assessment phase of the Natural Resource Damage Assessment process ended, and the damage assessment phase began. In July 2010 Unified Command, in its commitment to a Joint Assessment Team approach to determining ecosystem damages, agreed to share pre-assessment data collection duties and findings with both the Responsible

Party, BP, and the public. However, in the damage assessment phase, any findings that may be used “to build a legal case against BP” are confidential and will not be shared.¹⁷

Independent research scientists grew significantly more guarded in interviews about their Gulf research work beginning in February 2011.¹⁸ Some of these researchers are submitting research proposals through a new study consortium, the Gulf of Mexico Research Initiative. This entity was set up to study and monitor the long-term effects of the oil spill and its potential impacts on the environment and human health. On August 31, 2011 \$112.5 million of the pledged \$500 million was awarded to eight research consortia.

The nearshore, “visible” oil has largely been identified and remediated where this was determined to be possible in the judgment of Unified Command. Residuals of oil remain, especially in environmentally sensitive areas where cleanup is considered high risk in terms of benefits versus impact. Far less is known about the “invisible” oil. There are almost no baseline data about life in the mid-depth and deep-water zones, where the bulk of the Gulf’s food web resides, and where many commercially important species spawn. This makes it difficult to draw conclusions with relatively limited sampling in a body of water as vast as the Gulf.¹⁹ Reports have been conflicting.

Long-term studies are needed to understand fully the toxicity effects in humans and wildlife, and whether overall environmental background levels of PAHs have been elevated by this spill event. If the fate of the Gulf is similar to that of Prince William Sound, the site of the Exxon Valdez spill, these residual impacts may be persistent; time will tell. Long-term monitoring is the only way to know the full impacts on the Gulf of Mexico and its natural resources due to the large amounts of oil and dispersants released through this event.

Growing Public Health Concerns

Even before oil began to wash ashore across the northern Gulf of Mexico, Save Our Gulf Waterkeeper organizations began receiving calls from Gulf Coast residents with health complaints. These residents were experiencing a wide range of symptoms and were often unable to find relief with their local medical providers. In the early days of the BP oil disaster the most commonly received health complaints were severe headaches, nausea, vomiting, cough, sinusitis, and difficulty breathing. People with existing breathing issues, such as asthma and chronic obstructive pulmonary disease (COPD), were having increased difficulty controlling their symptoms, required more medication, and experienced an increased need for medical treatment.²⁰

In mid-May officials in Louisiana recognized that the BP oil/dispersant might inundate inland fishing grounds. The Louisiana Department of Wildlife and Fisheries chose to grant an emergency early opening of the brown shrimp fishing season. Inland fishermen, whose vessels were ready early, made the opening. The In-Situ Burns were taking place in the Gulf. Prevailing winds began blowing out of the south-southeast. The air in the fishing grounds and communities became thick with the smell of petroleum. Louisiana Bayoukeeper began receiving reports from fishermen experiencing severe headaches, nausea, vomiting, cough, sinusitis, difficulty breathing and severe fatigue. In addition, some reported flu-like symptoms so severe that they had to throw their anchors and remain in a bunk for days before recovering enough to come home. They were strong, healthy men accustomed to putting in long, laborious hours fishing. The fishermen and other fishing community members continue to suffer from these and many other health problems.

Very early in the BP oil disaster, veterans of the Exxon Valdez disaster reached out to the communities of the Gulf Coast, warning communities of the dangers they encountered during cleanup;

they hoped those impacted could learn from their mistakes, and they implored Gulf Coast cleanup workers to use all applicable safety gear.

The best information resource became the fishermen hired to work on the "Vessels of Opportunity" or VOO program conducting oil disaster response. By early May, those fishermen began learning through BP's Master Vessel Charter Agreement that according to their BP superiors, they would be fired if seen using a respirator or any safety equipment not exclusively provided by BP.

Hundreds of fishermen were hired to attach booms to their shrimp boats in place of nets and then drive their boats directly through the BP Deepwater Horizon oil/dispersant slicks to corral and collect the toxic substances. Some vessels worked the In-Situ Burns and burned the oil, while others collected the absorbent boom, bagged it, loaded it on their boats, and hauled it in. Fishing vessels were also used, after dispersant had been sprayed, to "mix" it with the oil by running the vessel back and forth through the oil/dispersant. During the heaviest flows of the disaster, many VOO workers anchored their vessels each night and slept where they worked, often waking at night to the spraying of Corexit and having their cabins filled with the smell of petroleum. Of all the responders working the spill, these fishermen had the highest potential for exposure to toxic air pollutants. In addition to the toxicity of crude oil, they were exposed to the added danger posed by the application of dispersant chemicals.²¹

Despite all the warnings and previous bad experiences, reports of cleanup workers experiencing health problems emerged with increasing frequency.

In the following weeks and months more and more cleanup workers, fishermen and community members experienced health problems that they believed might be related to the BP oil disaster. Symptoms commonly reported to Save Our Gulf Waterkeepers expanded to include skin irritation and sores, irritation of the eyes, nose and throat, nausea, diarrhea, numbness of the extremities, stomach cramps/ abdominal pain, dizziness, confusion, depression, coughing, shortness of breath/difficulty breathing, and chest pains. These individuals also were often unable to get relief or satisfactory diagnosis from their local health care providers.

Communities are finding that local health professionals lack training and knowledge about the health impacts of exposure to both dispersants and crude oil.²² Similarly, there is a lack of information on the long-term health consequences of these toxins, both individually and in combination. Lack of adequate health insurance and fears that private insurers and Medicaid will refuse to pay for tests and visits to doctors contribute to the lack of even primary care.

Over the period since such problems arose, communities have repeatedly asked state and federal decision makers to address their health concerns appropriately. To date no public forum or task force has been set up specifically to address the public health concerns arising from the BP oil disaster. With no alternative, concerned community members have been attending government ecosystem restoration forums and BP claims meetings to express their anger and frustration over the lack of government action.

