

American Press SUNDAY TALK



Jason Theriot is the author of "American Energy, Imperiled Coast."

Donna Price / American Press

SPOTLIGHT ON AN IMPERILED COAST

In his new book, Jason Theriot examines the role the oil and gas industry has played in coastal land loss

By Bobby Dower
bdower@americanpress.com

Energy and environmental historian and consultant Jason P. Theriot's book, "American Energy Imperiled Coast" looks at the history of oil and gas development in south Louisiana and its impact on the state's endangered coast. Theriot talked with the *American Press* about his research work and his book.

American Press: What prompted to write the book "American Energy Imperiled Coast"?

Jason Theriot: It began as a Ph.D. dissertation at the University of Houston. But the idea for the book began many years before that. I've always been fascinated and concerned about coastal erosion, particularly in southern Terrebonne Parish which is where

the Theriot people originally came from. My grandfather was born there just south of Chauvin in a little town called Boudreaux Canal right near Lake Boudreaux and grew up within the shrimping industry. His dad, my great-grandfather, Desire Theriot, was the manager of a shrimp factory for four decades.

So the coast, the shrimp, the estuaries, the wetlands were a big part of my family's past and we still have family camp down there in Cocodrie. It's a great summer fishing camp that has been there since 1965, since (Hurricane) Betsy. So that's how our family stayed connected to our cultural heritage in Terrebonne.

My dad and I have been recreating at Cypremort Point (near Vermilion Bay) since I was a teenager. That's the marsh I grew up in. But I always had this desire and this interest to continue to go back to the Cocodrie area.

When I went back for the first time in 15 years in 2005 — I had been a boy the last time I had been there and I had a lot of fond memories, photographs, of course, during those trips, pulling a shrimp trawl with my dad in the little canals — I remember all that. When I got to lower Terrebonne the summer before the hurricanes hit, I was astonished at how rapid the erosion was occurring in that particular place. And I have been subsequently going back every year.

In 2008, after the storms, the natural bayou ridge on Bayou Little Caillou which is where our camp is located, historically had been this really lush, very green lively oak grove, this natural tree ridge, this bayou ridge. I remember it as a kid and I have seen photographs and I have photographs going back. It looked like a forest and they were grazing cattle on the other side. It looked like a pasture, like something you would see out here south of Highway 14.

Those trees were pretty much gone. You could begin to see the sun rising behind the marsh which we had never seen before. And after (Hurricane) Gustav, the only thing left were the skeletons of those trees because of the saltwater.

It was a personal endeavor that became a scholarly endeavor. The question I posed to myself was what role has the oil and gas industry played in this phenomenon, this coastal land loss.

I was also born and raised in the oil and gas industry. My mom still works for the same oilfield service company — a fabrication yard for 30-plus years. My step-father who raised me with my mom, he owned his own fabrication yard where I worked. If you are from New Iberia or Lafayette or Acadiana, you've got some connection either directly or indirectly to the oilfield service business, if not the oil companies themselves. It's a big part of my life and a

big part of our culture. I recognize that. It has benefitted myself and my family without a doubt, as it has for tens of thousand of other people from south Louisiana.

I wanted to know about those canals, about how these canals evolved, how were they designed and built, how did they become a standard practice and what is the relationship between the canals and coastal land loss and what is being done to mitigate and address the problem. So that was the key question.

I had the opportunity to answer that beginning with a dissertation research which was very extensive and then covert that into a book which LSU Press was very eager to pursue. It is the first book in a new series called the Natural World of the Gulf South. And so they started a new series, an environmental history series. And that's what my Ph.D. is in, that's the field that I studied, energy and environmental history. They wanted the book and this is the first book in that new series.

They worked with me very closely over the two years from the time I first met them to the finished product. The book just came out in March of this year. That was a big shift to go from a dissertation, which was designed and written for an audience of five, five of my peers, many of whom are environmental historians and scholars, and to be able to take that same material and

Q&A

JASON THERIOT

revise it to where it could be understood and beneficial as far as transfer of knowledge, explaining this complex problem to a much broader public audience, non-scholars and non-academics. That was a big challenge.

First of all you have to cut all the footnotes, take out all the academic jargon and make it readable, more of a compelling story. There's a cast of characters that are in this book from the leading scientists to some of the first oil and gas pioneers, the pipeliners who actually went into the marshes in the '50s, '60s, and '70s and actually built these systems. I met these guys and I interviewed them along with the leaders of the Louisiana's version of an environmental movement which was the coastal restoration movement led by the Coalition to Restore Coastal Louisiana.

