



Delta Section

NEWSLETTER

Volume 33 No. 3

November 2016

Joint Society Luncheon
Wednesday
November 9, 2016
11:00 am - 1:00 pm

KEYNOTE SPEAKERS:

Mike Celata

*Regional Director Gulf of Mexico Region
Bureau of Ocean Energy*

Marc Ehrhardt

*Executive Director
Grow Louisiana Coalition*

REGISTER ONLINE:

www.api-delta.org

FOR MORE INFORMATION:

*Tessa Wiggins
twiggins@idexcorp.com*

LOCATION:

Marriott Hotel
555 Canal St • New Orleans

\$40 Members

\$45 Non-members & Walk-ins

\$15 Discounted Valet Parking

**Advanced Registration and Payment
Highly Recommended**

2016 JOINT SOCIETY LUNCHEON

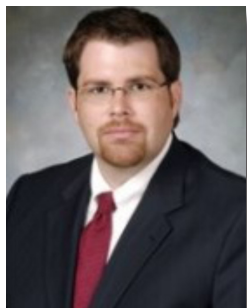
KEYNOTE SPEAKERS



Mike Celata, BOEM Gulf of Mexico Regional Director, leads all leasing, regulatory oversight, and resource management functions for offshore energy and marine minerals development on the US Gulf of Mexico OCS and for oil and gas and G&G permitting activities on the US Atlantic OCS. He has worked for the Department of Interior for 28 years.

During his tenure, he has played key leadership roles in advancing geological and geophysical survey activity along the Atlantic coast, developing and implementing worst case discharge reviews, implementing financial risk operations, and developing the geological interpretive tools system. He holds a B.A. in geology and physics from Bowdoin College and attended the Boston College Master of Science program, where he was a seismological research assistant.

The Gulf of Mexico OCS is the primary offshore source of hydrocarbons for the United States, generating approximately 97% of all offshore oil and natural gas production accounting for 17% of total US crude oil production and federal offshore natural gas production in the gulf accounts for 5% of total US dry production.



Marc Ehrhardt has served as executive director since the Grow Louisiana Coalition's inception in January 2014. In this position, he represents the coalition as its spokesperson and works with its board of directors to develop and execute a plan to fulfill its mission of enhancing the value of Louisiana's oil and gas industry and affiliated industries.

As a public relations professional, he manages public affairs, corporate image, national media relations, issues management and crisis management programs in the economic development, retail, financial and manufacturing industries. He earned his Bachelor of Arts degree in political science from Loyola University Chicago.

TABLE SPONSORSHIPS

Gold — \$1000

Table of 10, Preferred Seating
Welcome Banner Logo & Program Listing

Silver — \$500

Table of 8 & Program Listing

Bronze — \$100

1 Ticket & Program Listing



ANNUAL LSU SPE GOLF TOURNAMENT



Join us for a four-man scramble before our Fighting Tigers take on the Alabama Crimson Tide in football. The event includes food, drinks, and raffles. Carts will also be provided.

This is our chapter's largest fundraising event of the year and a great networking opportunity. Visit our sponsorship page to make a donation or become a sponsor. Any donation is appreciated!

mkt.com/spe_at_lsu



Friday

November 4, 2016

Tee Time: 8:30 a.m.

Copper Mill Golf Club
2100 Coppermill Blvd.
Zachary, LA 70791



For tournament registration or sponsorship questions, please contact us at **[SPE.lsu.golf@gmail](mailto:SPE.lsu.golf@gmail.com)** or visit

spe.eng.lsu.edu/lsu-spe-annual-golf-tournament/

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2016-2017 SPE Delta Section Officers and Board of Directors

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	Charlie Mayne	W&T Offshore	504.210.8172	cmayne@wtoffshore.com
	Phil Moses	Consultant	504.616.6511	pamoses1@uno.edu

SPE: ON THE HORIZON

Local and Chapter Events:

- Nov. 4..... **Annual LSU SPE Golf Tournament** • Copper Mill Golf Club • 11:00 a.m.
 For tournament registration or sponsorship questions, please contact us at SPE.lsu.golf@gmail.com
 or visit spe.eng.lsu.edu/lsu-spe-annual-golf-tournament/
- Dec. 10..... **SPE-Delta and FIRST LEGO Championship** • Holy Cross High School • New Orleans
 For more information, please go to <http://laflil.org/Volunteering.htm>

NOVEMBER 2016 - SPE's NEWSLETTER IS GOING DIGITAL!

