

### **November 2020 FVEAA Newsletter**

### Fox Valley Electric Auto Association

The FVEAA is a Not-For-Profit Illinois Corporation and the Chicago-area chapter of The Electric Auto Association

This month's meeting is on Friday November 20, 2020 and will be VIRTUAL ONLY (NOT AT CCC) due to the Coronavirus outbreak for the purposes of "social distancing"

We are using the Zoom video-conferencing platform to hold this ONLINE meeting. Zoom runs on all computers and phones. Some setup is required prior to your first use of Zoom on your device of choice. Connect to the meeting a bit early (6:45pm earliest) by using the link below to test your connection. Please call Ted Lowe (630-260-0424) if you want help getting Zoom installed on your device of choice. You can also dial-in on your telephone to have an audio-only connection (see phone number and meeting ID below). The audio on your device will be automatically muted upon entering the call to avoid disrupting the call.

Pre-meeting setup check starts at 6:45pm.

Meeting starts at 7pm and will run until 9pm.

Use this information to connect during these times:

**Topic: FVEAA November 2020 Monthly Meeting (VIRTUAL ONLY)** 

Time: Fri November 20, 2020 6:45 PM CST (pre-meeting setup check), Meeting 7:00 PM

Join Zoom Meeting (NOTE: Password has been added to link as of Nov 2020):

https://us02web.zoom.us/j/95901481473?pwd=UnpJVUJOUmVPOFZqR013ZFpPbzM0UT09

Dial-in for audio-only users: Call: 312-626-6799
Enter Meeting ID when prompted: 95901481473#

Participant ID: (blank, just #) \*6 mutes/unmutes your line, \*9 raises your virtual hand

### **Agenda**

- 6:45 Virtual Meeting Starts (to test connections)
- 7:00 Introductions and "What do you want to learn about?"
- 7:40 The December 11th meeting is remote and we want you to be involved!
- 7:50 Break
- 8:00 Jeff M on permitting and indicators on how hard it will be to install a charging station

President's Words Jeff Miller

Please upgrade your ZOOM client! We want to use the new features.

Advance Showing of the ID.4 November 19th Exclusively at Bill Jacobs Volkswagen starting at 9AM.

### **October meeting**

Thanks to Ted and Tracey for their excellent truck presentations last month. Tracey almost made me feel bad about my E-SUV presentation!

I am still most excited about the CyberTruck, because I am fine with it's insane looks and stainless steel body. It will be a few years though as I would likely be shopping for a used triple motor version a few years down the road, but who knows!

### **November meeting**

We want to help support each other and part of that is getting more support to the members (not just the new ones) who have questions about EV topics. Charging, buying, driving, fixing, whatever your question is, we will try to get it answered. To that end we will assign people (including me) to help answer questions people have outside of the meeting. We can't possibly cover some of the more detailed questions in a meeting format, most people don't want to learn about the intricacies of someone else's home electrical system. If someone raises a topic that has general support then we would cover it in a meeting too!

So please, bring your questions, you could save yourself thousands of dollars or gain detailed knowledge of electric cars and charging systems. Work sessions aren't out of the question either. Obviously precautions need to be taken for in person meetings, and we will work to address that as we set these up.

I will also be presenting on what it takes to get permits together based on my experience helping people in various towns. I will attempt to answer questions like "what is a cut sheet?" and "how do I make a line drawing?". Lastly we will talk about some of the factors that drive up the costs of putting in a charging station.

If you want to get a jump on it, feel free to read my forum posts from a couple of years ago when I was building my setup. You will get to see my adventure of learning about this stuff leading me to the point I am at today.

https://www.fveaa.org/forums/index.php?topic=1482.0

#### **Articles I found interesting**

https://arstechnica.com/cars/2020/11/electrify-americas-ev-chargers-now-support-plugcharge/

As the article says this is good news for the people that buy these newer cars. Fast charging should be as convenient as possible. You are paying enough for it!