Of course, (Lake Charles) Mayor Randy Roach (then a member of the state Legislature) was instrumental in passing Act 6 in 1989, which essentially provided the state with the tools and mechanism to cost-share for the CWPRA (Coastal Wetlands Planning,

Protection and Restoration Act) projects with the federal projects. That provided not only a wetlands trust fund, but legislation and the mechanism to partner with the federal government to begin these experimental projects which are now going on more than 15 years of projects.

They've been very beneficial from an experimental standpoint. We've learned what works, we've learned what's cost-effective and we've learned what doesn't work. Now let's take the ones that work and that are cost-effective and multiply those across the coast.

I also interviewed fishermen. There are a number of political actors in this story. Of course, Sen. Mary Landrieu was a champion of offshore revenue sharing to be able to share in the profits of oil and gas with the federal government and dedicate that money to coastal restoration with the GOMESA (Gulf of Mexico Energy Security Act). She was very active and her voice at congressional hearings were very useful and provided a color commentary in this book, particularly in the late 1990s and going into the 2000s, and groups like the America's Wetlands Foundation, some oil companies, like I said some of the leading scientists (are in the book). It's a history book, but it's filled with many, many voices — the

See Q&A, B4



SUNDAY TALK

Q&A

Continued from B1

stakeholders and those who are most concerned and affected by coastal land loss, including the oil and gas perspective.

What I argue in the book is Louisiana's coastal land loss is a game-changer, a political and economic and environmental game-changer. It's become a priority for the state. It's forced a new way of thinking about our coast, about the value of wetlands. It led to the reorganization of state government and the creation of CPRA (Coastal Restoration and Protection Authority), taking the levee boards out and stripping some of the jurisdictional power from the old power bosses of the coast, if you will. But also integrating the ability and the necessity to integrate flood protection levees with restoration, so combining those two.

Really, the book is about the tension between oil and gas development and environmental change in Louisiana, which come to the head in the 1980s when scientists came to realize that A. there's a land loss problem and B., there is some good indication that the canalization of south Louisiana, which was primarily constructed in support of oil and gas, is a contributor.

It's really two different books in one. I start with the early 1930s when the industry first ventures out in the

marshes. There were known salt domes, but oil and gas were not explored or drilled for on the top of the domes, they were explored and drilled for on the fringes in the marsh where there were no roads, no board roads, and in order to get into the fringes of the marsh, you had to use barge-mounted equipment.

Later on in the '50s when the industry began laying pipelines in the marsh to bring gas from offshore to onshore to keep our Yankee brethren in the New England states warm in the winter, they needed huge equipment mounted on barges and in order to move those barges in and out of the coastal zone, you had to dredge canals. So there were tens of thousands of canals that have been dredged by the oil and gas industry in coastal Louisiana since the 1930s to both drill for and produce but to also lay pipelines.

The pipelines are the big focus of the book because I focus on a handful of important pipeline projects that have been critical to the development of not only onshore oil and gas in Louisiana, but also offshore. It was a big pipeline built in the 1950s by Tennessee Gas which was the biggest pipeline ever built. It was 350 miles long from near Kinder all the way to the Mississippi River delta. It was pioneering in so many different ways. That's a whole chapter.

Another chapter is on a big offshore pipeline. One of the biggest and one of the first big

"deepwater" pipelines that was built in the 1960s was the Blue Water system to really gather natural gas from the Outer Continental Shelf and bring it ashore. Coming ashore, you obviously needed canals to lay those pipelines. And that's a whole chapter.

And there's another chapter on LOOP — Louisiana Offshore Oil Port. The history of LOOP is interesting from a number of different angles. One in particular is it was the first oil and gas project that integrated petroleum engineers and design engineers with environmental scientists and environmental consultants to design and build a pipeline coming onto shore in the most environmentally sensitive way.

This is in the context of the 1970s when Louisiana was still a champion of economic development over environmental protection. That begins to change in the 1980s and '90s and so the story takes it up through that period through the 2000s, through the hurricanes as the state begins to prioritize coastal restoration and coastal protection amongst its goals and amongst its tasks — for a sustainable coast.

So the big takeaway from the book is essentially that the oil and gas business has quite a bit at risk with continued coastal land loss and therefore they should have a stake in the game like the rest of us. I don't think it's a legal obligation, certainly not a moral obligation, but they do have billions of dollars worth of critical assets and infrastructure, particularly pipelines that provide oil and gas from the Gulf of Mexico to the rest of America. And that entire infrastructure is now threatened with regional and global sea level rise, storm surges, coastal erosion, land loss and subsides — all of the above.

So it's probably time for some of the leaders in the oil and gas business to step out of the box and join the restoration effort. That's the book in the nutshell.

How did the canals affect the wetlands and the coastal loss that we have seen?

Scientists have recognized two different types of impact. One is fairly obvious. You take a healthy marsh and you dig a canal that is 40-foot wide by 10-foot deep where you just converted marsh wetlands

into open water and over time that canal is going to widen for multiple reasons. The rate at which it enlarges increases as you go further to the southeast toward the Delta Region.