Due to the high cost of producing the newsletter, we will be converting the newsletter to a digital only format starting with the November 2016 issue. If you are interested in still receiving a paper copy, email us to request a paper copy; otherwise, check our website <http://connect.spe.org/delta/home> or your email for the latest edition.



from THE CHAIR...



Greetings,

Last month's general meeting "Fracking and the Environment" was another great success. Insights and information provided by the 3 panelists was well received and invaluable. The discussion covered hydraulic fracturing in general from an historical standpoint to modern day applications. Health assessments and impact studies were reviewed providing processes and data in an area many were unfamiliar with. Legal issues regarding permitting and the rights of the community/citizens were detailed for the audience. There were 37 attendees for this meeting which is definitely an impressive turnout. Our thanks to the panelists Charlotte Batson, Lisa Lavie Jordan and Dr. Allison Stock for their time and participation.

In November the section will not have a general meeting but want to invite everyone to the 2016 Joint Society Luncheon. The guest speakers will be Mike Celata, Regional Director Gulf of Mexico Region, Bureau of Ocean Energy and Marc Ehrhardt, Executive Director, Grow Louisiana Coalition. Look for the details on the first page of this newsletter. Advanced registration is recommended.

In December the 14th Annual Louisiana FIRST LEGO League middle-school robotics program with SPE Delta sponsorship will take place at Holy Cross High School in New Orleans. Come out and watch these teams of young people compete in a multitude of events. See page 12 of this newsletter issue for more details about this event. Also, volunteers are needed and positions include judges, judge assistants, scorekeepers, timekeepers, and referees to name a

few. You can find more information at <http://lafll.org/volunteering.htm>.

I encourage you to continue having conversations with your industry friends, colleagues, new hires and supervisors about becoming members or getting involved in the Society of Petroleum Engineers. Discuss the technical luncheons, the social events, the educational programs, the volunteer opportunities, the benefits to the community and the networking opportunities membership can afford them.

Note this is the section's first digital newsletter. In our current environment with lower revenues, the move from the print version is necessary due to the high cost of printing and delivery. The savings will be substantial and the section will be able to use some of the recognized savings for other membership efforts.

A reminder to all members who are in transition during this difficult industry environment, SPEI will waive your membership dues. Please contact SPEI at service.org@spe.org for more information. Additionally, we will offer a more affordable meeting registration fee for those who are in between employments.

To close, once again thank you for being members of this chapter and by doing such you continue to support the beneficial activities of the Delta Section. Let us know if you need any assistance so we can better serve you.

Sincerely,

Daniel A. Durey

Your 2016-2017 SPE Delta Section Chair

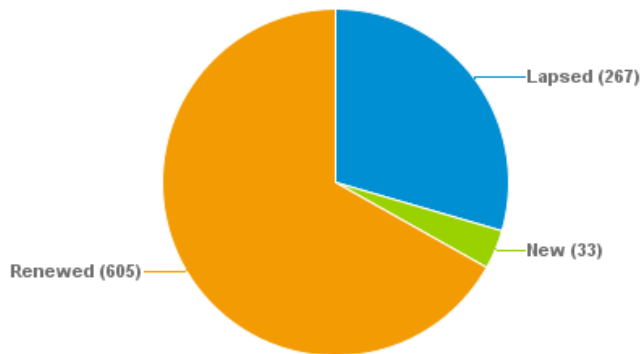
SPE-Delta Membership Report

Submitted by: Angie Gobert (Membership Chairperson)

As of November 2016

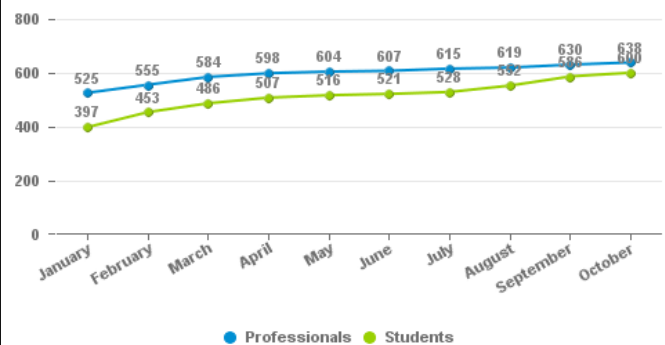
Total Full Members	638
New Members	33
Unpaid Members	267
Total Student Members	600

