

**OKLAHOMA ADVANCED MOBILITY
ADVISORY COUNCIL MEETING MINUTES**

October 19, 2023

CALL TO ORDER: Mr. Schwennesen called the meeting to order at 2:05 pm

ROLL CALL:

Present: Jamey Jacob
Doug Wood for Grayson Ardies
Amy Loftis-Walton
Jennifer McGrail
James Grimsley
Gary Ambrose
Maynard Factor proxy for Steve Fendley

Absent: Tim Gatz
Tyler Moore
Hopper Smith

ITEM PRESENTED BY Mr. Schwennesen

Approval of Minutes from the September 21, 2023, meeting

ACTION: Walton moved, and Ambrose seconded that the Minutes be approved as presented.

MOTION: Carried by the following vote:

AYES: Jacob, Ardies, Walton, McGrail, Grimsley, Ambrose, and Fendley

ABSTAIN: None

ABSENT: Gatz, Moore, and Smith

GUEST SPEAKER

Ms. Amy Loftis-Walton introduced Tyler Helps, Director of Business Development at Cox Automotive and Spiers New Technologies, Inc. She explained she was excited for Tyler to come and talk about their vision and everything that's going on at Cox because they are growing fast. I have known them for 8 years, and they are growing fast. They have around 400 employees in multiple buildings across the Oklahoma City Metropolitan area. So, welcome Tyler and we are looking forward to hearing about the Electric Vehicle Lifecycle Management and viewing your Industry Transition Presentation.

Mr. Helps gave a very interesting PowerPoint presentation explaining what each of his companies does and how and why they got started. They started the business in 2014, and their thought was the best way to service electric vehicles was to make a 1-stop solution for all needs of the batteries. The EV battery is roughly 40% of the vehicle's cost; as a result, it matters very much what you do with the battery, how you repair it, and make it useful again. So, we created this circular suite of services and it starts from the distribution and storage of these batteries. If your check engine light comes on, take it to your dealership. It's under warranty for 8-10 years, and you get a new battery, which is shipped from our facilities in Oklahoma City, Detroit, or Vegas. Then we get the bad battery shipped to us, and we get to work and decide if it can be remanufactured or repaired. Sometimes, a little \$20 component fixes a \$20,000 battery. There are all sorts of ways to fix the batteries. After they are fixed, we then ship those out as replacement batteries, labeled "repaired or refurbished" and that obviously saves a lot of cost.

Sometimes not all batteries can be repaired or refurbished, so our company has services for repurposing the batteries. We make energy storage systems that are made from used EV batteries, so that prolongs the use of EV batteries even further. We dive into these batteries that are the size of a full-size mattress and weigh about 1200 pounds. Our certified trained personnel dive into the best way to repurpose these batteries. So, batteries do have a useful life even when they are no longer useful in the vehicle. They go to energy storage systems, or if they can't be used in energy storage systems, that is when recycling comes into play. We actually operate our own recycling plant and shred the batteries to recover what's called in the industry as black mass or a mixed metal concentrate. What is black mass, it has lithium in it, and 50% of its mass is nickel cobalt. Roughly 94% of the critical material that goes in comes out into this one package. We then use this recycled material to make new batteries. We do all this ourselves and work with all companies except Tesla. We were named "GM Supplier of the Year," and we are very proud. We are the industry leader and we are right here in Oklahoma.

Ms. Walton commented, "So the rumors that people say, or the negative connotations that people say like, we don't have enough materials, we will run out of lithium, or they are just filling our landfill; I can actually fight comments with the information you have given us today, thanks so much"!

Mr. Robins asked about the batteries catching on fire and said people are worried about that, and there may be something coming up in legislation about that.

Mr. Helps said that their batteries differ from E-Mobility batteries in E-Bikes. We get rolled up into these types of conversations. I want to clarify that these types of batteries are being modified at aftermarket shops, and they are the ones causing these fires. The legislation coming out is troublesome for all EV automotive grade batteries because the E-Mobility batteries in scooters, bikes, and other consumer electronics are very different grades of batteries. There is a distinction between the quality and the engineering behind those cells. It is important that they are handling the E-Mobility batteries correctly, but they do need to be a separate conversation from the electronic vehicle batteries.

UAS/AAM MOBILITY STRATEGIC PLANNING UPDATE – Ms. Thea Ewing

Ms. Ewing said they are moving right along; we have 3 different groups that have been meeting in-house here. We have an "Aviation Team," and they actually had a call with some stakeholders this week. They've been drafting their section, and they will be meeting with Director Ardies and Doug next week.

We have a "Ground Team" that's been working on their section. A little background on this: you've seen some of these people, and most of your aviation team is out of Oakland, California, and a couple from the DC area. The "Ground Team" from Austin and Tallahassee are coming to meet with Andreas, Tom, and us tomorrow. We are going to go through everything with them and see if they have any questions about data resources, things you may want to highlight, and things you don't want to highlight.

