The Tulsa Oil Drop

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Editor:
Heather Tittjung

President's Letter

Barbara McCandless
President, Desk and Derrick Club of Tulsa

Dear Members,

2022 is yet another challenging year for Desk and Derrick Club. As the Oil & Gas Industry bounces back, especially in Tulsa, we keep on keeping on!

There was no Membership Meeting in January as we all got back to the grind after the holidays(!), but we had a great speaker for the February Meeting! If you missed Charley Mathis, from Thru Tubing Solutions, you missed a good one! The Vice President, Sarah's write up will be posted on the website, check it out!

The Vision meeting promises to be fruitful, as well as fun! Shuffles, Board Game Café, sounds like a neat place in downtown Tulsa for brainstorming for a great year! The budget has been completed, reports sent to ADDC and we hope that some of you can go with us, to the Central Region Meeting in Wichita Falls, to represent Tulsa!

We are confirming speakers for meetings and are planning a couple of field trips for members and we are certainly optimistic about the rest of the year!

As has been the case for several years now, our big push needs to be ***Get The Word Out*** and we have a great chance to do this next month at the EnviroWorkshop that is being held in Tulsa this year. Because we were invited to be the Featured Local Organization(!), we will get to share our mission with people from all over!

I am really looking forward to a great year as we all "get it figured out" as change is the only Absolute that we see these days! Thanks to you all for being part of Desk & Derrick and for sharing the Club with all your Friends and Colleagues that may be interested in what we strive to do.

Warm Regards,
Barbara McCandless
2022 President

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Welcome New Members:

James Scott, Reliant
Brian Moore, Coterra Energy
Roxann Little, Blue Water Resources

New Students:

Logan Guthrie, TU
Alexis Scott, Cascia Hall

Desk and Derrick Club of Tulsa

2022 Dates to Remember

BOARD MEETING (MONDAY, 12:PM)	MEMBERSHIP MEETING (11:30 AM)*	MEAL / SPEAKER/FUNCTION
January 12	*January No Meeting*	
February 7	February 16, Wed.	Charley Mathis/Thru Tubing 11:30am
	March No Meeting	
April 11	April 21, Thur.	Orientation
	May No Meeting	
June 6	June 16, Thur.	Tom Seng
	July No Meeting	
August 8	August 17, Wed.	TBA
	September No Meeting	
October 10	October 20, Thur.	Club business, 2023 Election and Dates
November 7	November 16, Wed.	Industry Appreciation Luncheon
December TBD	December TBD	Social / New Board Installation

*In-Person Luncheon Meetings will be held at Summit Club unless otherwise announced.