Professional Membership

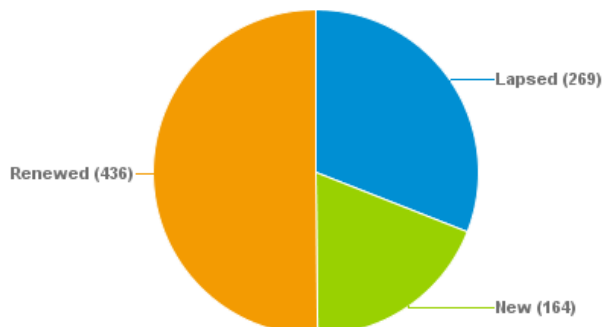


Delta Section

Current Members by Month



Student Membership



Student Chapters	Total Current Members	New	Renewed
Florida State University	40	12	28
Louisiana State University	503	133	370
Nicholls State University	50	17	33
*Students Without a Student Chapter	7	2	5
TOTAL	600	164	436



2016-17 LSU SPE OFFICERS



PRESIDENT

Taylor White is a senior majoring in Petroleum Engineering. With plans to graduate in May of 2017, she is excited to spend her senior year with SPE. Taylor has worked as an intern with LLOG Exploration, Halliburton, and Cetco Oilfield Services as well as attended training camp with Shell at their Robert Training Facility. On campus, Taylor served on the College of Engineering Council where she organized the Annual All Engineering Crawfish Boil. She will be involved this semester with Tau Beta Pi Engineering Honor Society, AADE, and Delta Gamma Fraternity as well as preparing to travel to IPTC Education Week in Thailand where she was selected to present on unconventional resources. Taylor believes she has the perfect team to make SPE thrive at LSU and hopes to bring more opportunities to LSU engineers in alignment with the SPE International mission.

VICE PRESIDENT

Abdul Homran is a junior, majoring in Petroleum Engineering and minoring in Business Administration, at Louisiana State University. He has already obtained an Associate's Degree in Math and Science from City College of San Francisco. He is currently serving LSU SPE as Vice President and has been an active member with SPE since 2013. He served as the Director of Committees for SPE LSU in 2015 and Mentor with Chevron Mentorship Program for a year. He was honored with a Scholarship from the Society of Petroleum Engineers. In the past, he was President of American Association of Yemeni Scientists and Professionals, and was honored with the President's Honor Roll and Recognition of Achievement. His family is from Yemen, and he was born in San Francisco California. This unique family heritage taught him to speak both Arabic and English, and he has always enjoyed helping other students.



TREASURER

Jade Boudreaux is a senior in Petroleum Engineering at Louisiana State University with plans to graduate in May of 2017. Jade is a dedicated individual with 10 years of work experience in professional environments outside of Petroleum Engineering. While maintaining jobs throughout his education, he has been recognized by the honor societies Tau Beta Pi and Phi Kappa Phi for his academic excellence and is a Brookshire Scholarship Recipient. He has high hopes for 2016 as an officer of SPE at LSU and looks to make this year the best yet.

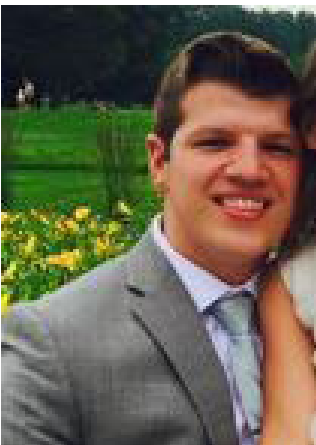


SECRETARY

Wade Rotolo is entering his fourth year as a PETE student at LSU. Wade enjoys the problem solving aspect of engineering and appreciates the opportunity he has to get a great education at LSU. He is married to the love of his life Kelsey. He likes sports, reading good books, and visiting with family. His goals in life are to raise a happy family, work in the oil and gas industry, start his own business, and give back to his community. One of Wade's greatest accomplishments is when he completed a two year full-time volunteer mission with the Church of Jesus Christ of Latter-Day Saints in Northern Peru where he learned Spanish and served the people there.