https://arstechnica.com/cars/2020/11/chevrolet-issues-a-recall-for-2017-2019-bolt-evs-due-to-battery-fires/ In case you own a Bolt and haven't heard about the recall yet. If you set to hill top mode on the 2017 and 2018 then you are already set. On the 2019 you would need to set to 90% or lower state of charge. My thoughts on this are complicated. I think we would agree that Tesla is probably the leader in battery tech and here Chevy and LG are struggling with something Tesla has been struggling with for a year or more now. The 85kwh batteries that Tesla has lowered the max state of charge in 2019 haven't been raised back up substantially and GM is going to have a fix early next year? I am feeling a bit skeptical that they

will get that 10% back. That isn't great, especially for those people who need that last 10% for a specific journey. Fortunately most people don't have a use case where they need the last 10% in a Chevy Bolt. I would expect that this could end in litigation of owners versus GM. It certainly did for Tesla. The argument hinges around the fact that the manufacturer reduced the capacity to limit warranty claims, and as such devalued the car in the process. The argument continues down the path that the manufacturer should make the owners whole by installing a battery that doesn't have this limitation, otherwise they have made the car worse without the owner's permission to lower their liability. The owner doesn't get anything out of this deal except a less valuable car. Obviously neither GM or Tesla want to replace battery packs in 10's of thousands of vehicles. My expectation is that this is caused by Lithium dendrite growth, but I haven't seen a confirmation by GM of this.

On a positive side, I can't help but notice that used Bolt's are thousands cheaper all of the sudden.

https://jalopnik.com/jalopnik-editors-review-the-new-polestar-1-and-polestar-1845445953

https://jalopnik.com/the-ford-e-transit-is-the-most-exciting-electric-car-in-1845653239 https://www.theverge.com/platform/amp/2020/11/12/21559954/ford-e-transit-electric-delivery-cargo-van-price-specs-range

These work vans never seem to die, so putting electric ones out there should be a good way to displace plenty of miles for many many years.

https://arstechnica.com/cars/2020/11/after-12523-replacements-feds-investigate-tesla-media-control-unit-fa ilures/

Not to pile on Tesla here but this was definitely stupid of them. The logs they are saving on this chunk of flash have nothing to do with operation of the car. The car operation logs are stored on a separate card. To their credit they have continually improved their process to where they now just charge you to replace the Nvidia card the flash is soldered on to. This dropped the repair cost from thousands to \$500. \$500 isn't free, but it is much easier to swallow than thousands. I wish they would have taken that approach a few years ago, but I am glad they got there eventually.

I will also say this flaw affects the usability of the car, the MCU gets very slow on older cars to the point where the browser no longer is effective. Other users report the browser working again once they get the flash replaced. I won't say that the browser is a critical part of the car, but it's part of the feature set and it doesn't usually work very well on the cars with old flash in them.

https://jalopnik.com/hyundais-electric-ioniq-plan-is-taking-shape-1845648249

https://jalopnik.com/rivian-announces-pricing-for-pickups-and-suvs-and-paten-1845654219 https://www.cnet.com/roadshow/features/2021-rivian-r1t-electric-truck-first-drive-review/

https://arstechnica.com/cars/2020/11/the-ix-is-bmws-new-flagship-electric-vehicle/

https://jalopnik.com/gm-is-going-on-an-electric-car-hiring-spree-1845626255

https://arstechnica.com/cars/2020/11/bentley-will-ditch-internal-combustion-engines-by-2030/

https://jalopnik.com/the-porsche-taycan-is-off-to-a-surprisingly-fast-sales-1845599107

https://jalopnik.com/dtm-finally-has-a-good-idea-with-this-1000-hp-electric-1845599308

https://arstechnica.com/cars/2020/11/the-electric-volvo-xc40-recharge-first-drive-impressions/

https://jalopnik.com/hayden-paddons-electric-hyundai-kona-wrc-car-would-kick-1845588970

https://arstechnica.com/science/2020/11/as-renewable-power-prices-drop-researchers-tally-up-their-added-costs/

https://jalopnik.com/this-all-electric-retrofitted-1977-chevy-blazer-is-my-w-1845523770 https://arstechnica.com/cars/2020/10/chevrolet-readies-an-electric-crate-motor-for-homebuilt-ev-hotrods/

https://arstechnica.com/cars/2020/10/why-is-everyone-building-an-electric-pickup-truck/

### https://insideevs.com/news/450511/tesla-recall-model-s-x-suspension-issues/amp/

I have covered this in the past from the forums, and now China is forcing the issue. Suspension control arms coming apart is rarely good.

https://scitechdaily.com/nasas-electrifying-new-propulsion-systems/

Electric space vehicle?

https://arstechnica.com/science/2020/11/first-major-modular-nuclear-project-having-difficulty-retaining-back ers/

https://www.popularmechanics.com/science/amp34431835/nuscale-small-modular-reactors-government-gr ant/

Small scale nuclear power plants sound interesting and might hold the keys to getting nuclear power affordable in our modern US regulatory environment.

I do not directly hold any interest in any car manufacturer or any of their subsidiaries

Upcoming EVents Rich Hirschberg

None known on the e-radar

## **Photos of our Virtual Meeting in October**

**Bruce Jones** 









**EVen Short-Range Electric Trucks Are Useful!** 

Ted Lowe has been driving electric pickup trucks for nearly 20 years!