In a report released on July 27, 2011, the environmental justice advocacy group Advocates for Environmental Human Rights stated that Kenneth Fineberg, head of BP claims, has denied all health claims submitted by Gulf Coast residents. Mr. Fineberg, who led claims for Vietnam veterans over exposure to Agent Orange and also worked with 9/11 first responders, allowed health claims to be paid during those two processes.²³ But over and over again during the BP oil disaster, community members have been told to seek help elsewhere, without any suggestion about where to go. This situation is leading to sustained frustration at both the community and government levels. It is also leading to significant fear, stress, and mental health problems in communities throughout the Gulf Coast.²⁴

In an effort to find some help, people with health problems have been finding their way to community groups and non-profit organizations. It has been extremely difficult for organizations that work primarily on environmental issues to try to become a source of answers and advocacy for those who have become ill and who have nowhere else to turn.

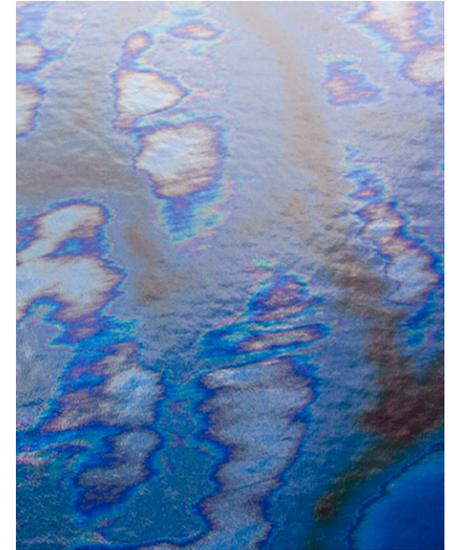
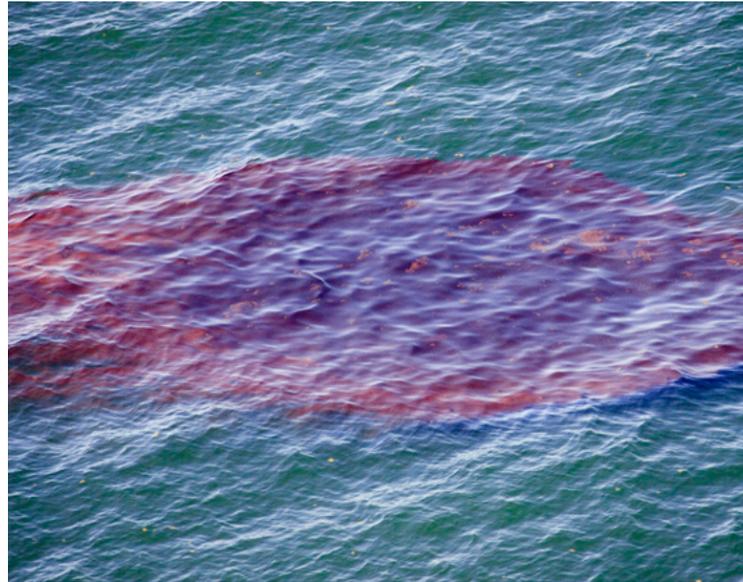
While the exact short- and long-term impacts of the BP oil disaster on Gulf Coast residents' health are currently unclear, Save Our Gulf Waterkeepers continue to receive health complaints from Gulf Coast residents fourteen months after the well was capped. Residents who live and work on the water, particularly people in fishing communities and first responders to the BP oil disaster, are falling ill. At the time of writing, Gulf Coast communities remain without adequate diagnosis or treatment for these health concerns.

Approaching EPA and Human and Health Services

On May 24, 2011, members of 154 environmental, fishing, chemical reform, and community groups sent a letter to the Environmental Protection Agency and the Department of Human and Health Services demanding the following:

- Comprehensive restoration. Our health, economy, and environment are interconnected and solutions must reflect this.
- A Gulf Coast Health Restoration Task Force that includes community members with decision-making authority to address our long and short-term health needs.
- The implementation of the Oil Spill Commission Report Recommendations on health. The Oil Spill Commission stated that EPA should develop distinct plans and procedures to address human health impacts during a Spill of National Significance (See pages 38–39).
- The publication of Material Safety Data Sheets (MSDS) type documents containing lists of potential synergistic health effects of exposure to the combination of oil, dispersants, oil and dispersants combined, any natural and/or bioengineered bacteria, and any other chemical or "natural" product used in response to the BP spill.

EPA responded with a written letter on August 26, 2010 acknowledging the connection between public health and the health of the ecosystem, but offering little in answers to the letter's demands.



BP's Public Relations Machine

"The single message that has been delivered, requested, begged from every type of community leader, whether industry or environmentalist, health official or realtor, is tell us the truth about what's happening. This information proves that the one thing BP has fought from the beginning is letting the public know the truth." —Casi Callaway, Mobile Baykeeper

Those of us on the Gulf Coast who are monitoring the ongoing oil impacts know that the oil is not gone. Yet BP is spending large amounts of money to convince the rest of the nation that the oil is gone. Throughout most of 2010 and 2011, it has been evident that BP is running a public relations campaign, more than a recovery effort. During the height of the disaster, BP officials prevented journalists and residents from taking photos and videos of oil washing ashore and prohibited cleanup workers from wearing important protective gear. Meanwhile, between April 2010 and July 2010 BP more than tripled the amount spent on public relations in the same period the previous year. There is little question that the objective of this deluge of money was to combat growing public image problems.

The money spent was also a tactic to combat its own glaring mistakes in its oil spill response plan. BP received considerable criticism for the details in this plan, and the federal government in turn received considerable criticism for approving it. Most famously, BP included the walrus as a species that would potentially be impacted in a Gulf spill, although the walrus of course is an animal of the far northern seas and does not occur in the Gulf region or anywhere nearer than Alaska, Canada and Greenland.

Besides saturating traditional media sources, the company was quick to leverage a sophisticated social networking strategy. On popular internet search engines, BP purchased search terms related to the oil disaster. This resulted in BP-sponsored websites rising to the top of internet searches on sites like Google and Yahoo, meaning that more legitimate news stories were less likely to reach the public. This is an effective

tactic commonly used by corporations and non-profits alike, but it comes with extra criticism when used in the midst of a disaster felt by millions of people in need of quality and unbiased information.

The company has an active Facebook page, regularly posting articles and updates. In April 2011 alone, BP America saturated its customers with 405 posts about the oil disaster. Corporate public relations tactics such as those seen during the height of the BP oil disaster serve the purpose of "re-creating" the disaster narrative. The objective was to make the oil disaster "disappear"—to make it seem smaller and less devastating than it was. In effect, manipulating internet messages in this way was an attempt to wipe from the minds of all those not actually on the front lines the fact that a disaster even exists.