GRADUATE REPRESENTATIVE

Kristen Carpenter grew up in rural West Virginia and received her Bachelor of Science Degree from West Virginia University in Chemical Engineering. From there, she began working for Schlumberger wireline (or e-line), primarily in Gulf of Mexico deepwater. She felt she had found her passion in the oil and gas industry and left Schlumberger to pursue a Master's Degree in Petroleum Engineering at Louisiana State University. She enjoys sharing her industry experiences and helping SPE get students just as excited and passionate as she is about petroleum engineering! She works as a teaching assistant for Well Logging and Rock Properties and is anticipating graduation in May 2017.



JUNIOR REPRESENTATIVE

Chris Adams came to LSU in the fall of 2015 to pursue his dream of becoming a successful petroleum engineer. Chris, who comes from a small, rural town in Michigan, loves the people and atmosphere here at LSU. Along with spending time with friends and friends, Chris enjoys hunting, fishing, and sports. As a researcher at LSU, he gets to do one of his favorite activities, travel. Always willing to lend a hand, do not hesitate to contact Chris if there is a way he may be able to assist you.

SOPHOMORE REPRESENTATIVE

Juan Bukowitz was born in Venezuela and moved to Houston, TX when he was 9 years old. Both of his parents work in the energy industry so being exposed to that from a young age led him to want to become a petroleum engineer major. SPE was the first club that he joined and not only did it help him go to ATCE Houston 2015, play intramural sports, network with industry professionals, but it also helped him meet some amazing people here at LSU. Outside of school he enjoys many things. Some of his favorites include being with friends & family, playing Soccer with the LSU Men's club, and being a superhero nerd. He's ecstatic for the upcoming 2016-2017 school year and doing some great things! Let's make SPE great again!





Establishing an SPE Student Chapter at UNO

On October 24, 2016, UNO engineering students of the AADE and SPE Delta Sections co-sponsored petroleum engineering class were visited by SPE Delta Section board members and were presented information regarding the benefits of establishing an SPE student chapter on UNO's campus. This class is taught by Phil Moses, an active past chair and a current Section Director. The students were attentive and eager to learn of this opportunity. Jan Catalano, a mechanical engineering graduate from UNO who is also an active past chair and current Section Director on the Board, asked the students if they were aware of the oil and gas opportunities that existed in our area prior to the petroleum engineering introductory classes being held at UNO and only one student was aware. Dominick Sparacino, the student chapter liaison participated in the discussion and encouraged

students to become a part of SPE International and offered his assistance in establishing a student chapter. Angie D. Gobert, past chair and current membership chair, also shared background history on the formation of SPE International, benefits for SPE student chapter members, opportunities of involvement with SPE Delta Section, SPEI student actives and events, the available young professional publications, and SPE Delta and SPE International scholarship opportunities. Thanks to Phil who sparked this interest and informational meeting, Dominick for being present and sharing pertinent information, Jan, Daniel, our Chair, for supporting this endeavor, and Angie for encouraging the establishment of a student chapter that SPE Delta can sponsor and work with thereby promoting petroleum engineering industry education and encouraging future careers.

Summer Course in Petroleum Engineering at UNO

Due to the level of interest and success of the current program, we are planning to start an additional petroleum engineering class during the Summer semester 2017. The topic has not been finalized, but will soon be confirmed. Topics currently under consideration are Facilities design, Well Intervention, and Well Control techniques. The offering will augment the current classes. The "Introduction to Petroleum Engineering" held every year in the fall, and "Drilling and Completions Design", held in the Spring.

These classes are classified as Electives within the

Department of Mechanical Engineering. The schedule will consist of 2 classes per week, each of 2½ hour duration, during the months of June and July.

They may be of interest to those of you that wish to gain more insight into a particular field, either as an employee, or those of you between jobs.

These courses are jointly supported by SPE and AADE.

If you are interested in learning more about this offering or have suggestions for topics, please contact Phil Moses at pamoses1@uno.edu.