So there is an obvious direct impact there because 95 percent of those canals were never backfilled. But there were plugs installed. This was a change of methodology. This was an improvement on the technology on the past where landowners, particularly oystermen and state agencies and Wildlife and Fisheries began questioning the rapid rate of saltwater intrusion through these canal systems, and the industry agreed. So there was essentially a compromise whereby the industry began installing these plugs. So if you look at a Google aerial map, you'll see these long linear pipelines that are 30 miles long and every half mile or so there are these white, earthen plugs that were installed. There are tens of thousands of them and there is bulkheading that's installed and those bulkheads were backfilled X number of yards, maybe 50 yards behind the bulkhead, wherever the pipeline crossed a navigable waterway.

So there were mitigation measures that were taken in the 1950s to limit the amount of saltwater intrusion into the fresher areas or the less saline areas to protect the integrity of the marshes, primarily to protect the trapping interest, the oyster interest and so forth.

Of course, over time, this is 50 and 60 years later, many of those systems have now been compromised because they are aging, they require significant maintenance. Every time there's a strong south wind, those canals become a conduit for moving saltwater intrusion farther into the marshes. Of course, during tropical storms and hurricanes, storm surge events, the rate of saltwater intrusion moving north is rapidly increased.

So you see the direct effects being these conduits for saltwater intrusion.

The indirect effects, scientists began researching this in the 1980s and '90s. It's very difficult to quantify, but in effect the argument is as the saltwater moves into these areas, the spoil banks that were deposited on the side of the canals, as opposed to temporarily storing the marsh soil and backfilling it into the canal, was standard practice, which everyone, including landowners approved, because canals are part of Louisiana's economic system for 200 years.

The practice was to build up a spoil bank and those spoil banks had impacts related to hydrological changes. They restricted the draining of the marshes, the natural draining of marshes. So you would have water that would be impound-

ed behind these canals, and particularly during flooding events or strong south wind events, you would have salt water that would get impounded behind these essentially mini-levees and would begin to decompose the marsh and the marsh would subside and the marsh would deteriorate and it would become open water. So scientists began recognizing that as a hard-to-define problem, but that's the relationship.

Talk a little bit about difference between the Chenier Plain that we see in Cameron and Vermilion parishes and the delta in southeast Louisiana and also about while there is concern here about erosion, the delta area of Terrebonne Parish and further east is in much worse shape.

Right, and in particular for Terrebonne and Lafourche (parishes), which are really old delta lobes, several thousands of years old. They have been subsiding and receding much longer than any of the other delta lobes.

The current delta lobe, the Birdfoot Delta which is south of Plaquemines Parish, is the youngest of the deltas. It's obviously sinking into the gulf as a result of nutrition deficiency. The sediments that would annually flow down the Mississippi River and flood the banks in the springtime are now deposited several mile offshore in the Gulf of Mexico. That's a direct correlation to the levee system that the Army Corps of Engineers has built to protect the cities of New Orleans and Baton Rouge from a similar flood as that of 1927.

But the Chenier Plain is made of a different geological, geomorphic and geographical considerations than the Deltaic Plain. Along the coast, in particular, there are these natural oak ridges and natural ridges where many communities settled going back 300 years, multiple generations ago.

It's a different kind of marsh. It's a more stable marsh system. You don't have the floatant marsh in southwest Louisiana as you did in southeast Louisiana. The floatant marsh in places like Leeville, that marsh could not hold up the weight of a man, but here in Cameron Parish there are areas that you can walk across.

With that being said, there has been an equal amount of canal development comparatively from the southeast and the southwest and while you have not seen the rapid rate of erosion in the southwest, you still have seen those kind of direct and indirect environmental impacts from the canals, particularly the Calcasieu Ship Channel which has been the main source of saltwater intrusion, and convert-

ing these freshwater marshes into brackish or intermediate marshes, very similar to a Houma Navigation Canal in Terrebonne Parish, which has been the main culprit of saltwater intrusion that has affected that marsh.

Of course, you have had a couple of really nasty hurricanes that when you have a marsh system that is already weak, those tidal scouring and major storm surges have just eaten up chunks of Pecan Island and Grand Chenier and the Johnson Bayou area. So you have natural effects coupled with human impacts that's creating this erosion effect that is certainly affecting southwest Louisiana.

Is the fight that we are in to save the coast winnable?

There are places in coastal Louisiana that can still be saved and restored. There are some places in Louisiana that will ultimately succumb to the rising tide and those coastal communities will need to relocate farther inland. The amount of funding that is now being thrown at the problem is a historical windfall of money to the tune of hundreds of millions of dollars a year, compared to the tens of millions of dollars a year that the state and federal governments and other programs have been using to battle the problem.