In early July 2011 the American Petroleum Institute released a report detailing a decline in the number of offshore-related jobs since the BP oil disaster and attacking the slower pace at which deepwater drilling permits were being issued to energy companies.²⁵ The institute's push for business as usual is not surprising when one notes that energy business analysts have forecast offshore operations and maintenance expenditures of more than \$330 billion over the next five years. That is a large reason to scare people away from looking at the very real problems connected to deepwater extraction.

Reports of this kind make headlines. They are part of an organized effort to deflect the attention of elected officials and the public from problems connected to deepwater extraction; systemic problems that have not been rectified since the oil disaster began.

"The huge amount of BP money going to scientists all over the Gulf of Mexico is not only a threat to independent research on the effects of the oil spill, but also a threat to independent science that is essential to stopping illegal activities that destroy wetlands as well as the mispending of restoration funds." —Dean A. Wilson, Atchafalaya Basinkeeper

Citizen Environmental Monitoring

On August 2, 2010, while Lower Mississippi Riverkeeper Paul Orr was en route back from documenting oiled shoreline on the western edge of Terrebonne Parish, Louisiana, he was shown an oyster reef by a local fisherman who from time to time gathered oysters from the reef to bring back to his family as a treat. The oyster reef was a mile and a half up Big Oyster Bayou, well away from the Gulf shoreline and more than 170 miles from the site of the Deepwater Horizon well. There was no sign of oil anywhere in the area. The oysters looked perfect and smelled perfect; to all intents and purposes they were perfect oysters that any oyster lover would have been excited to consume. Orr took a sample of the oysters.

The laboratory reported back that the oyster sample contained 9,780 mg/kg of Total Petroleum Hydrocarbons and 0.016 mg/kg of Polycyclic Aromatic Hydrocarbons (PAHs). According to the Agency for Toxic Substances and Disease Registry, PAHs may reasonably be considered carcinogens. People who that have inhaled or touched mixtures of PAHs and other chemicals over long periods of time have developed cancer.²⁶ It was an eye-opening experience for the Lower Mississippi Riverkeeper and demonstrated that the information coming from the government was inadequate and that additional independent testing was greatly needed. This story would repeat itself as the Save Our Gulf environmental monitoring project tested seemingly perfect seafood organisms and received lab reports of high levels of petroleum hydrocarbons in the samples. In an effort to gain some concrete data on what impacts the BP oil disaster has been having on our Gulf Coast ecosystems and communities, the Save Our Gulf Waterkeepers made it a priority to conduct environmental testing.

Beginning in August 2010 Save Our Gulf Waterkeepers launched an environmental sampling effort under the supervision of Wilma Subra, a MacArthur Award-winning

chemist. One hundred samples of soil, water and seafood organisms were collected along the northern Gulf shore, from the central Louisiana coast to Apalachicola Bay, Florida. It was decided early in the project to focus on the testing of seafood organisms. This maximizes the expenditure of resources, as these organisms tend to accumulate materials from the environment and also have the greatest potential to impact human populations directly with contamination. Samples were collected using best practice sampling methods and were analyzed by EPA-certified laboratories for components of crude oil and oil spill dispersants.

Significant levels of Total Petroleum Hydrocarbons (TPHs) and Polycyclic Aromatic Hydrocarbons (PAHs) were found in many of the samples taken during the Save Our Gulf environmental monitoring project. TPH is defined as the measurable amount of petroleum-based hydrocarbon in an environmental media. PAHs are a specific kind of hydrocarbons that occur in crude oil and can be dangerous to human health.

These results call into question the efficacy of the U.S. Food and Drug Administration's seafood testing and their proclamation that Gulf seafood was and continues to be safe for regular consumption. Based on our test results, we consider the "all clear" for consumption of Gulf seafood to have been premature and based on flawed levels of concern. It is imperative that in-depth independent scientific analysis of Gulf seafood species and ecosystems be undertaken. We are also committed to the position that Gulf Coast commercial fishing families must not bear the burden of this disaster. BP must compensate our Gulf Coast commercial fishing families for all losses resulting from the BP oil disaster, for as long as full recovery takes.

Results of Save Our Gulf Sampling

A selection of the analytical results for 4 samples collected by Atchafalaya Basinkeeper, Lower Mississippi Riverkeeper, Emerald Coastkeeper, and Apalachicola Riverkeeper are presented in the following graphs. For results from all samples taken by Save Our Gulf Waterkeepers, see associated document "Save Our Gulf Environmental Monitoring Project Results June 2010 – August 2011".

Hundreds of different PAHs commonly occur as mixtures in the environment, and toxicological data available on these mixtures are limited. Most studies focus on individual PAHs, and therefore assessing cumulative risks for more than one PAH is a challenge. However, based on the available toxicological data, some PAHs have been classified as probable or possible carcinogens. Naphthalene is not currently listed as a probable or possible carcinogenic PAH (cPAH), although recent studies by the National Toxicology Program have concluded that there is clear evidence of its carcinogenic effects in animals.²⁷

Summary of Results: Lower Mississippi Riverkeeper Sampling

In response to the BP Oil Disaster, Lower Mississippi River Keeper (LMRK), Louisiana Environmental Action Network (LEAN), and Subra Company have performed monitoring, sampling and analysis of the environment and seafood organisms in the estuaries and wetlands of coastal Louisiana from Atchafalaya Bay eastward to the Louisiana/Mississippi state line. Soil samples and aquatic tissue samples from all areas sampled contained Alkylated PAHs and Oil Range Organic Petroleum Hydrocarbons.

Soil samples contained 6 to 89 individual Alkylated Polynuclear Aromatic Hydrocarbons (PAHs) and Total Petroleum Hydrocarbons up to 11,600 mg/kg (1.16%) which corresponded to the fingerprint of the BP Louisiana Sweet Crude. All of the areas sampled had soil/sediments contaminated with Alkylated PAHs and Oil Range Organic Petroleum Hydrocarbons.