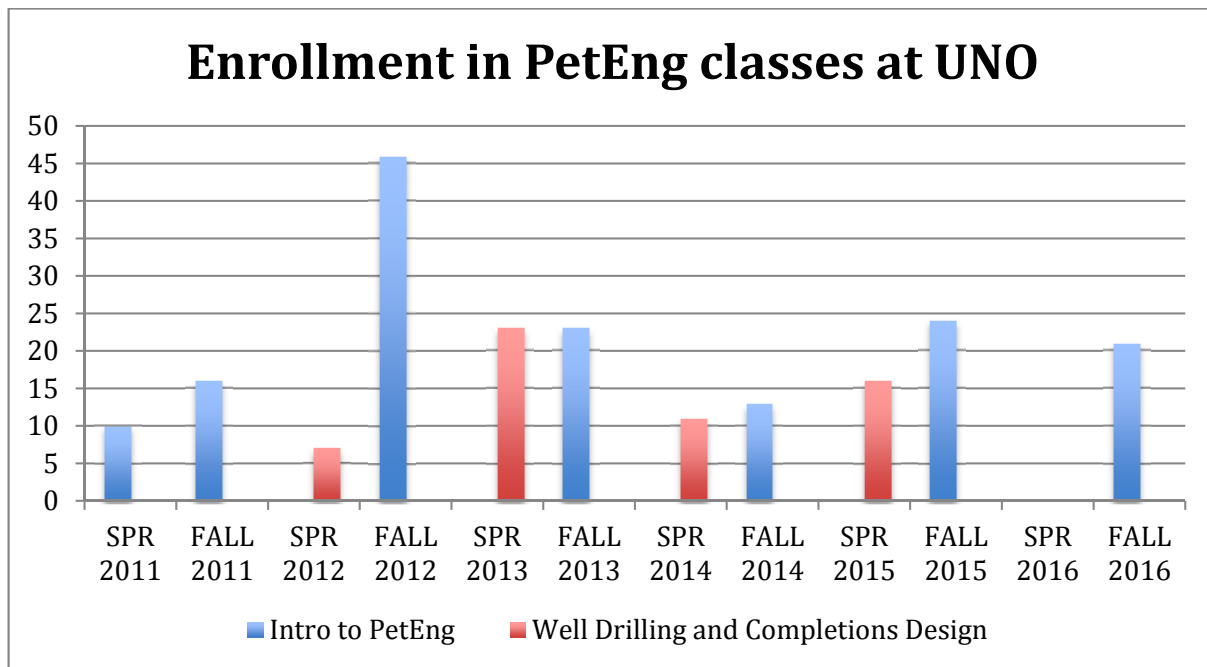
UNO Petroleum Engineering Program

Sponsored by SPE and AADE



Starting in the Spring Semester of 2011, the boards of SPE/AADE have voted to sponsor the following courses to encourage more awareness about the oil industry and its many potentially local and diverse job opportunities. Over 200 students have enrolled since 2011. As a result of these courses, a number of past students are now working in industry related fields. Despite the downturn in the industry, interest and enrollment remains steady.

These are offered within the Department of Mechanical Engineering Department as Electives.



- **ENME 4765: Introduction to Petroleum Engineering**

Offered in the Fall Semester

An introductory course on the oil and gas industry, with focus on the upstream sector. Topics include petroleum geology, exploration, drilling, completions, production, subsurface management, risk and cash flow analysis and the importance of the Environment, Health and Safety .

- **ENME 4096: Well Drilling and Basic Completion Design**

Offered in the Spring Semester

Covers the tasks performed by a Drilling Engineer in the drilling and completion of an oil or gas well. Topics include the basic components and processes of a drilling rig, the requirements for designing a well drilling and completion program, cementing, well control, including the various calculations required in the operation.

In conjunction with AADE we are investigating the possibility of introducing an additional class during the Summer Semester to introduce additional topics to the curriculum.

If you would like to know about this program or are interested in participating in any way, please contact pamoses1@uno.edu

Fracking Panel Discussion Summary

**October 11, 2016
Meeting**

By: Howard Duhon

We had a very successful and lively meeting on Oct. 11. We packed 37 people into a room designed for 30 and were treated to three passionate and insightful presentations and a sometimes contentious Q&A.

Hydraulic fracturing of oil and gas bearing shale is perhaps the most important technology in the oil industry in the US today. It is also probably the most misunderstood. And it generates the most vocal and active community opposition. Until recently Helis was proposing an unconventional development in St. Tammany Parish.