SPECIAL MEETINGS

Vision 2022: 2/24/2022, 5:30pm - 8:00pm

Field Trips: 6/25/2022, D. W. Correll Museum, Catoosa, OK

8/20/2022, Tulsa Air and Space Museum & Planetarium

2022 Central Region Meeting: April 28-May 1, 2022 in Wichita Falls, TX

2022 Annual ADDC Convention: September 21-25, 2022 in Washington, PA

DoubleTree Hotel Pittsburgh/Meadow Lands hosted by Northeast Region

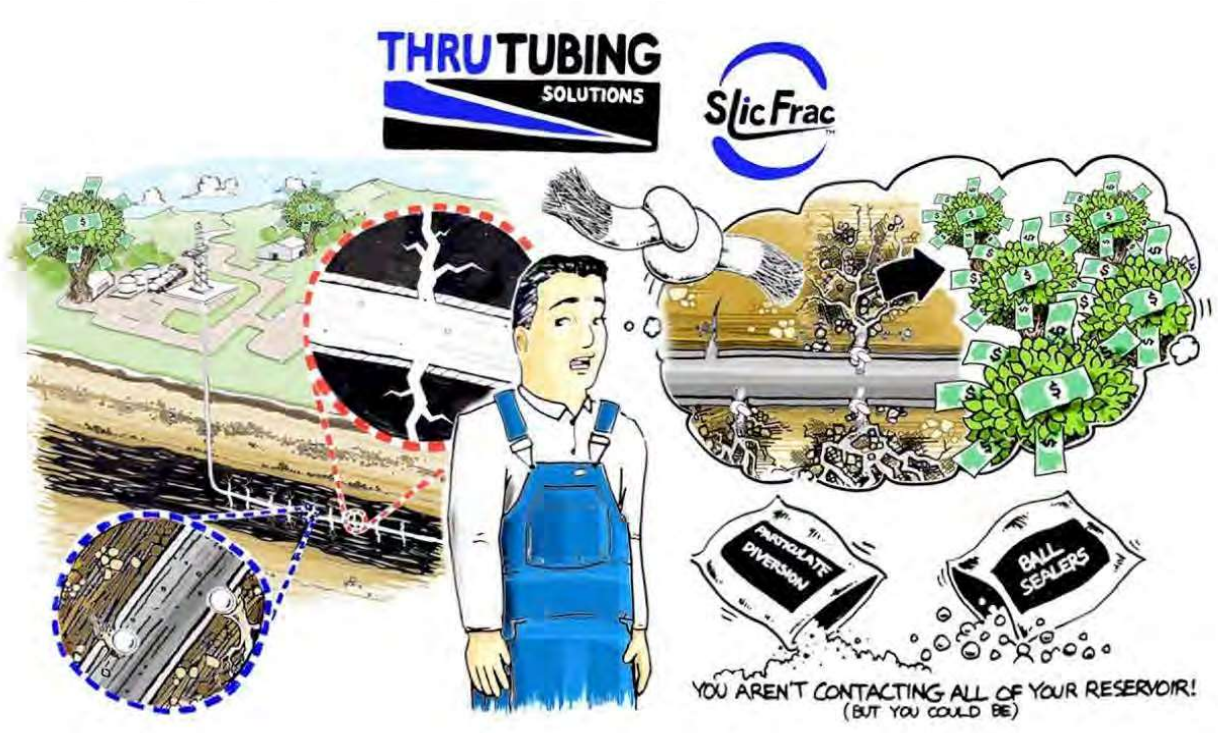
Updated 1/17/2022-bmc

Desk & Derrick of Tulsa – Presentation February 16, 2022

By: Sarah Jones

February's membership meeting was a truly insightful experience thanks to our speaker Charley Mathis from Thru Tubing Solutions (TTS). Though TTS is a well-known tool provider in the upstream oil and gas industry, Charley focused on a new technology developed by TTS to aid in frac & completion operations called "SlicFrac."

SlicFrac uses Perf Pods to replace existing packers that seat directly on perforation holes shot during a frac. Once a packer or Perf Pod lodges into the perforation it prevents fluid from further fracturing the dominate frac zone allowing for greater accuracy, efficiency, and increase in production. In addition to frac jobs, SlicFrac and Perf Pods are being used in recompletes, casing issues, mitigations.



Advantages of SlicFrac Perf Pods over traditional pack-

- Allows for zonal isolation & complete fracturing of every stage maximizing your reservoir potential
- Design incorporates a driving mechanism that allows accurate sealing of all perforations & not just those on the bottom of the wellbore.
- 100% sealing
- Variable self-degrading materials dependent on heat & pressure. Allows for more custom applications
- Helps allow parent well to maintain production & normal pressures when fracing offset development / close interval wells
- Minimizes the need for bridge plugs which reduces
    - wireline runs
    - fishing jobs
    - frac time
    - frac costs by as much as ½ a million (individual savings may vary on application)

Resources & Presentation Videos:
www.slicfrac.com
https://www.youtube.com/watch?v=x3gDvpPTjnU
https://www.youtube.com/watch?v=iqaZ4OOxsMc


February Meeting Guest Speaker
Charley Mathis
Thru Tubing Solutions
~Presenting~
"SlicFrac - Smart Diversion"


SLICFRAC DIVERSION

UPCOMING EVENTS

The Desks and Derrick club of Tulsa will be the featured association at this year's Enviro-Workshops seminar, details below:

What: **Environmental Remediation Workshop**

When: **March 3, 2022 from 11:15AM-5PM**

Where: **DoubleTree - Warren Place**
6110 S Yale Ave.
Tulsa, OK 74136

Cost: **Free**

Registration is required to attend:
https://enviroworkshops.com/workshop/2022-03-03-tulsa-ok/

Save the Date!

