

By Sean Gardner for USA TODAY

On the beach: Tar balls are scattered on Horn Island off the Mississippi coast. During the oil spill, BP got thousands of ideas for containing and cleaning up oil.

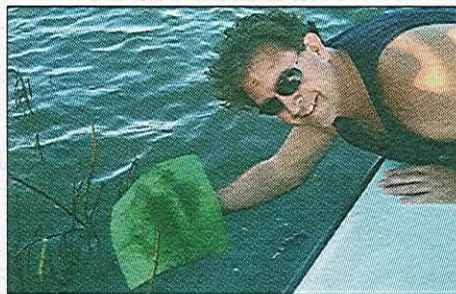
Ideas poured in for BP oil spill cleanup

No magic bullets, but tactics that worked could improve industry's response next time

By Julie Schmit
USA TODAY

HOUSTON — As oil spewed from the BP well in the Gulf of Mexico last summer, so did ideas on how to stop it and clean it up.

BP received about 123,000 ideas, 80,000 of which had to do with plugging the leak and 43,000 on ways to clean up the oil. The ideas came



Workable: Scott Smith of Collect Technologies shows his oil-absorbing Opflex foam.

in crayon from 9-year-old boys, in shaky handwriting from 90-year-old men and from scientists, inventors and engineers — even actor Kevin Costner.

Cover story

Most of the ideas weren't workable: freeze the well into submission or bury it in a nuclear explosion. Many of the ideas had already been tried or discarded. Some of the ideas would've created other problems: dump popcorn from airplanes to soak up oil but create a tasty toxic treat for marine life.

But more than 100 ideas were good enough to

Please see COVER STORY next page ►

Entrepreneurs had some of the best oil-sopping ideas

Continued from 1B

be tested, and more than two dozen were deployed to help clean up the oil. While there were no magic bullets buried in the entrepreneurial surge, there were improvements to existing clean-up technologies. They'll improve the industry's ability to respond to future spills, given new skimmers to scoop oil, new boom to sop it up, new equipment to

Cover story

clean beaches and other technologies, BP and others say. "If there's anything good to come out of this spill, that'll be it," says Hunter Rowe, a BP senior manager who has worked since May on vetting the submissions. "We were hoping for the breakthrough, the silver bullet. None came," Rowe says. Instead, people made "incremental improvements," he says.

That's typical for the oil spill response industry, which has long been starved for research funding. Federal funding for oil spill response research was cut in half between 1993 and 2008, falling to \$7.7 million in fiscal year 2008, data from the Congressional Research Service show. That occurred despite calls for more research after the Exxon Valdez spill in 1989 — the most notorious U.S. oil spill before BP's.

"We were still using the same techniques on the BP spill as we did with the Exxon Valdez," says Bob Deans of the Natural Resources Defense Council. "That's what angered people."

Douglas Helton of the National Oceanic and Atmospheric Administration testified at a congressional hearing last year that oil spill research in the private and public sectors had declined, in part, because larger spills had become less frequent.

As a result, there's little incentive for companies to invest in potentially expensive products that serve as the equivalent of a "seat belt," Costner testified at a congressional hearing in June. He invested \$20 million in an oil-water separator that grabbed his attention after the Exxon Valdez spill. BP leased 32 of the machines, but only after the spill and after facing a firestorm of public scorn.

"In the past, the whole effort for the oil companies centered ... (on) preventing a spill," says Bruce Bullock, director of the Maguire Energy Institute in Dallas. "Hopefully, this event has changed that, and companies will think about prevention, containment and cleanup."

The ideas came to BP from more than 100 countries. At the peak, about 4,000 a day poured in via e-mail, websites, BP's call center and even command posts set up amid Louisiana's marshes and Florida's beaches.

"I had 50 nutcases a day walk through the door," says David Kinnaird, a BP project manager who helped coordinate BP's response from a Louisiana command center.

But Kinnaird saw something workable from Scott Smith, who marched into the command center as the spill unfolded.

Smith's company, the Massachusetts-based Collect Technologies, makes a foam, Opflex, that repels water but absorbs oil. Previously used in the medical, construction and other fields, Smith brought it to the Gulf and "spent days living with fishermen" trying to get his foam into the water.

All sorbent-boom manufacturers claim that their products repel water. But sooner or later, they don't, Kinnaird says. BP's



Island: A Beach Tech 2000 cleans up tar balls on Horn Island, off the Mississippi coast. BP got thousands of ideas for cleaning up after the spill. By Sean Gardner for USA TODAY



Tested: BP sent Scot Weiss a letter that said his Parachute Skimmer was "effective in shallow water, around docks."

tests found that Opflex went weeks without absorbing water. When oiled, it could be wrung out and reused. It's also biodegradable, Kinnaird says. Traditional absorbent boom often ends up in landfills as hazardous waste.

"This was completely different from anything I'd seen," Kinnaird says. Through the spill, BP bought 2 million square feet of Opflex, which can be in pads, pompoms and sausage-like boom. Overall, more than 11 million feet of boom was deployed in the spill.

The best ideas

Most often, the best new ideas identified by BP came from entrepreneurs like Smith — not conglomerates.