The big projects for the uses of the big funds are very controversial. What it's going to do is it's going to force people to have to give up something in order to save these area that are worth saving. For example you are going to have oyster beds that have already been moved multiple times as the salinity regimes have changed in some of these areas, the oyster people are going to be affected if these big projects are going to go forward.

The shipping business, the marine transportation industry, if there are going to be these multi-million dollar lock systems built in the shipping channels, there are going to have to be some sacrifices there.


Landowners are also going to have to make tough decisions.

The recreational fisherman who has a small voice in all of this, but an important voice — I'm a recreational fisherman myself — they are going to see their fishing conditions change and be forced to adapt. But adaptation is the hallmark of the people of south Louisiana, particularly the original Cajun people, right? We've done it before, we'll do it again.

What is your thought on the suit by the Southeast Louisiana Flood Protection Authority against the 97 oil and gas companies?

It's fascinating. It's fun to

See Q&A, B6



CITY OF LAKE CHARLES

**NOTICE OF PUBLIC HEARING
LAKE CHARLES PLANNING
AND ZONING COMMISSION
MAY 12, 2014 - 326 Pujo Street
City Council Chambers - 5:30 P.M.**

MCU 14-14 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: LAKE WOODLAND PARTNERS
 SUBJECT: Applicant is requesting a Minor Conditional Use permit in order to construct an off-site sign (billboard not to exceed 500sq.ft.), within a Mixed Use Zoning District. Location of the request is 2000 Lake Street.

ANY PERSON MAY SPEAK OR SUBMIT A WRITTEN STATEMENT FOR HEARING PURPOSES. THE APPLICATION AND SUPPORTING MATERIAL IS ON FILE AND OPEN FOR PUBLIC INSPECTION IN THE OFFICE OF ZONING AND LAND USE, ON THE 7TH FLOOR OF LAKE CHARLES CITY HALL AT 326 PUJO STREET, LAKE CHARLES, LOUISIANA; OR, MAIL TO THE CITY OF LAKE CHARLES, OFFICE OF ZONING & LAND USE, P.O. BOX 900, LAKE CHARLES, LA 70602; OR TELEPHONE: (337) 491-1542. AN APPLICANT FOR MAJOR CONDITIONAL USE APPROVAL OR ANY MEMBER OF THE CITY COUNCIL MAY APPEAL THE DECISION OF THE COMMISSION BY FILING AN APPEAL WITH THE DIRECTOR OF PLANNING WITHIN 15 DAYS OF THE DECISION OF THE COMMISSION.

Mother's Day Weekend Celebration!

MOMs are Special

SUNDAY, MAY 11

\$50,000 Cash & Car Giveaway

\$2,000 cash drawings 2pm-6pm

Grand Prize New Ford Edge LSE
DRAWING AT 6:30PM

BONUS \$5,000 Hot Seat Giveaway at 7pm
Enter automatically by playing any slot machine or table game after 10am with your free Advantage Club card. Earn up to 1,000 entries!

Plus

Mother's Day Champagne Celebration

Seven Clans Buffet - 10am to 10pm • Brunch until 1pm
\$23 with Club card • **\$28** without Club card • **\$16** Children 6-12 years of age

Plus

B I N G O

Saturday, May 10 Doors open 11am | Session starts 1pm
 Doors open 5pm | Session starts 7pm
 23 \$1,000 Games Each Session & Beach Tote and Mat
(For Ladies Only, With Buy-In)

Sunday, May 11 Doors open 1pm | Session starts 3pm
 \$1,000 Jackpot • \$5 Food Voucher + Entry to Win a Mother's Day Goodie Basket *(For Ladies Only, \$5 Voucher Valid at Corner Bar & Deli.)*



Justin Moore
 Saturday, May 10
 Doors at 6:30pm • Concert at 7:30pm
 Special Guest Jaryd Lane

TICKETS ON SALE NOW!



LOUISIANA'S BEST BET!



800.584.7263 | coushattacasinoresort.com
 777 Coushatta Drive | Kinder, LA |
Management reserves the right to alter or cancel any promotion without notice. Events and dates subject to change. Coushatta supports responsible gaming. Call 877-770-7867. Coushatta Casino Resort is owned and operated by the Coushatta Tribe of Louisiana.