Charlotte Batson's Presentation

Hydraulic fracturing is not a new technology, but its use in shale has created a revolution. The US is approaching energy independence. Community relations are critical for project success. We have entered an age in which the public is skeptical of science, increasingly risk averse, and largely ignorant of the facts about shale oil and gas production. Batson noted that the popular perception of unconventional production technology is that it is new, untested, unproven and unregulated. But hydraulic fracturing dates back to the 1940s and horizontal drilling to the 1980s. Batson noted several studies that showed minimal impact of fracking on groundwater and air, and pointed to flaws other studies that erroneously showed larger impacts.

Allison Stock's Presentation

Stock mainly discussed occupational health and community health risks. There are potential community impacts of multiple types that must be addressed including:

- Groundwater contamination
- Air pollution
- Waste disposal
- Water use
- Well blowouts
- Transportation risks

The most visible public irritants end up being traffic related (noise, dust, 24-hour operation).

Stock addressed sources of public information including news reports, public interest groups, and

government agency reports. She urged the industry towards more outreach and transparency with the public and also to more research on the impacts of operations.

Lisa Jordan's Presentation

Jordan, from the Tulane Environmental Law Clinic, gave us a different perspective. The clinic represented the City of Abita Springs in opposing the Helis project in St. Tammany Parish. Helis leased 60,000 acres. The first well was proposed:

- In an area zoned residential
- Under a drinking water aquifer
- In a wetlands area

According to Jordan, the residents' issues included:

- Lack of federal regulation
- Violation of zoning laws (which are secondary to drilling permits)
- Wetlands should be avoided
- Source of fracking water
- Traffic
- Risk to groundwater
- Air emissions
- Decreased property values
- Scale – the number of wells that would eventually be drilled

It is this last issue that was the main issue. Based on studies of other shale developments the residents judged that many, many wells would be drilled if the first one was successful. They judged that the costs (property values, quality of life, environmental damage) outweighed the benefits (which accrue primarily to the land owners).

She noted that Helis had planned a very extensive monitoring program. The Helis permit to drill was the first in Louisiana to be conditioned on: air monitoring, stormwater monitoring, groundwater monitoring, closed loop solids control system when drilling the well, no groundwater use for drilling or fracking.

Q&A

The Q&A period was very lively.

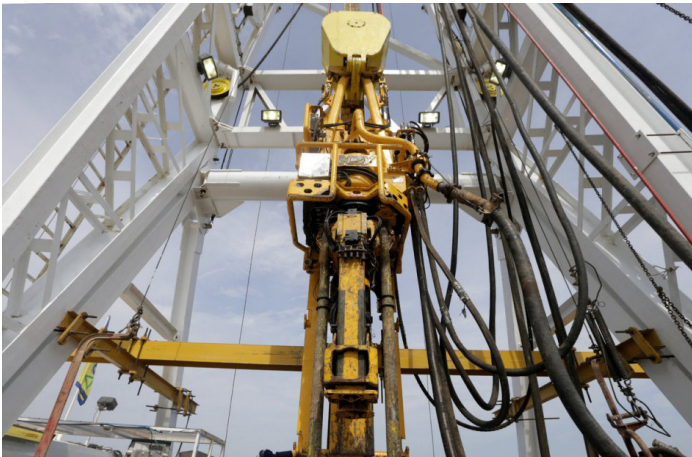
The early questions focused on clarification of community issues and community perceptions.

A Helis representative noted Helis was very open and transparent and communicated with multiple government organizations and community leaders. Jordan countered that there was very little direct contact or outreach with her clients.

A series of questions were raised about monitoring requirements. Helis agreed to a significant monitoring program. Batson noted that monitoring is good for the industry; that we need to do more. Though not every well can be monitored extensively because of cost, at least the first one should be.

Northshore Fracking

By: Allen Porter, PE, SPE Senior Advisor



Perhaps politically it is good that Helis failed in their fracturing plans. It is interesting that a writer to *The Times-Picayune*, with 31 years of oil field experience, recently expressed feelings it was best for the parish.

There are two sides to that story.

First, there are technical facts that are often distorted by those with limited experience. There is no support there was any chance for the fresh water supply to be affected. Today and for many years, properly completed oil wells of all kinds have not fouled fresh water zones. There was some controversy in the north east in an area that operators were not the best. In the Haynesville development and like all properly engineered installations all over the United States freshwater zones are cased and cemented.