Oyster samples have contained up to 8,815 to 12,500 mg/kg Oil Range Organic Petroleum Hydrocarbons. The oyster samples have also contained up the 4 Alkylated PAHs, Fluoranthene, Naphthalene, Phenanthrene, and Pyrene in concentrations of 1.4 to 63 ug/kg. Blue crab samples have contained up to 2,230 to 3,583 mg/kg Total Petroleum Hydrocarbons and up to 4 Alkylated PAHs, Fluoranthene, Naphthalene, Phenanthrene and Pyrene in concentrations from 84.6 to 162 ug/kg. Shrimp samples have contained up to 8,356 mg/kg Total Petroleum Hydrocarbons and 5 Alkylated PAHs, Anthracene, Fluoranthene, Naphthalene, Phenanthrene and Pyrene up to 69.4 ug/kg.

Summary of Results: Emerald Coastkeeper Sampling

Every six months Emerald Coastkeeper is collecting oysters inland of Perdido and Pensacola, to monitor whether these stationary species are accumulating the most harmful components of dispersed oil, PAHs, along with dispersant compounds. The goal of this study is to have a long-term data set to determine whether these species are accumulating toxins associated with hydrocarbon contamination (not to determine whether these species are safe to eat).

None of the four dispersant compounds tested was found during the fall 2010 event. However, one of the compounds tested for in spring 2011, 2-ethyl-1-hexanol, was found in every sample. According to EPA, this chemical is a common food and pesticide additive. However, also according to the EPA, for marine/estuarine fish, the acute toxicity estimates range from 6.5 to 19.5 parts per million; for mysid shrimp, acute toxicity is estimated to be 3.4 ppm; and for algae, 14.6 ppm.²⁸ Concentrations found during our spring 2011 sampling event were much higher than these toxicity estimates, ranging from 40.5 ppm to 69.0 ppm.

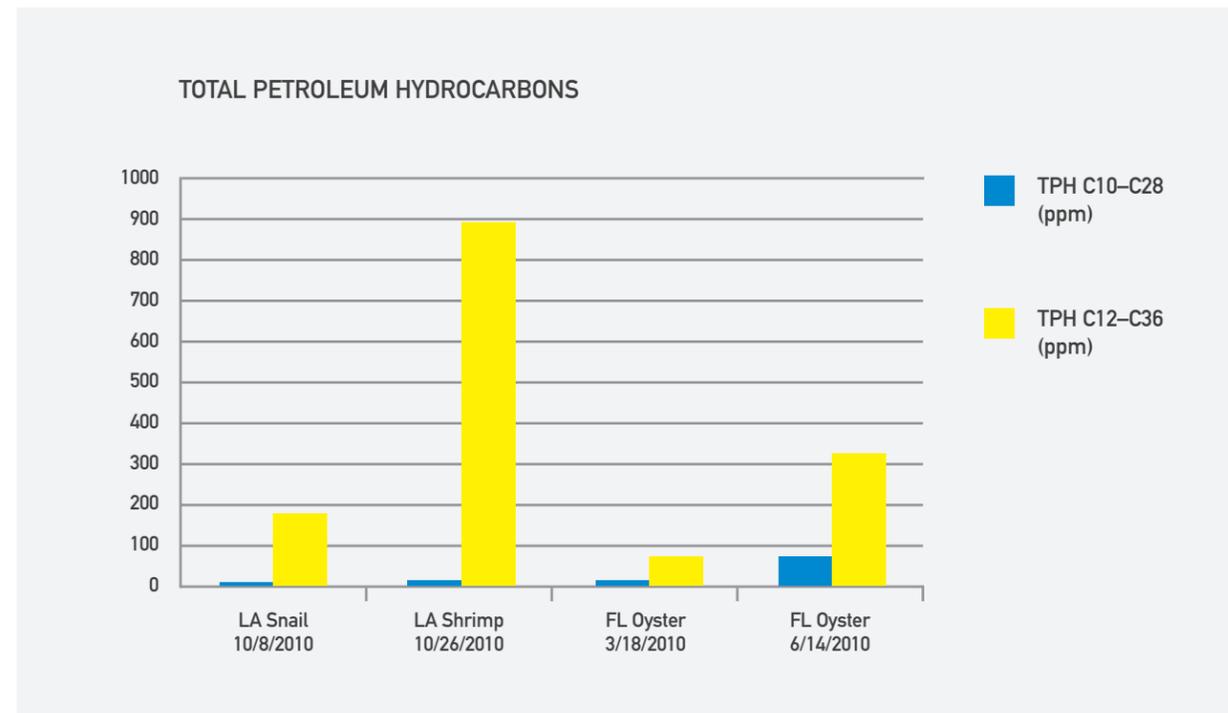
PAH concentrations in oysters increased from the fall 2010 sampling to the spring 2011 sampling inside Perdido, Pensacola, and Destin passes (Figures 1–4). Anthracene, chrysene (a cPAH), fluoranthene, fluorene, phenanthrene and pyrene increased at all three locations; naphthalene (also a cPAH) and anthracene increased at Perdido and Destin. Results are in fact magnitudes less than FDA levels of concern and therefore are far below even the most conservative risk assessments. However, despite the fact that the increased concentrations are well below FDA levels of concern, the fact that PAH concentrations have increased is troubling.