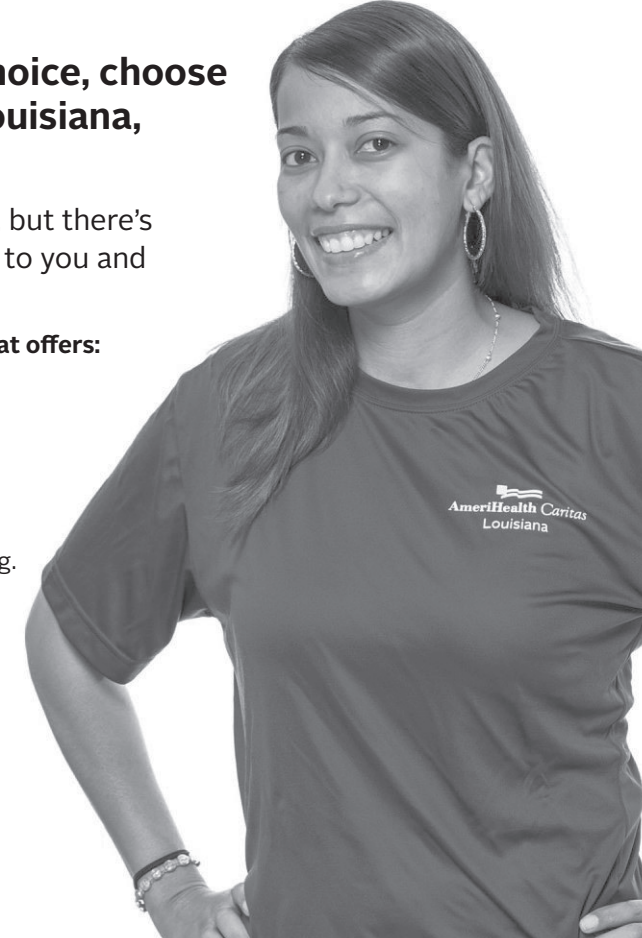
OPEN ENROLLMENT IS NOW.


During this period of choice, choose AmeriHealth Caritas Louisiana, formerly LaCare.

We have a new name and logo, but there's no change to our commitment to you and the community.


We're still the Medicaid company that offers:

- Unlimited doctor visits.
- Adult dental benefits.
- Adult vision benefits.
- Over \$200 in rewards free to members who choose healthy living.





CARE IS THE HEART OF OUR WORK.
 Choose AmeriHealth Caritas Louisiana today.



1-855-BAYOU-4U

SUNDAY TALK

Q&A

Continued from B4

watch. It's like the O.J. Simpson trial. I keep up with it every day.

It's interesting from a number of dynamics, especially the political dynamics. There are some constitutionality questions that I think most people in Baton Rouge are concerned about, the legality of the actual petitioning and the prosecution of the case, which I'm least concerned about. What I'm most interested in is the merits of the case, the evidence which I have certain opinions on because of the five

years of research that I did, going to bed with this problem and waking up with this problem seven days a week for five years. I researched that question to the nth degree. It became not only a passion but a driving force behind everything that I am as far as a native-born Louisianian and a historian and a scholar.

It is my opinion that there were trade-offs made prior to the 1980s when most of the canals were already built. There were trade-offs that were made that I have a hard time with the legal obligations of the industry for financial considerations related to coastal land loss because prior to the

1980s there were no regulations. Canals were an accepted practice that the landowners agreed upon and the state of Louisiana agreed upon, that everyone in Louisiana agreed upon.

And so the particulars of the case have not yet become full public disclosure. We may not ever know what the actual merits of the case are. That remains to be seen in the next 30 days in Baton Rouge. We shall see.

The coastal parish lawsuit are a bit different. There are different arguments in the coastal lawsuits. The main levee board lawsuit is claiming that every oil and gas operator that ever hired a contractor to dig up marsh is responsible for monetary damages related to coastal erosion, even those operators who conducted oil and gas operators that conducted activities prior to the era of regulation.

That is going to be a hard argument to make. Have oil and gas canals contributed to the erosion? Absolutely. Everybody knows that. It's very difficult to quantify with empirical evidence what the amount of coastal wetland loss has been contributed to oil and gas canals compared to the Army Corps of Engineers-funded canals.

For example, MRGO (Mississippi River Gulf Outlet Canal) southeast of New Orleans, has been a major saltwater intrusion culprit. They knew it was going to be detrimental to the wetlands. The people of St. Bernard (Parish) and of that region complained and attempted to force the Army Corps of Engineers to think broadly and to think long-term about the effects that this ship channel was going to have on the region. But they built it anyway and now it's closed for obvious reasons.

I sympathize with those who are supporting these lawsuits because of the desperation of the need for some kind of action and I also agree that all of the stakeholders have been at the table for going on two decades now, but there's one seat that is unoccupied at the stakeholder table and we are still awaiting the arrival of that absentee stakeholder because as I mentioned at the beginning, I think the oil and gas industry has a lot to lose with continued coastal erosion in Louisiana from an infrastructure, from an energy security issue. And that should be an area where I think compromise could be made as getting the industry involved from that perspective. It will be interesting to see how it plays out.