Water pollution today is caused by open disposal. In Louisiana, our water is being hurt by human and agricultural run off. As a child in the late 1930's, this reporter swam daily in the summer in a cold clear flowing Bogue Falaya River. Look at it now. It is a sewage disposal outlet. Drilling of water wells, many artesian free-flowing wells, lowered the water table. The oil industry did not pollute the Northshore rivers and creeks. The people with spacious real estate developments did that along with help from the dairy industry.

There is strong evidence that the disposal of fracking water, as well as increased water production, has caused the earthquakes in North Texas, Kansas and Oklahoma. That geological formation is not like Louisiana. The earthquakes are usually caused by water going into salt water zones at a much shallower sand than the oil sands and well below the fresh

water zones Louisiana has been disposing of water for many many years with no earthquakes. The inis now planning to reuse fracking water so that would not be a problem to Helis. There was very minimal risk of any kind. The economically depressed area around Haynesville has been greatly improved by the oil field development. Affluent St. Tammany Parish does not need the oil money, only the engineers that support it.

Look at St. Tammany. It wants real estate development, the cause of their water pollution. They welcomed Chevron and the other clean part of the oil industry. Those who feel an oil well is bad should have objected earlier. They built huge buildings that brought well-educated, affluent, clean people to support the nasty drillers. Those folks with septic tanks and overloaded sewer systems pollute the water.

It is suggested in the defense of our Northshore lifestyle, with deer in our backyards, that better control be placed on building. The world's big problem is population growth. The planet cannot support many more folks.

In closing, it is also suggested that those that wish to protect "our lifestyle" look at the traffic on Highway 22 and the environment around Highway 21 and I-12 just south of Covington. It is Veterans Highway all over again. No doubt the huge apartment complex being erected will be luxurious. That was the case in the Causeway/Veterans area in Metairie. Twenty years down the road, the apartments are a crime problem. St. Tammany will face the same "Fat City" problem that Metairie did.

Easy question. Do we want a rural living area or economic development with the changes that go with it. The oil well would have made little difference. Nobody would have noticed it and it might have stopped more housing. Perhaps St. Tammany is like Wall Street. They want the profit but prefer the grime and dirt that generate it to be somewhere else.





Delta Section

and FIRST LEGO 2016

The 14th annual Louisiana FIRST LEGO League (FLL) middle-school robotics program is in high gear. On Saturday, December 10th, the LA State Championship will be held at Holy Cross High School in New Orleans and is open to 60 teams who have advanced from a sanctioned LA FLL Qualifying Tournament.

Each year FIRST LEGO League releases a Challenge, which is based on a real-world scientific topic. The Challenge has three parts: the Robot Game, the Project, and the Core Values. Teams of up to ten children, with at least one adult coach, participate in the Challenge by programming an autonomous robot to score points on a themed playing field (Robot Game), developing a solution to a problem they have identified (Project), all guided by the FIRST LEGO League Core Values. This year's challenge is ANIMAL ALLIES.

During the ANIMAL ALLIES season, students ages 9 to 14 will participate on teams to choose and solve a real-world problem in the Project.



They will also build, test, and program an autonomous robot using LEGO MINDSTORMS® technology to solve a set of missions in the Robot Game.

SPE-Delta helps sponsor this competition which promotes STEM (Science, Technology, Engineering, and Mathematics). Please plan to attend and support these teams as they operate under the FIRSTLEGO League signature set of Core Values, celebrating discovery, teamwork, and Gracious Professionalism. Better yet, plan to Volunteer! Volunteers are also needed as Judges, Judge Assistants, Scorekeepers, Crown control, Timekeepers, Referees, Pit Managers, Greeters, Floaters.....and many other positions. For more information please refer to: <http://lafll.org/Volunteering.htm>



Dues Waiver

SPE offers a dues waiver for renewing members who have lost their jobs due to the industry downturn and other circumstances. To qualify, submit a written request by either postal mail or email to service@spe.org

Out of Work?

Check out the Members in Transition Toolkit at <http://www.spe.org/members/transition/>. Learn how to optimize your job search, develop your network, enhance your skills, and thrive in a downturn.