Summary of Results: Apalachicola Riverkeeper Sampling

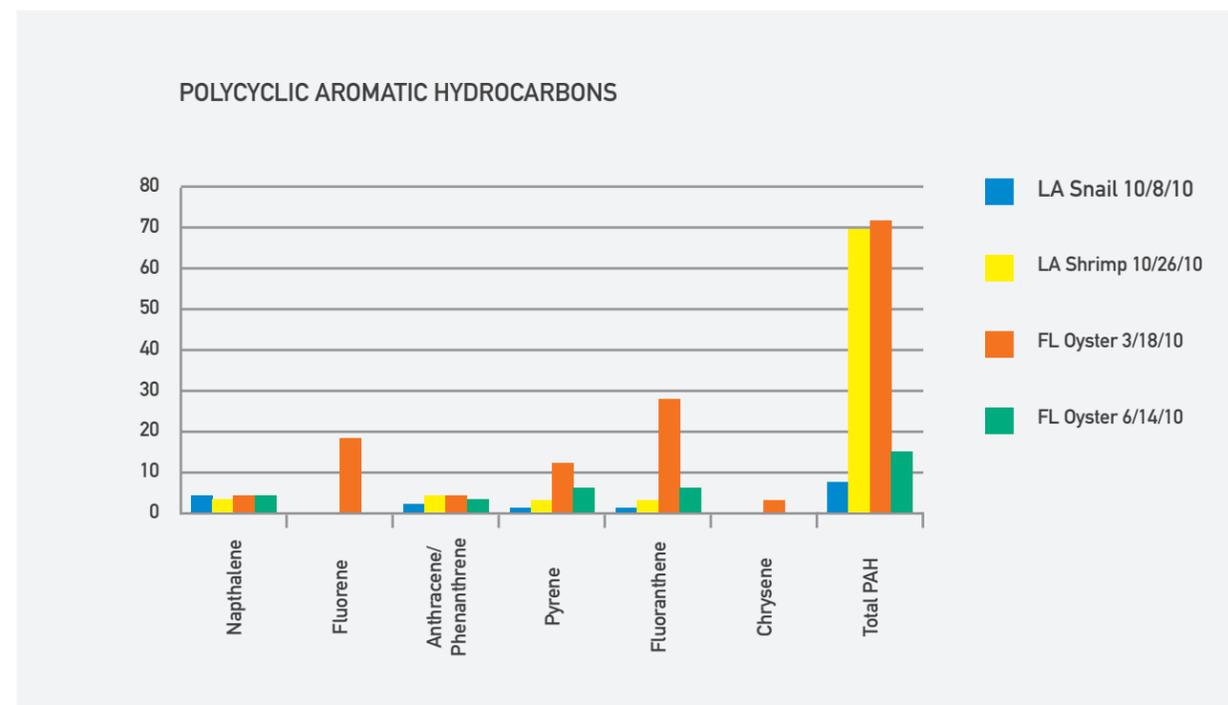
Apalachicola Riverkeeper obtained oyster samples from a representative number of summer and winter harvesting areas in June 2010 and repeated that sampling plan again in December 2010. The purpose of this monitoring project is to have a long-term data set to determine whether these species are accumulating toxins associated with hydrocarbon contamination. Samples were sent to Pace laboratories for analysis to detect the presence and amount of PAH, Total Petroleum Hydrocarbon and select dispersant constituents.

Our results, obtained in mid-January, showed PAHs below the FDA set Levels of Concern for both the June and December sampling data sets. Total Petroleum Hydrocarbon levels in the oyster tissue dropped between June and December, with no dispersant compounds noted in either analysis data set. Testing was conducted in seven locations within Apalachicola Bay. Concentrations of PAHs found during the June 2010 sampling event ranged from 1.36ppb to 14.49ppb. Concentrations of PAHs found during the December 2010 sampling event ranged from 0.54ppb to 4.82ppb.





Graph 1. Total Petroleum Hydrocarbon results from four samples collected by Atchafalaya Basinkeeper (10/8/10), Apalachicola Riverkeeper (6/14/10), Emerald Coastkeeper (3/18/11), and Lower Mississippi Riverkeeper (10/26/10) respectively



Graph 2. Polycyclic Aromatic Hydrocarbons of four samples collected by Atachalfaya Basinkeeper (10/8/10), Apalachicola Riverkeeper (6/14/10), Emerald Coastkeeper (3/18/11), and Lower Mississippi Riverkeeper (10/26/10)

Examination of Government Sampling

Federal Drug Administration (FDA) established levels of concern specifically for the unprecedented Deepwater Horizon disaster and will not necessarily be applicable after all fisheries closed due to oil contamination are reopened for safe harvest. In developing the parameters for levels of concern (LOCs), adjustments for smaller individuals, children, and pregnant women were not taken into account. The seafood consumption rates of Gulf Coast communities also were not taken into account. Residents of the Gulf Coast tend to consume far more seafood than was taken into consideration. In particular, many of the lower-income coastal communities rely on subsistence fishing as a way to supply a significant portion of their dietary requirements.

- 1 Gulf seafood should be tested for heavy metals.
- 2 The U.S. Food and Drug Administration allowed a higher level of contamination to be considered “safe” after the BP disaster than following other oil spills.
- 3 A long-term comprehensive testing plan is needed that covers all types of seafood, includes an adequate number of samples from all impacted areas, and measures all of the relevant contaminants (PAHs, metals, and dispersant chemicals).
- 4 Improvements are needed in community engagement and communication.
- 5 Guidelines should be developed to standardize seafood safety assessments and make them more protective of health.

A study published by the journal Environmental Health Perspectives took a close look at the testing done in the Gulf and compared it to that in other oil spills and to the science on oil-spill contamination.²⁹ Some of the noteworthy findings include:

The graphs on the left show the four samples one from each program that took tissue sampling. These samples are representative of the hydrocarbon contamination that was found by the Save Our Gulf monitoring project. These sample results are below current FDA levels of concern. The Atchafalaya Basinkeeper snail sample “LASnail 10/8/2010” was taken on October 8, 2010 in Atchafalaya Bay. The Lower Mississippi Riverkeeper shrimp sample “LASHrimp 10/26/2010” was taken October 26, 2010 in Breton Sound. The Emerald Coastkeeper oyster sample “FLOyster 3/18/2011” was taken March 18, 2011 in Pensacola Bay. The Apalachicola Riverkeeper oyster sample “FLOyster 6/14/2010” was taken on June 14, 2010 in Apalachicola Bay. For a more detailed look at the Save Our Gulf monitoring project results see document, “Save Our Gulf Environmental Monitoring Project Results June 2010 – August 2011”

Where do we go from here?

The BP oil disaster made it clear that a vital component of restoring the Gulf Coast region is action to make the oil and gas industry fix the damage it has caused and operate with as little environmental impact as possible. The purpose of the Save Our Gulf Waterkeepers includes [making our communities healthy, sustainable, and high quality places to live, work and play](#). For that, the oil and gas industry must also conduct exploration and production as safely as possible.

New Gulf of Mexico Oil Spills

In an effort to address these issues Waterkeeper Alliance has partnered with SouthWings and SkyTruth to form the Gulf Monitoring Consortium. SkyTruth is a non-profit organization that reads satellite images twice daily for oil pollution, and SouthWings is a non-profit that provides skilled pilots and aerial education to promote conservation. The Gulf Monitoring Consortium is a rapid response alliance that collects information by space, air, and water, and analyzes and publishes images and other data, in order to bring truth to oil pollution incidents that occur in the Gulf of Mexico.