Former Southeast Louisiana Flood Authority member



Donna Price / American Press

Theriot says that oil and gas canals have absolutely contributed to the erosion of Louisiana's coast.

John Barry has said his motive all along in this suit was to try to bring the oil and gas industry to the table to reach some sort of compromise. ...

The time is running out. Again, I think this goes back to the desperation. We haven't figured out how to stop the erosion yet. It's been over 30 years. Twenty-five square miles a year continue to disappear. The clock is ticking. The panic button has long been hit. The route that the levee board along with its plaintiff attorneys is a different way to address this problem by filing a lawsuit, gambling on the fact that the industry would wake up to its perceived responsibility for contributing to the process.

A settlement or a grand compromise that brings all the stakeholders to the same table to discuss how do we all invest in this grand problem, which is in my opinion is one of the largest environmental challenges certainly for Louisiana and the Gulf Coast and perhaps even the U.S., considering what is at stake, considering the economics, considering the culture as far as what the working coast of Louisiana provides for the rest of the nation. That's one avenue.

The other avenue is to sit and wait and see if those guys show up, which hasn't happened yet. There have been periodic appearances, whether it's through philanthropic donations to events or to coastal causes or to universities or to small restoration projects. Don't get me wrong — the industry has been investing in small restoration projects, and paying taxes to the state, but I think the point of the lawsuit was to convince the industry that they needed to take the next step.

Any large company, their main responsibility is to their stockholders. That's No. 1. ...

What the industry at risk is if they pass this opportunity to come to the table, there are other suits coming. Does the industry want to try to make a blanket settlement or does the industry want to be attacked by a thousand bees. And that will lead to every company defending itself by itself. Does say Shell Oil want to fight a suit in Cameron Parish and another one in Vermilion Parish and another one in Terrebonne Parish and another one in Lafourche?

There's a couple of problems with that. Let's take the Southeast Louisiana Flood Protection Authority's defendants. You've got a handful of big oil companies, you have a handful of major natural gas pipeline companies, some of whom are no longer in existence or are subsidiaries of these companies. And then there are 80 large to medium to small mom-and-pop independents. That entire collective is now bunched up in one big lawsuit.

There are different regulatory aspects of digging canals that will need to be addressed. The natural gas pipelines were obviously regulated by the Federal Power Commission. The large oil pipelines were regulated by the federal government. The dredging of the inland canals for exploration and production, initially by the large companies and ultimately assumed by smaller independents that was regulated by the state. So you've got permit issues here, regulatory structural issues that will need to be addressed.

You have three different groups. And then you take the independents. You've got large independents and you've got Joe Blow's Oil Company that has a handful of employees who bought a bunch of old assets and is trying to get the last couple hundred barrels out of these old wells and he doesn't have the money to even hire attorneys. ...

If it goes through, you're right, there are the coastal lawsuits and there may be other lawsuits. We also have to realize that there has been precedence. The Castex case, Terrebonne Parish School Board vs. Castex. It went to the (Louisiana) Supreme Court in 2005 and the decision essentially, the justices their opinions, the landowner was basically claiming that salt-water intrusion and wetland destruction because of dredging of canals. The opinion of the Supreme Court essentially gives the oil and gas industry a pass for the dredging of canals, claiming that that was normal wear and tear as part of legal agreements and long understandings of standard practices. ...

Not enough people are talking about the Castex case. I think that whole group of companies — that's going to be

an interesting dynamic to get them all to agree to some kind of settlement.

Back to the stockholders. I think one area that if I were a manager or an executive at a major energy company, I would be concerned by my stockholders and if I were a stockholder, myself, I would be concerned about the continued vulnerability of the pipeline assets. One big nasty ruptured oil pipeline would not only cause significant environmental damage, that would be a PR (public relations) nightmare. Obviously, there are mechanisms in place that will limit, automatic shut-off valves, but still you get a shrimp boat anchor over an exposed oil line and boom, you get some casualties and suddenly you have oil in an estuary during shrimping season. It's not as big as a Macondo (Deepwater Horizon Oil Rig explosion), but something still you want to avoid.

There's a lot of risk management involved in continuing to maintain this aging infrastructure. I think from a stockholder view and from an executive business view, that's something that needs to be addressed, you need to minimize that risk. I think also the industry has a social responsibility to those coastal communities where people they employ, the workers, the men and women who go out in the boats and check all of the production and where they are home-based and perhaps they fly offshore or take a crewboat offshore, the men and women who are the ground troops, who have those tough jobs, 14-on and 14-off shifts, they live in those coastal communities. So why would you not see the potential non-technical risk of investing in infrastructure and coastal protection to protect your workers' community? ...