We have also been meeting with NEXA, which is our Consultant for economics. They did a baseline presentation with us this week, where they shared multiple assets of data they have gathered on the State of Oklahoma. There are over 40 layers of information to this file right now. They are only looking at Oklahoma and there are so many corridors on the ground and in the air that go beyond the state itself. So we are working to calibrate that data sets to be more inclusive of the great plains region and how it all connects. Just wanted to make that clear as we roll that out you are going to see more and more data that's broader than Oklahoma.

That's pretty much where we are on the three key items. We aim to have a draft of these executive summaries in my hand before Thanksgiving.

Mr. Mike Patterson gave an update on policy conversations and is making sure they line up with the Executive Summaries. He was in the "One Voice" Meeting yesterday with the Tulsa Chamber. They talked about one of the initiatives they are putting in their paper, which talks about corridors for air mobility from Tulsa to the Choctaw Nation. They went on to talk about the one from West Texas to New Mexico to Western Oklahoma. The more people are talking about this, and how it is evolving, the more it is moving faster than it has ever been. We plan to meet with General Smith at the Department of Commerce; this will help triangulate some of the information we will get from our Economic Development Specialists.

Mr. Patterson added something he remembered that might be of interest to us. A few years ago, the Legislature and Governor Stitt signed a document that prevented cities and counties from legislating against air mobility. It also puts all the control of autonomous, connected vehicles with the State. So, he suggested we modify the current legislation instead of creating a new one.

Mr. Schwennesen commented it seems we have a consistent theme in this group: how can we ensure we stay out of the industry's way as it builds up to this new infrastructure and technologies.

Ms. Walton said the biggest thing as a State, the last thing we want to do is get in the way of industry. In the private sector, they will bring the technology; they will bring the new science, and we need to ensure we are staying out of their way and not suppressing that growth and opportunity. I have seen it be attempted, so we must be mindful and monitor that very closely.

Someone brought up HB2599, which may be more stringent than Federal. We will make sure to keep watch on that house bill. We need to contact our legislature now since they are a little more free now that the session is over.

AUTONOMOUS VEHICLE WORKING GROUP UPDATE – Mr. Jared Schwennesen

Mr. Schwennesen said he, Tom, and Andreas attended the Safety Oklahoma Summit on October 4th, the first of its kind in Oklahoma. It really brought not just traffic but all surface safety needs into one location, education, engineering, and enforcement all together. It was very interesting; Tom gave a panel discussion about autonomous vehicles. He even brought in a keynote speaker, and he asked Tom Robins to expand on that speaker a little bit more.

Mr. Robins said he had AAA and their foundation come and speak about autonomous vehicle technology. What is the public's perception of the different types of autonomous vehicles and safety considerations? We are seeing healthy skepticism, but we also identified a challenge that people do not understand. They are not properly educated on the autonomous vehicle technology already equipped in their vehicle. They are either ignoring or turning off the flashing lights, the vibrating steering wheel, and other autonomous components.

We also had our friends from Cambridge Telematics kick off the conference. They have a "Safe Driving App" provided for every insurance provider. You save 20-30 percent when you download this app. He showed us real-time statistics of Oklahoma and what is happening in the driver's seat. It is very scary; they observe 36-37 percent of real-time distractions behind the wheel. This means that at over 10 miles an hour, they are actively engaged in a distraction involving their mobile device and are not completely focused on the road. They are looking at models to put together crash reports that don't just tell you the point of impact but tell you what was happening as it leads up to it.

They have asked me to educate folks on the safety game. On October 30th, the Oklahoma Traffic Engineering Association will be hosting an event at the ODOT Training Center. So come on out, we will be talking about autonomous vehicle technology.

OPEN DISCUSSION

Mr. Grimsley said the Choctaw Nation will be doing a groundbreaking next week. We have already gotten quite a bit built, but this is for the main facilities. We also will be putting out a press release, it is pretty big news and has to do with our corridor.

Ms. Walton said they are having an EV Car Show in Shawnee on Saturday from 9-11 in the morning at the First United Bank. They will have lots of EV cars for us to tour.

Mr. Grimsley said Oklahoma really needs to get moving because the North Texas region is really getting involved in the EV ARC. They have jumped into developing a strategic plan and are acting on it very quickly.

CLOSING REMARKS

Mr. Schwennesen thanked everyone for attending and said the next meeting will be held on November 16th, 2023, @ 2:00 p.m.

ADJOURNMENT MOTION

ACTION: Walton moved, and Jacob seconded that the Meeting be adjourned.

MOTION: Carried by the following vote:

AYES: Jacob, Ardies, Walton, McGrail, Grimsley, Ambrose, and Fendley

NAYES: None

ABSENT: Gatz, Moore, and Smith

The meeting adjourned at 3:05 pm

Approval of Minutes:



Jared Schwennesen – Acting Chairman