The initiative is solely a fact-finding mission, an innovative partnership that is systematically monitoring oil pollution in the Gulf with satellite images and mapping, aerial reconnaissance and photography, and on-the-water observation and sampling. This unique effort led by three non-profit organizations will collect and publish images, observations, and sampling data from the Gulf so as to be able to respond rapidly to reported and suspected oil pollution incidents.

The design of the Gulf Monitoring Consortium is such that SkyTruth will monitor satellite imagery and National Response Center data to identify possible spills. SouthWings will provide flyovers to confirm and document the spills. And Waterkeeper organizations will visit the sites by boat for on-the-water documentation and to take samples.

The Gulf Monitoring Consortium has already put its model into practice on two oil pollution incidents. On June 8, 2011, SkyTruth noticed reports of a sizeable oil slick near Venice, Louisiana, and spread the word via its blog and to other members of the consortium. On June 10, 2011, SouthWings flew an air patrol to the area, discovered a long oil slick coming from a well in Breton Sound, and reported this to the authorities. On June 17, 2011, the Lower Mississippi Riverkeeper made an on-the-water patrol to the well site to document the status

of the well, where the leak proved to have been stopped. The other incident is an ongoing discharge of crude oil at the site of an oil rig that was damaged during Hurricane Ivan in 2004. Due to the combined capabilities of the three organizations, we have been able to gather information consistently on this ongoing violation of the Clean Water Act.

Instances of the discharge of oil into Gulf waters reported to the National Response Center from September 12, 2010, through September 12, 2011, are as follows:

[Insert from SkyTruth database] ????????

The Importance of Citizen Involvement

From the beginning of the BP oil spill disaster, BP has worked to exclude community representatives from access to information and from involvement in protection and cleanup, and the company has worked to separate the community from the very waterways we know and love. Citizens could have been BP's best asset to protect and clean up waterways and shorelines, but instead we were excluded from the process. Waterkeepers and other community leaders are fighting to change that by demanding citizen involvement in everything from restoration planning to oversight of drilling permits.

Citizens Advisory Council

After spending a year working to achieve citizen involvement, coastal residents had their first victory. On May 6, 2011, at the Gulf Coast Ecosystem Restoration Task Force meeting in Mobile, Alabama, Gulf Coast communities were informed that a Citizens Advisory Council would be added to the Gulf Coast Ecosystem Restoration Task Force. At this time neither the charge of this council nor which stakeholders will represent impacted communities has been determined specifically, but the general responsibility is to oversee implementation of restoration planning. Save Our Gulf Waterkeepers' names have been submitted for seats at this table, and we look forward to reporting on the involvement.

Regional Citizens Advisory Council

There is a critical need to establish a Gulf of Mexico Regional Citizens Advisory Council that includes involvement of citizen representatives from the most vulnerable and heavily impacted communities. The formation of Regional Citizens Advisory Council (RCAC) allows for citizens to have oversight influence in areas heavily impacted by the oil industry. The Alaska Oil Spill Commission stated that complicity by the oil industry and federal and state of

officials was the causal factor leading to the Exxon Valdez oil disaster in 1989, according to a brief prepared for Louisiana Bayoukeeper by Joseph Horton of Boston College Law School, Land and Environmental Law Program.³⁰ The brief recommends: "Representation of industry and agencies on any RCAC should be avoided as breaching the separate independent watchdog role of an RCAC, and representation of municipalities directly dependent upon oil industry payrolls should be limited to non-voting membership in order to prevent undue political pressures from affecting the actions of the council. RCACs should provide institutionalized protection for members who publicly express critical or dissenting views of the council, oil industry, and/or government regulators."

Dr. John Devens, executive director of the Prince William Sound Regional Citizens Advisory Council, stated in Community Involvement versus Big Oil: A Case Study of the Policy Process: "When the oil spill hit, there was a lack of local involvement in decision making about the cleanup and a general lack of good information about how events were unfolding. Local individuals had to be hired and trained before a sufficient cleanup effort could even begin, and precious cleanup time was lost. It became painfully evident

Devens lists a number of lessons learned that should be noted by communities looking to create their own RCAC. Several key points stand out:

Citizens are more effective if they have a formal relationship with those in decision-making authority.

Citizen advisory groups should be mandated by a federal or state statute.

All affected stakeholder groups should be represented on the council.

Concerned citizens should have the opportunity to participate in a meaningful way.

Sufficient funding is essential.

that the proper time for planning and training is not after an oil spill has already occurred but before, and that local people should be involved in that process."³¹

Too often, dedicated citizens are placed on Citizen Advisory Committees to fulfill agency requirements, but representatives are given little responsibility or ability to make real contributions in the decision-making process. Practical, local knowledge is discounted or ignored as anecdotal. Elected officials, agency staff, scientists, academics and others often feel they know what is best for impacted communities and produce plans with little or overly controlled input from vulnerable and impacted citizens. Relegating stakeholder comment to an afterthought results in community opposition to policy and slows the implementation process.

The key to seating a truly representative Gulf of Mexico Regional Citizens Advisory Council is for it to be made up of citizens from vulnerable and heavily impacted communities across the Gulf of Mexico. The council must be composed of voting and non-voting members and must include at least one voting member who resides in each of the coastal political subdivisions directly impacted by the Deepwater Horizon disaster across the states of Louisiana, Mississippi, Alabama, and Florida.

Restoration and Holding BP Accountable

The Gulf Coast Ecosystem Restoration Task Force (GCERTF) was created by Executive Order 13554 on October 5, 2010. The charge of GCERTF is to coordinate intergovernmental implementation of restoration, support the Natural Resource Damage Assessment process, present to the President a Gulf of Mexico Regional Ecosystem Restoration Strategy, engage local stakeholders to inform the work of the Task Force, provide leadership and coordination of research needs in support of restoration planning and decision making, and prepare a biennial update for the President on progress toward the goals of Gulf Coast restoration.

Gulf Coast Ecosystem Restoration Task Force Starts Work

Environmental Protection Agency Administrator Lisa Jackson, a Gulf Coast native, was named chair of the GCERTF. Between November of 2010 and August of 2011, the task force has had five meetings scheduled on the Gulf Coast from Florida to Texas. These are working meetings open to the public. They were set up for transparency and include sessions to collect stakeholder input from a spectrum of people from fishermen to hotel owners to members of the regulated community.