Greg Huntsman and Tim Pedigo, two Missouri real estate developers, had spent 18 months "sitting on our hands," Huntsman says, as their business withered with the recession. Then the oil started spewing, and a global nightmare — and moment of opportunity — arose.

Pedigo called a distant relative (his nephew's wife's dad) who sold boom to sop up oil. The partners headed to the Gulf "following the money," Huntsman says.

After watching cleanup crews spray oil off boom stacked on slippery wooden pallets, Pedigo thought: "I can automate this."

He sketched the design for the Boom Blaster, a car-wash-like contraption to clean boom, a task

typically done by hand with hoses. Two childhood buddies, who own a car wash manufacturing plant in Missouri, built it.

The blaster cleaned six times as much boom per person than if the work were done by hand, BP says. "It was kind of a cocktail napkin sketch," Pedigo says.

Lee Dragna, 37, sketched his idea for a supersize skimmer, The Big Gulp, while in a La-Z-Boy recliner watching TV. "I kept thinking, 'It can't be this easy,'" says Dragna, who's president of barge builder Lad Services in Morgan City, La.

Dragna attached skimmers to the front of a barge to suck in oil and water. He tested a prototype in his pool. BP says the football-field-size skimmer collected 10 times more oil a day than many smaller and conventional skimmers.

The inspiration for The Big Gulp? Dragna's 10-year-old son, Andrea. He was miffed because he couldn't fish because of the spill. "He said, 'Dad, you can fix anything. You can fix this. Just try,'" Dragna says.

Other entrepreneurs likewise played off their strengths.

Mike Halloran, 46, who sold lawn-mowing equipment in Chicago, watched the spill on TV and recalled a contraption used to clean beaches in Spain. He tracked down the device and hit the road for the Gulf, planning to attach it to a two-wheel, self-propelled tractor made by lawn-mower company Gravely.

"We can have a snow blower on the front one day, clean a parking lot with a sweeper the next and then clean tar balls off the beach," Halloran says.

The beach cleaner lifts the sand and shakes it. Clean sand falls to the beach through a screen. A hopper traps bigger tar balls. The machine cleans a half-acre beach in 60 minutes vs. four hours for a 10-person crew with shovels and bags — the most-often-used beach-cleaning method, Halloran says. BP put 10 of the machines to work and found it good for use in small areas.

For many of the entrepreneurs, patience was a must. The Massachusetts-based MicroSorb Environmental Solutions, which makes what it says is a safe, hydrocarbon-eating microbe, reached out to BP in April, shortly after the spill began, to get its product into the Gulf. Last month, BP began the first tests on some of the 200 microbe proposals it received, Rowe says.

"We said three months ago that (microbes) should be tested," says Billy Nungesser, the president of Plaquemines Parish, La., and a frequent BP critic. "We're a day late and a dollar short," Nungesser says.

Most people, after submitting ideas to BP, waited weeks or months just to get a rejection.

"In June, we couldn't keep up," says Michael Cortez, who also works on BP's technologies team and who, like Rowe, is a BP retiree who returned to help with the spill. By July, BP had 100 people working on the ideas.

The one that stopped the flow of oil was a cap that was placed over the well in July. That solution originated from BP engineers, the company says. But hundreds, if not thousands, of similar ideas came from the public, Rowe says.

Despite the chaos, "We didn't miss anything great," Rowe says.

Others aren't so sure. InnoCentive, an Internet-based network that links scientists, engineers and others around the world, put out a call for solutions, too. It got more than 2,500 submissions. BP never tapped the resource, saying there were too many legal issues, says InnoCentive CEO Dwayne Spradlin.

"The notion that we weren't using all the tools we had is incredible to me," Spradlin says. "The world deserves better."

Get rich quick?

No one is likely to get rich from any of their new products. BP has spent \$11 billion on spill response so far. But because bigger spills are rare, there's only so much of a market for new prod-

ucts. Finding customers beyond BP has been tough, the entrepreneurs say.

From the Gulf, Smith took Opflex to China and demonstrated it for government officials after an oil pipeline blast there. He hopes to sell Opflex to spill response contractors in the U.S., too. But he fears they won't buy it because they may make more money deploying traditional boom. "They don't necessarily want to see a product that's reusable," Smith says.

The Boom Blaster was packed up and returned to Missouri. The partners are chasing oil producers in Brazil, oil spill response firms and the U.S. Coast Guard, which often deals with boom, Huntsman says.

Dragna says he's recouped his more than \$1 million investment in The Big Gulp from contracts with BP. But he's yet to find another customer. One oil spill response contractor told Dragna the barges were too pricey to have on standby, Dragna says.

He hopes to entice oil companies to together pay a standby fee. In July, several oil companies led by ExxonMobil did something similar when they pledged \$1 billion to build a system, deployable within 24 hours, to seal a blown deep-water well.

The Obama administration has asked for an increase of \$8.6 million for fiscal 2011 for oil spill research funding. That's on top of \$6.3 million for fiscal year 2010. Congress has not yet acted on the request. Also, federal legislation has been proposed to require agencies to establish processes to evaluate and deploy cleanup technologies. But only one of the bills specifies funding — and at not more than \$5 million a year.