The movement to build new levees, I think Terrebonne Parish is a model. It was very controversial but the decision of the citizens of Terrebonne Parish to tax themselves to fund the levee system and to begin with something, if it's 8-foot or 10-foot, we're going to scrape together the nickels for the maintenance cost. They were tired of hearing the Corps of Engineers say, "Well, we need four more years of feasibility studies."

Every time the wind blows from the south at 20 miles an hour, we get water on the roads and it eats more marsh. And sure enough, that levee system is working. Now we are in the early phase and that includes multiple locks and those aren't cheap. They are 50 million dollars a pop if not more, but you are beginning to see the reality and the adoption of hurricane flood protection and coastal restoration being integrated and it is having a positive effect. You not only have a political mindset, you've got local buy-in and now you've got an army of design consultants, environmental engineers, dredging contractors that are all lining up to take part in this great windfall to begin rebuilding some of the coast that has been lost.


I went to the State of the Coast which is the big conference that is held every other year and is put on by the Coalition (Coalition to Restore Coastal Louisiana). It was in New Orleans. This is the third one that they had. The first one was about 200 scientists, all familiar faces, all pointing to the same old arguments and /or some new restoration techniques. There were over 1,200 people at this (last) one. Many of them were engineers. What does that tell you? ...

The hallmark of the people of south Louisiana has been adaptation. You are seeing that. You are seeing them adapt environmentally, economically, politically, culturally, even technology. Now you are seeing two generations of coastal scientists. Were there coastal science degrees at McNeese in the 1970s? Not too many.

You've got all these well-trained and highly educated scientists and engineers trying to address this problem. What began as a cottage industry in the '90s is now becoming a booming industry and that's because of the amount of funds that are going to be flowing to the state from multiple sources over the coming years.

The building blocks are there. We shall see how wisely the money is used.

For an autographed copy of Jason Theriot's book, "American Energy, Imperiled Coast," go to www.jasontheriot.com.



CITY OF LAKE CHARLES

NOTICE OF PUBLIC HEARING
LAKE CHARLES PLANNING AND ZONING COMMISSION
MAY 12, 2014
326 PUJO STREET
CITY COUNCIL CHAMBERS 5:30 P.M.

RES 14-19 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: CITY OF LAKE CHARLES
 SUBJECT: The City of Lake Charles is requesting annexation approval of (23.144) acres, more or less, and generally described as the **Northeast section of Southpark Drive @ Smith Road.**

RES 14-20 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: CITY OF LAKE CHARLES
 SUBJECT: The City of Lake Charles is recommending a zoning classification of Residential to (23.144) acres, more or less, and generally described as the **Northeast section of Southpark Drive @ Smith Road.**

RES 14-21 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: MICHAEL J PAPANIA
 SUBJECT: Applicant is requesting to amend the official zoning map along the Eastside of the 2400 Blk. of Stanton Street from a Neighborhood Zoning District to a Business Zoning District (Section 4-207). Location of the request is the **Southeast section Stanton Street @ W. 15th Street (Lots 1, 17 & 18).**

RES 14-22 LAKE CHARLES SUBDIVISION REGULATIONS
 APPLICANT: BRAD FOREMAN (RUBY MAE SUBDIVISION)
 SUBJECT: Applicant is requesting Preliminary and Final Subdivision approval (Section 2.3 & 2.4), in order to re-subdivide an existing residential development tract into four (4) single-family lots, within a Residential Zoning District. Location of the request is the **Southside 3600 Blk. Salene Road thru to the Northside 3600 Blk. Lawrence Lane.**

RES 14-23 LAKE CHARLES SUBDIVISION REGULATIONS
 APPLICANT: BLOCK 18 OF BARBE PROPERTIES LLC (CONTRABAND POINTE)
 SUBJECT: Applicant is requesting Preliminary Subdivision approval (Section 2.3), in order to subdivide a 150-acre tract of land into multiple development tracts, within a Business Zoning District. Location of the request is the **Northside 1600 Blk. W. Prien Lake Road.**

RES 14-24 LAKE CHARLES SUBDIVISION REGULATIONS
 APPLICANT: DRW PROPERTIES LLC (BEAU CHENE SUBDIVISION)
 SUBJECT: Applicant is requesting Preliminary Subdivision approval (Section 2.3), in order to subdivide a 3.7-acre tract of land into 28 single-family townhome lots, within a Residential Zoning District. Location of the request is the **Eastside W. Prien Lake Road @ Kandy Lane.**

RES 14-25 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: REGENCY PARTNERS LLC/PENOCO PLUS LLC/PENOCO PROPERTIES LLC
 SUBJECT: Applicant is requesting to amend the official zoning map along the Northside of Imperial Blvd thru to Providence Way from a Residential and Mixed Use Zoning District to a Business Zoning District (Section 4-207). Location of the request is the **Northside Imperial Blvd thru to Providence Way.**