People movers...



EVs are Everywhere!



Cargo transporters...



... @ Packer Engineering...





Thanks Rich Hirschberg for coordinating the Oct. 3, 2020 EV Cruise EVent, Naperville to Addison

PRISTREE Mapping Out The Downtown Naperville

Why Do this? Midwest Green Car Expo canceled, NDEW issues

**Idea**: Elgin Cruise – Memorial Day 2020 – 70 to

80 vehicles - police escort.

What to call it: parade, cruise, ???

Route: through neighborhoods, side streets, surface streets - beeping our horns through out.

Side Trips: cruised thru Current Automotive

parking lot.

Where to Start: Our pre-Covid meeting place -

the Yellow Box Church, Naperville

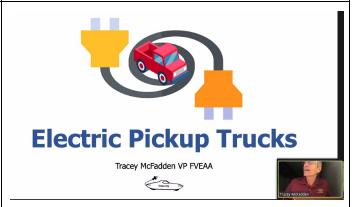
Where to End: Elio Pizza on Fire Restaurant

Miles: approx. 21.5 miles





Tracey McFadden delivers a heavy duty presentation on all the electric pickup trucks coming!



### **Electric Pickup Trucks Coming Down the Pike**

#### · Tesla Cyber Truck

- Rivian R1T
- GMC Hummer EV Sport Utility Truck
- · Lordstown Endurance
- Bollinger B2
- · Chevy EV Truck
- Nikola Badger
- Ford F150



### **Tesla Cyber Truck**

#### Single Motor RWD

- \$39,000
- 250+ Range
- 7,500 +lbs Towing Capacity < <6.5 seconds 0-60 mph
- **Dual Motor AWD**
- \$49,900 • 300+ Range
- · 10,000+ lbs towing Capacity
- <4.5 seconds 0-60</li>

#### Tri Motor AWD

- \$69,000
- 500+ Range
- · 14,000 + Towing Capacity
- <2.9 Seconds 0-60



Hi Folks, If you haven't logged in to our new website already, please check your email for instructions and login as soon as you can! Please let me know if you have any questions. Thanks, ted



# Website Registered User Statistics

Statistic	Value
Total Users	64
Users Never Logged In	26
% Active Users	59.4%
Ave. Days Since Last Visit	173.7 days

#### **FVEAA On Facebook - Join Us! Like Us!**

Ted Lowe

In October 2015, I created a **Facebook group for the FVEAA** and invited all the past and current FVEAA members I know that are on Facebook. There are 86 members as of 3/11/19. If you're on Facebook but not in the group, yet please join us! If you're not on Facebook yet, please consider joining so you can join our group there! This group supplements our forums because it is much easier to use, read, post pictures and videos and get notifications. Please let me know if you have any questions/comments/suggestions. Hope to see you there! <a href="https://www.facebook.com/groups/889497691136309/">https://www.facebook.com/groups/889497691136309/</a>

Grant Gerke started **FVEAA's Facebook Page**. Like Us!

https://www.facebook.com/FoxValleyElectricAutoAssociation

Membership Update Ted Lowe

We currently have **51 active paid-up** members. Many members have taken advantage of the multi-year renewals offered by the new website! **Please renew** & recruit new folks!!!



# Count of Members by Type

Membership Type	Count	Paid Up
Business	1	1
Family	4	4
Individual	50	44
Lifetime	2	2
Totals	57	51

# Other Statistics

Statistic	Value
% Paid Up	89.5%
Avg. Paid Up Days	370.0 days
% With Email	94.7%

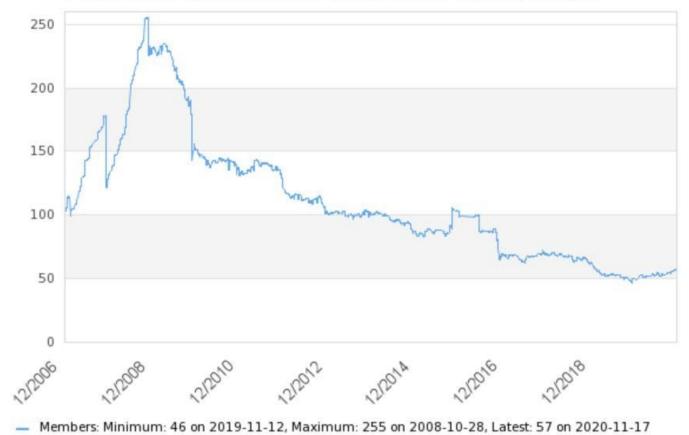
# **Encouraging Our Membership To Grow and Some History**

Ted Lowe

We live in a large metro area with 8 million people and EVs are the latest buzz so we should be able to grow the FVEAA! **Please invite your friends, neighbors, family, colleagues**, etc. to FVEAA meetings and EVents. Volunteer to attend EVents on behalf of the FVEAA (with or without an EV)! Your ideas on how to help grow the FVEAA are welcomed at any time, thanks! Howard Hansen had a **great idea**... giving an FVEAA membership as a gift!