Saturday, June 25, 2022

Field Trip to the D.W. Correll Museum

19934 E Pine Street
Catoosa, OK 74015

Cost: $3

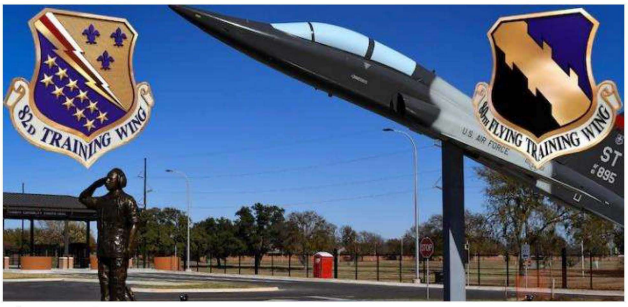
ASSOCIATION OF DESK AND DERRICK CLUBS

2022 CENTRAL REGION MEETING

Hosted by the

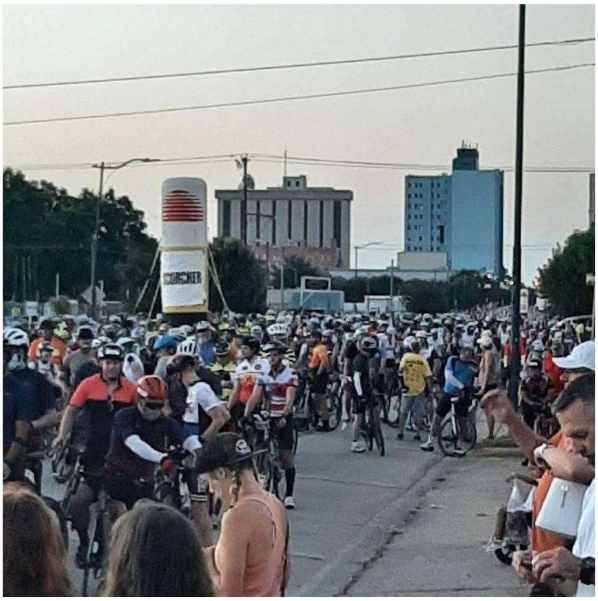
Desk and Derrick Club

of Wichita Falls, Texas

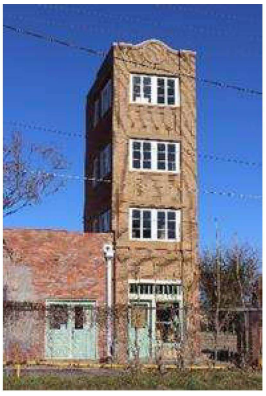


Sheppard Air Force Base

Midwestern State University



Hotter'N Hell Hundred



Littlest Skyscraper

INFORMATION & REGISTRATION PACKET

Click Here

Featured Photo

Gay Wheeler - Taken in Coffeyville, KS, 4/25/21

Photo title: Memorial to a Disaster

A little history: In 2007 a major flood of the Verdigris River submerged the refinery and a large residential area on the east side of town. There were some issues with the refinery not getting pipelines and tanks shut down in time. Many homes and businesses were totally lost. This is a photo of the refinery during the flood. You can see the flood water/oil level line in my photo on the right side of the building. The refinery bought out the properties that were condemned, but obviously some landowners felt cheated by "Big Oil".

WHAT I LEARNED ABOUT WIND FARMS

By Gay Wheeler

One important lesson I learned about wind farms is – when it's rainy and looks like it could storm, it's not a good day to tour a wind farm up close and personal. Lightning and static electricity are very big safety issues when working near wind turbines.

At the Desk & Derrick regional meeting, held in Oklahoma City in 2009, I signed up for the field trip to the Blue Canyon Wind Farm, which is located north of Lawton, Oklahoma. The two-hour bus ride gave us plenty of time to speculate on what the weather was going to do. It was cloudy and looked like it could pour down rain at any minute. The first sign of the wind turbines at the top of a hill brought excitement and anticipation to the 42 D&D members on the bus. As the bus pulled in to the Blue Canyon business office, and the rain started coming down, all we could think about was how wet we were going to get when we drove to the top of the hill to see the wind turbines up close.

Blue Canyon on a sunny day.

Little did we know that when our host, Jody Hardesty, boarded the bus, the first thing we would hear is "We can't go up on the hill today because of the weather." After explaining the dangers of lightning and wind turbines, she began to tell us the history of the farm and how it was built. We weren't going to let a little bad weather keep us from learning more about wind energy.