MAJ 14-06 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: KEITH STEWART/JEREMY FONTENOT
 SUBJECT: Applicant is requesting a Major Conditional Use Permit (Sec 5-301(b)) in order to construct a duplex dwelling unit, within a Residential Zoning District. Location of the request is the **Northwest corner Fall Street and Center Street.**

MAJ 14-07 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: A-1 LOUISIANA PROPERTY
 SUBJECT: Applicant is requesting a Major Conditional Use Permit (Sec 5-301(b)) in order to construct a duplex dwelling unit with off-street parking, within a Neighborhood Zoning District. Location of the request is **134-136 Louie Street.**

MAJ 14-08 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: DRW PROPERTIES LLC
 SUBJECT: Applicant is requesting a Major Conditional Use Permit in conjunction with a Planned Residential Development (Sec 5-409) in order to construct 28 attached townhome units with enclosed garages and visitor parking, within a Residential Zoning District. Location of the request is the **Eastside W. Prien Lake Road @ Kandy Lane.**

VAR 14-11 LAKE CHARLES ZONING ORDINANCE NO. 10598
 APPLICANT: JOHN TOUSAINT
 SUBJECT: Applicant is requesting a Variance (Section 4-205) in order to construct an open carport cover 3' feet from the side property line vs. the required (5') side yard setback, within a Residential Zoning District. Location of the request is **3548 Columbus Circle.**

ANY PERSON MAY SPEAK OR SUBMIT A WRITTEN STATEMENT FOR HEARING PURPOSES. THE APPLICATION AND SUPPORTING MATERIAL IS ON FILE AND OPEN FOR PUBLIC INSPECTION IN THE OFFICE OF ZONING AND LAND USE, ON THE 7TH FLOOR OF LAKE CHARLES CITY HALL AT 326 PUJO STREET, LAKE CHARLES, LOUISIANA; OR, MAIL TO THE CITY OF LAKE CHARLES, OFFICE OF ZONING & LAND USE, P.O. BOX 900, LAKE CHARLES, LA 70602; OR TELEPHONE: (337) 491-1542. AN APPLICANT FOR MAJOR CONDITIONAL USE APPROVAL OR ANY MEMBER OF THE CITY COUNCIL MAY APPEAL THE DECISION OF THE COMMISSION BY FILING AN APPEAL WITH THE DIRECTOR OF PLANNING WITHIN 15 DAYS OF THE DECISION OF THE COMMISSION.



CITY OF LAKE CHARLES

PUBLIC HEARING NOTICE

Notice is hereby given, in accordance with LSA R.S. 33:172, of an ordinance enlarging the boundaries of the City of Lake Charles, Louisiana, and assigning a zoning classification of Mixed Use and Business to property consisting of 5.81-acres more or less and generally described as the **Westside 5100 Blk. Lake Street.**

Notice is hereby given, in accordance with LSA R.S. 33:172, of an ordinance enlarging the boundaries of the City of Lake Charles, Louisiana, and assigning a zoning classification of Mixed Use and Business to property consisting of 2.77-acres more or less and generally described as the **Northwest corner Lake Street @ Worthington Blvd.**

The City Council will hold a public hearing on the proposed annexation on **May 21, 2014, at 5:30 P.M. at City Hall (326 Pujoe Street-Council Chambers).** Any opposition to the proposed annexation will be made in writing filed with the Clerk of the Lake Charles City Council prior to the date of the public hearing. Any person may submit statements concerning this matter, and all relative materials are on file and available for public review in the Office of Zoning and Land Use, 7th Floor, City Hall, 326 Pujoe Street, Lake Charles, Louisiana.

How Does Your Heart Score?

Find out, with a coronary calcium test at Imperial Health Imaging Center.



One in three adults has some form of cardiovascular disease, and heart disease is the leading cause of death for men and women in the United States. We use advanced, non-invasive CT technology and low-dose radiation to take an in-depth look at your heart and blood vessels to determine your level of calcium buildup. This calcium score can help your doctor determine if you are at risk, or have, coronary artery disease, even you are not displaying symptoms. Calcium scoring is painless and takes just minutes to get results that could give you an early start on beating heart disease. Call Imperial Health Imaging Center at 312-8761 to schedule your appointment today to take advantage of this special offer.

- Consider coronary calcium testing to assess your heart health if you have any of these risk factors:
- family history of heart disease
 - high cholesterol
 - high blood pressure
 - smoke
 - overweight
 - diabetes
 - inactive lifestyle
 - high stress

\$75 Cardiac Calcium Score Test through 5/31/14 - cash price only

(337) 312-8761
 1747 Imperial Blvd.
 Lake Charles
www.imperialhealth.com



Imperial Health Imaging Center