Here is a time-varying graph of our membership size from 2007 to now. Note that we peaked at 255 members in October 2008 when gas was nearing \$5 per gallon. We were also attending lots more invitational EVents with our converted EVs. The first Tesla Roadster was just coming into being. **Let's get out there and grow the FVEAA!!!** 

# FVEAA Paid Up Members as of November 17, 2020 5:23pm



# **Monthly Treasurer Reports**

Ted Lowe

As Treasurer, I am publishing a brief Treasurer's Report to our forums around the time our monthly newsletter is published.

i am publishing our various cash balances (Money Market, Checking, PayPal) to this location: <u>FVEAA Committees</u> > <u>Finance</u> > <u>Treasurer Reports</u>

This area of the forums can only be seen by FVEAA members. As an IL Non-Profit corporation, we have no requirement to publish our assets or financial statements publicly.

Feel free to contact me if you have any FVEAA financial matters to discuss.

# Membership Renewals

Ted Lowe

Our membership system sends out "renewal reminder emails" before your membership is due. You will receive up to 3 before being marked "not renewed" (inactive). The sooner you renew, the fewer emails you will receive:) So please pay attention to your email from the FVEAA and renew online using this link (for the easiest approach for all of us):

https://www.fveaa.org/renew

THANK YOU for your continued support of the FVEAA!

### 7:08 p.m. - Treasurer and multi-hatted web site coordinator Ted Lowe started the meeting

 Ted was backing up President Jeff who was wandering around on mountain roads in Arizona. He was connected through a satellite link that featured long latencies and limited networking capability.

Introductions all around – Jeff's monthly question was, "what electric vehicle do you have, and what do you want to learn?" Noted responses below...

- o Howard Hansen cleverly noted that latency rhymes with "wait and see."
- o Simon is working on EV charging from a utility standpoint
- Tracey McFadden confirmed the FVEAA is now a member of the Illinois Clean Jobs Coalition. (Thanks Tracey!)
- Rob Schwartz is working on an electric motor scooter
- o John McGowan is using a Nissan Leaf battery pack in his conversion
- o Chris Young has a UTube Channel:
- o https://electrek.co/2020/06/02/nio-battery-swap-electric-cars-completes-500000-swaps/
- Chinese electric car manufacturer Nio's battery swapping system can perform a fully-automatic battery swap in 3 minutes
- o https://electrek.co/2020/06/02/nio-battery-swap-electric-cars-completes-500000-swaps
- o Rich Hirschberg has been an FVEAA member for at least 15 years (beginning of our online data)
- Friday Dec 11th was voted the date for our holiday meeting in December
- Ted Lowe presented "Even Short Range Electric Pickup Trucks Can Be Useful"
  - Ted recounted many ways his two converted pickup trucks despite having limited range were, in fact excellent people movers, educators, cargo transporters, education, lab subjects etc.
- · Break
  - Rich Hirschberg presented on the fun October E-Cruise Event

Membership Form Ted Lowe

# **FVEAA Membership Application Form - Version 2014-01-01**

Name:	
Address:	
City, State Zipcode:_	
Phone:	Phone Type: Home Work Cell
Email:	·
Please check one:	New Member Renewal
How did you hear ab	out the FVEAA ?

# Membership Types and Annual Dues (please circle one):

Individual	\$20
Business	\$100
Premier Business	\$250
Charter Business	\$500

Newsletter Delivery Type (please circle one): No Newsletter Electronic

Please make checks payable to "FVEAA" and postal mail it with this membership application form to:

FVEAA PO Box 214

Wheaton, IL 60187-0214

Attn: Membership

### **FVEAA Business Members**

### **EV Converters LLC**

Rolly Waller 1401 Burr Oak Rd, Unit 208 C Hinsdale, IL 60521

Cell: 630-865-5744

Email: rollywaller@gmail.com



EVC will become a Franchisor (when the US government approves the conversion rebate) to appoint Franchisees (eg, service stations, oil change shops, transmission shops, independent mechanics, etc.) to convert Internal Combustion Engine (ICE) vehicles to electric vehicles (EV).