The task force has used the listening sessions to enable the community to answer the following main questions about restoration:

[Are these the right goals: Enhance Community Resilience, Restore and Conserve Habitat, Restore Water Quality, Replenish and Protect Living Coastal and Marine Resources?](#)

[What are the critical actions or major outcomes that need to be accomplished as part of this strategy in order to achieve the overarching goals?](#)

[What new programs and actions \(state, federal and private\) are needed?](#)

[What key policy changes will improve the processes necessary to support restoration?](#)

[What would "success" look like, and how should it be measured and reported?](#)

Members of Save Our Gulf have organized and succeeded in pushing for a matrix that prioritizes how restoration projects are defined and for creation of a Citizen Advisory Council; we are still working to ensure that only the best environmental projects rise through the process for both permitting and funding.

Holding BP Accountable through the Natural Resources Damage Assessment Process

In addition to presidential executive orders and immediate action taken by the Environmental Protection Agency and the U.S. Coast Guard in response to oil pollution, there exists a legal process for the government to hold polluters accountable for restoration of the ecosystem damaged by the responsible parties.

Section 1006(e)(1) of the Oil Spill Pollution Act requires a Natural Resources Damage Assessment in the case of a discharge of oil. This is a legal process that holds an oil polluter liable to fund ecosystem restoration. The process has three phases: preliminary assessment, injury assessment/restoration planning, and restoration implementation. The NRDA public scoping period for the BP oil disaster ended on May 18, 2011. The trustees are now compiling comments and have begun drafting the Preliminary Environmental Impact Statement, commonly referred to as PEIS. A first draft is expected to be available for public review and comment in early 2012.³² Through the NRDA process, NOAA, the Department of the Interior, and other federal trustees as well as co-trustees established in each state "conduct studies to identify the extent of resource injuries, the best methods for restoring those resources, and the type and amount of restoration required."³³

Knowing the breadth and depth of the impacts to every area is a key component to ensuring that the NRDA process is complete. Mobile Baykeeper and the local organization Alabama Coastal Foundation joined forces to create the Volunteer Field Observer Program. Using the expertise at Waterkeeper Alliance and the dedication of the Save Our Gulf Waterkeepers, the two organizations researched the NRDA processes and defined protocols for volunteers to collect data in a proper manner that could be useful in the NRDA process. Volunteers have collected data across the Gulf Coast, ranging from location of pollution outfall lines to recording of oil washing ashore. The ultimate goal of the data collection is to create a pictorial review of the Gulf

Coast that can be compared over the duration of the oil disaster and can show if problems are being properly recorded and then addressed. SaveOurGulf.org/observations is the website that houses the data collected. The challenges with NRDA include ensuring that the best data are carefully collected over a long period of time. While there is a critical need for funding, we need to ensure we clearly understand all the problems created by this oil disaster, and it is imperative that federal and state agencies take the time needed to understand all the impacts fully.

Once the data are collected and we move toward restoration, the process becomes one of tracking to ensure that the best projects receive top priority. NRDA funds can only be used for ecosystem restoration of areas, species, and habitats specifically impacted by the BP Deepwater Horizon oil disaster. Because we cannot replace an oiled brown pelican, alternatives must be found, such as creating new habitat, or restoring marshland that fosters the growth or provides healthy breeding grounds for pelicans. Essentially, our federal agencies and the responsible parties negotiate the price of the pelican and find ways to spend the money such that it supports healthy pelicans in the future.

While studies are under way to understand the scope of the damage done, communities are vigilantly holding the government and industry accountable for all damages done by this disaster. In July of 2011, as a result of outrage by Gulf Coast shrimpers, NOAA was forced to retract statements that a dramatic rise in turtle deaths earlier

in the year was a result of fishermen not being in compliance with equipment regulations. But the turtle deaths spiked prior to shrimping season, and NOAA's own figures confirm that large numbers of Gulf shrimpers do comply with requirements for turtle-protecting devices. As a result, the agency has changed its position and decided not to impose emergency measures on the shrimping industry. Science has shown that petrochemical compounds have neurological impacts on marine animals even when no visible oil is detected.³⁴ Full ecosystem restoration depends on the follow-through of appropriate science and a comprehensive NRDA process.

On April 21, 2011, in an unprecedented move toward restoration, NRDA trustees and BP announced \$1 billion to fund early Gulf Coast restoration projects.³⁵ It took NOAA and state trustees three months to negotiate this early settlement. The \$1 billion paid by BP will be taken out of the final amount owed by the company at the end of the NRDA process. The distribution breakdown was agreed as follows: **(1)** each of the five states will select and implement \$100 million worth of projects, **(2)** Federal Resource Trustees, NOAA, and Department of Interior will oversee \$200 million worth of projects, and **(3)** the remaining \$300 million will be used for projects selected by NOAA and the Department of the Interior from proposals submitted by the state trustees.

Early and emergency restoration is extremely important to the long-term recovery of the Gulf Coast. BP and other companies being held responsible for the oil disaster will owe billions of dollars for restoration and punitive damages. The particulars of the settlement will take years to negotiate. Having the opportunity to begin restoration projects now will give coastal areas a better chance at full recovery. As with all restoration projects, it is important that pet projects with political ties are not shepherded in under the guise of early restoration. Citizen oversight and commenting is extremely important in this process.

The Clean Water Act

The purpose of the Clean Water Act is to “prohibit the discharge of toxic pollutants in toxic amounts, provide financial assistance for public wastewater treatment, develop area wide waste treatment management plans, invest in technology sufficiently to result in elimination of discharges, and develop and implement programs for the control of nonpoint sources of pollution in an expeditious manner.”³⁶ The more universal description of the Clean Water Act's purpose is to protect or restore America's waterways to being fishable, swimmable and drinkable. The BP oil disaster is clearly in violation of this critical law that protects our waterways.

The Clean Water Act has been an important tool for defending local watersheds across the country since its inception almost forty years ago, but what it does not ensure is that the penalties resulting from pollution be returned to the area that suffered the pollution. Organizations across the Gulf Coast are mobilizing their families, neighbors and supporters to contact their congressional delegation to pass comprehensive legislation dedicating the penalties from the BP oil disaster to the Gulf Coast for restoration. It is currently estimated that the fines will run between \$5 billion and \$22 billion. Those funds would not make a dent in the federal treasury, but an investment of that size in the natural resources of our coastal communities could make an immense difference for our families, our finances and our quality of life.