The Blue Canyon Wind Farm went on line in December of 2003. Phase 1 consisted of 45 turbines, each capable of producing 1.65 megawatts of electricity. In 2005, Phase 2 provided an additional 84 turbines, with a combined total for both phases of 225.45 megawatts. Later phases added 121 turbines, bumping up the generation capability to 423.45 megawatts, producing enough electricity to power over 94,000 homes.

Prior to building a wind farm, 5 to 7 years worth of data on wind speed and direction is gathered and studied to determine the best locations for the turbines. The company must lease land from the owners, who actually receive royalties on the power produced. The Blue Canyon site is located on more than 12 different properties, but one landowner has 101 of the turbines on his property. Next, roads are built to provide access for the construction and maintenance of the turbines. MET towers (Meteorological towers) are installed to gather wind data, as wind speed and direction are constantly monitored at the site.

The turbine site may be blasted with dynamite, or excavated with backhoes before construction of the foundation begins. At least 300 yards of concrete are required per turbine, that's 30 trucks of concrete. Trucks are used to transport the turbine components to the site - usually about 8 are required per turbine. For Phase 2, twelve cranes were required to erect the towers. The turbines are carefully located using a GPS, and are placed a minimum of 375 feet apart, to prevent crashes if one were to loose a blade or fall over.

The turbine blades are really big.

The main parts of the wind turbine are, the tower, the blades and the nacelle. A nacelle is a box, about the size of a small school bus, which houses the generator. As the blades turn, the shaft rotates inside the generator and produces AC (alternating current) electricity. The electricity must be produced at just the right frequency and voltage to be compatible with the power company grid. The "grid" consists of transmission lines that conduct the electricity to the users.

Controls are in place to make sure that the turbines don't turn too fast, which could cause damage to the blades. On a pitch controlled turbine, an anemometer mounted on top of the nacelle, constantly checks the wind speed and makes adjustments to the angle of the blades for the most efficient use of the wind. With a stall-regulated wind turbine, the blades do not adjust during operation. Instead the blades are designed and shaped to increasingly "stall" the blade's angle of attack with the wind to both maximize power output and protect the turbine from excessive wind speeds.

SCADA system computer.

Each wind turbine is connected to a control system, which regulates the energy output and monitors everything that is going on at the wind farm. The SCADA (supervisory control and data acquisition) system, tells you how much

Continued on next page

each turbine is producing, wind direction, temperature inside and outside each turbine, whether lightning has struck a turbine, and if a turbine needs service or repair. The SCADA system is located in the control room of the office building. Our tour group took turns viewing the SCADA system computers, while our guide answered questions about the wind farm. Some of us even braved the rain to go out and take pictures of the spare blades stored out back of the office.

Those little black specks are cows.

Since we didn't get to visit the turbines on the hill, we had to persuade the bus driver to find a good place to pull over and let us out to take pictures. He finally found a nice spot that was pretty close to the turbines, and the photographers filed out of the bus looking for an unusual angle to snap a photo. We've got to keep the AIMEE Award Photo Contest in mind!

We topped off this great adventure with a stop for lunch at the Meers Store and Restaurant, home of the World Famous Meersburger. Some shared the famous "Seismic Burger", enough for 4 people and served in a pie tin. Others tried the fried green tomatoes and fried okra. We were told it was a must to save room for home-made cobbler and ice cream, so most of us ordered it whether we had room or not. Very, very good food!!! It was a pretty quiet trip back to the hotel, since we were all so full and just wanted to take a nap.

Cobbler & ice cream at the Meers Store.

Although I was disappointed about not getting a close-up look at the wind turbines, I still learned a lot about how wind farms are built and operated. Maybe I'll get another chance to visit some day…

For more information see:

https://www.edpr.com/north-america/blue-canyon-wind-farm

Desk and Derrick Awareness Month

SUN	MON	TUE	WED	THU	FRI	SAT
		1	2	3 EnviroWork-shops	4	5
6	7	8	9	10 Vision Meeting	11	12
13 Daylight Savings Time	14	15	16	17 St. Patrick's Day	18	19
20	21	22	23	24	25	26
27	28	29	30	31 Region Meeting Registration Deadline		

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