For now, BP says it'll continue to test and develop the ideas it collected. The team has shrunk to 14. Along with the 100 tested ideas, BP says an additional 400 submissions need further evaluation but that some may be feasible.

Leaders in the industry fear progress will stall once major spills fade from the news.

"There will be a strong focus for some years ... but in the absence of a significant (spill) for an extended period, apathy will fall in place," says Jim O'Brien, founder of O'Brien's Response Management, BP's top management contractor for the spill.

Legal Notice

Legal Notice

Did You Purchase or Lease a New Car or Truck Manufactured by Any of the Following Automakers During 2001 to 2006?

Acura	Chevrolet	Honda	Land Rover	Mercury	Pontiac
Audi	Chrysler	Hummer	Lexus	Mini	Saab
BMW	Dodge	Infiniti	Lincoln	Nissan	Saturn
Buick	Ford	Jaguar	Mazda	Oldsmobile	Toyota
Cadillac	GMC	Jeep	Mercedes	Plymouth	Volkswagen
					Volvo

If So, Two Class Action Settlements May Affect Your Legal Rights and You May Be Eligible to Receive a Payment

Two settlements resolve claims against Toyota Motor Sales, U.S.A., Inc. ("Toyota") and the Canadian Automobile Dealers' Association ("CADA") in several lawsuits across the country. The lawsuits are about an alleged conspiracy among several automakers to keep Canadian new car exports out of the U.S. Toyota and CADA assert that they have acted lawfully and independently and that there is no legal or factual basis for these lawsuits. This is just a summary—for more info, visit www.CanadianExportAntitrust.com.

Who Is a Class Member? You are a Class Member if you reside in the U.S. and purchased or leased a new vehicle manufactured by one of the automakers listed above from a dealer in the U.S. during the period from January 1, 2001 to December 31, 2006.

What Are the Lawsuits About? The lawsuits claim that several automakers (Chrysler, Ford, GM, Honda, Nissan and Toyota) and a dealer association (CADA) conspired with each other to prevent cheaper, but virtually identical, new cars from being exported to the U.S. from Canada. The lawsuits allege that this violated state antitrust and consumer protection laws and caused new vehicle prices in the U.S. to be higher than they should have been. After considering the extensive evidence of the case after seven years of litigation, the federal Court has ruled in favor of the non-settling defendants and dismissed them from the federal lawsuit. Related lawsuits in state courts in AZ, CA, FL, MN, NM, TN and WI, however, continue against several of the same automakers. See the website for details. If you are a California resident, you should follow the link on the website concerning the pending California class action lawsuit to see how that case may affect you.

What Do the Settlements Provide? Toyota has agreed to pay \$35 million, and CADA has agreed to pay \$700,000, to settle the lawsuits. Toyota and CADA have agreed not to conspire or share information with others aimed at stopping Canada-to-U.S. new vehicle exports. It is proposed that \$500,000 to \$1,000,000 of the settlement funds be donated to a nonprofit or government agency engaged in educating or advocating for car buyers.

Will You Receive Any Payment from the Settlements? That depends. You are eligible to file a claim for a payment if you are a Class Member and all of the following apply to you:

1. You purchased or leased your new vehicle during the period January 1, 2001 to April 30, 2003;

2. At the time of your purchase or lease, you resided in one of the following "Eligible States": AZ, AR, CA, ID, KS, ME, MA, MI, MN, MS, NE, NV, NH, NM, ND, SD, TN, VT, WV or WI; and

3. You purchased or leased from a dealer located in one of the Eligible States.

How Do You Ask for Payment? You must submit a claim, which you should do online. A detailed Notice, available at the website, contains all the information you need to submit a claim.

What Are Your Options? You have a choice whether or not to be part of the proposed settlements.

1. If you want to be part of the proposed settlements and you are not eligible for a payment, you don't need to do anything.

2. To get a payment, you must be eligible and file a claim. You should file your claim online at the website. Your claim must be submitted by February 1, 2011.

3. If you do not want to be part of the settlements you must exclude yourself, in writing, by January 28, 2011.

4. If you do not exclude yourself, you may object to either settlement, in writing, by January 28, 2011.

The detailed Notice explains how to exclude yourself or object.

The U.S. District Court for the District of Maine will hold a hearing on February 18, 2011 at 10:00 a.m. to decide whether to approve the settlements. Attorneys for the Class have not been reimbursed for nearly \$10 million in out-of-pocket costs, including expert witness fees, and have not been paid any attorneys' fees for litigating the case for over seven years and negotiating the settlements. The Court will consider whether to approve payment of attorneys' fees and costs, combined, not to exceed 30% of the settlement funds plus interest to the attorneys for the Class. You may object to the request for attorneys' fees and costs, in writing, by January 28, 2011.

If you do not have any Internet access, please call 1-866-266-9034 for more info and to learn how to submit a claim by mail.

FOR MORE DETAILED INFORMATION VISIT www.CanadianExportAntitrust.com