On May 12, 2011, Save Our Gulf Waterkeepers sent a letter to the entire Gulf Coast congressional delegation. Our letter asked for leadership in ensuring that Clean Water Act penalties resulting from the BP oil disaster return to the Gulf Coast. Our letter asked that any legislation passed include the following:

- 1 Dedicate Clean Water Act penalties resulting from the BP oil disaster to Gulf Coast ecosystem recovery.**
- 2 A matrix or prioritization tool must be developed to ensure that funds are spent on the best projects and that projects with long-term sustainability and resilience as their basis will rise to the top.**
- 3 An equitable distribution of funds must go to Gulf Coast states based on environmental and economic impact and with strict oversight by the Gulf Coast Eco-system Restoration Task Force.**
- 4 A Regional Citizens Advisory Council must be created and included in decision making to guide the restoration of the Gulf Coast and future oil and gas activity.**
- 5 Legislation must ensure that local communities are able to compete for jobs and contract opportunities by giving preference to the utilization of local workers, small businesses and institutions while providing funding for training and workforce development, especially for vulnerable coastal communities and workers impacted by the oil disaster.**

The Senate has put forward a bill, SB 1400, that answers only a portion of our requests. At the time of printing this report, neither the U.S. House of Representatives nor the U.S. Senate had voted on a bill to dedicate these Clean Water Act penalties to the Gulf Coast.

A Sustainable and Resilient Gulf Coast

Hurricanes Ivan, Dennis, Katrina, Rita, and Gustav in 2004–2008 destroyed communities and displaced residents, forcing many along the Gulf Coast to make a difficult choice: to rebuild from the ground up or not to return home. Juxtaposed with these natural disasters are the human-induced ones. A decades-long legacy of oil pollution can be seen in the unnatural canals of the Atchafalaya Basin, in the high asthma rates of communities like Houston, Texas, and the constant stream of oil leaks and spills in the Gulf of Mexico. The economic, environmental, and social impacts of these storms and oil pollution are the reason many consider the Gulf Coast a sacrifice zone. The BP oil disaster is the latest in a string of devastating events to hit the Gulf Coast in the past six years. As has been reiterated throughout this report, the opportunity to learn the lessons of sustainability and resiliency cannot be lost in the aftermath of the BP oil disaster.

The Gulf Coast must show leadership in sustainability in order to thrive as a region in the wake of these events. The green economy is a growing economic sector nationally. By investing in a green economy on the Gulf Coast, the region has a chance to lead the nation in innovation while mitigating climate change impacts to the area's already vulnerable geographic position.

Gulf Coast states can learn lessons from states that are prioritizing the development of the green-collar sector. For instance, according to the recent report "Many Shades of Green: Diversity and Distribution of California's Green Sector," by the non-profit Next 10, green collar jobs in California grew three times faster than total employment from January 2008 to 2009.³⁷ The report also highlights that manufacturing jobs represent only 11% of the state's employment, while representing more than 26% of green economy employment. Globally between 2007 and 2009, \$1 trillion was invested in green technology. This new level of green investment proves that early adopting investors and entrepreneurs are leading governments in investments in solar, wind, geothermal, and ocean/hydro energy efficiency and in agriculture related to the green economy.³⁸ It is estimated that in the BP oil disaster the cleanup costs alone reached \$5 million a day; investments in wind energy at that rate would result in the ability to power 900 homes each day.³⁹



The Save Our Gulf Waterkeepers see the Gulf Coast cities and towns as the future leaders in sustainability for our country. The tragic events that have hit our shores over and over again must not defeat our communities; they must instead help us reevaluate how we design our cities, construct our buildings, build our local economies, care for our wetlands, and invest in a more sustainable future.

Notes

ADDITIONAL RESOURCES Full sampling chart

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Save Our Gulf Waterkeepers

Save Our Gulf is a coalition of Waterkeepers brought together in the wake of the BP oil disaster to lead the fight to restore and protect local watersheds, coastal communities and the Gulf of Mexico. We hold polluters and decision makers accountable and promote the sustainability of our communities. Our vision is for all communities to have waterways that are swimmable, drinkable and fishable.

Save Our Gulf is made up of the following seven Waterkeepers located on the Gulf Coast coordinated by one Waterkeeper Alliance staff member based in New Orleans, Louisiana.

Apalachicola Riverkeeper Dan Tonsmeire is based in Apalachicola, Florida. The Apalachicola Riverkeeper monitors the Apalachicola from the Florida/Georgia line downstream 108 miles to the estuary and bay on the Gulf. Particular attention is paid to reductions in life-sustaining fresh water, loss of floodplain habitat, point and non-point source pollution, and explosive growth and development in this region.

Atchafalaya Basinkeeper Captain Dean A. Wilson is based in Baton Rouge, Louisiana. The Atchafalaya Basinkeeper works to protect deep swamps, wetlands and cypress forests in southern portions of the state.

Emerald Coastkeeper Jamie Rodgers is based in Pensacola, Florida. The Emerald Coastkeeper serves the watershed in northwest Florida, working to respond to citizen reports of pollution and adverse environmental impacts from the Alabama/Florida state line to Perdido Bay and from Panama City to West Bay.

Galveston Baykeeper Charlotte Wells is based in Seabrook, Texas. The Galveston Baykeeper keeps the bay vital and vibrant for all who enjoy it and make their livelihoods through it.

Louisiana Bayoukeeper is based in Barataria, Louisiana, where Tracy Kuhns and Mike Roberts work closely with coastal communities in coastal Louisiana's bayou country to promote sustainable management of its local waterways and natural resources.

Lower Mississippi Riverkeeper Paul Orr is based in Baton Rouge, Louisiana. The Lower Mississippi Riverkeeper works to preserve and restore the ecological integrity of the Mississippi River Basin and the surrounding waterways in Louisiana.

Mobile Baykeeper, based in Mobile, Alabama, provides citizens a means to protect the beauty, health and heritage of the Mobile Bay watershed and Alabama's waterways and coastal communities. Priorities of the organization are clean water, clean air and healthy people along with responsible government and a healthy economy.

Waterkeeper Alliance is a global environmental movement uniting more than 190 Waterkeepers around the world and focusing citizen advocacy on the issues that affect our waterways, from pollution to climate change. Waterkeeper Alliance is the voice for the world's waters.

