



# November 2024 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 15, 2024**  
**7:00 p.m. and will be IN-PERSON and on-line**

Location: 102 S 2nd St, Geneva, IL 60134

MAP:  Unitarian Universalist Society of Geneva

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

Topic: FVEAA Monthly Meeting

Time: Friday November 15, 2024 - 6:45 PM CT (pre-meeting setup check),  
Meeting 7:00 PM

Join Zoom Meeting:

[Zoom Meeting Link](#)

Dial-in for audio-only users: Call: 312-626-6799  
Enter Meeting ID when prompted: 95901481473#  
Participant ID: (blank, just #) \*6 mutes/unmutes

## Agenda

- 6:45 Virtual Meeting Starts (to test connections)
- 7:00 Introductions
- 7:40 Ted Liu on EV's in Mumbai India
- 8:10 break
- 8:15 Jeff Miller on Mitsubishi Heat Pumps
- 9:00 Close

## President's Words

Jeff Miller

## October Meeting

Thanks to Tracey for running the meeting and our guest speakers Jeanne, and Don. Thanks to

Bruce for rounding up volunteers for the events next year.

## **November Meeting**

Ted Liu is going to do a presentation on EV's in India. India is now the most populous country in the world, and how they are doing on EV adoption matters to the entire world as their population continues to have an increasing standard of living. Everyone is currently worried about China EV's taking over the world, and that is a big deal, but India will be right behind them. It's worth remembering that the population density of Mumbai is much higher than our cities here, and they have a true need for smaller city cars that we never really embraced here due to our lower densities.

I will be going over the tools and techniques required to install a Mitsubishi Mini-Split Heat Pump. It still requires tools beyond what most people have, but if you are doing enough of them it makes sense to buy them. I will also provide an optional list of things you will need if you discover a leak after releasing the refrigerant or other servicing requirements.

**2025 Event list, please see below, and reach out to sign up to volunteer.**

## **Heat pumps!**

My vacation in Arizona was a success! It went so well my friend bought a third heat pump, and we installed it too! We also looked at the 20 year old unit at his dad's house in Tucson, which has had a constant 1 pound a year leak for the last 10 years. The company said they couldn't get R22 anymore, but we were able to locate it at a vendor in Phoenix for a reasonable price. As the system uses a TXV we used SubCooling to determine the charge level, and it was running with 0 SubCooling. We charged it to a target of 11 degrees of SubCooling, and the unit kept the house nice and cool in the 100 degree heat. It took 3 pounds, which is quite a bit, but this system takes 17 pounds total as it has two compressors, for a low and high stage. SubCooling is the concept that there is liquid refrigerant in the condenser coil outside, and that liquid gets cooled below the temperature that the pressure gauge is telling you the vapor is condensing at (the dew point of the refrigerant in the condenser coil). We want some liquid refrigerant in the condenser coil, otherwise some gas will escape without being condensed, resulting in very poor performance.

Most leaks don't stay the same size for years on end, but leaking Schrader cores can cause that. I used the core tools to swap the cores without recovering the charge from the system. The noteworthy point was the cores had no breakaway torque, so they were definitely loose. Obviously I don't know if that is the only leak on the system, but it's definitely going to be a contributor. Either way, my friend has the tools and abilities to service that system next year, and then we will learn more.

Here is a video on core removal tools, and generally how to use them. This isn't something for the faint of heart, and would be best if practiced on an empty system a couple of times before doing it live. It's neat to see the tools that people have come up with to solve the challenges in the business. The video also mentions caps should retain refrigerant, but my research shows that most people don't expect the caps to retain the refrigerant, even if they have an oring or face seal. A good Schraeder will though.

<https://youtu.be/jsVwlvDv-s?feature=shared>

On the three Mitsubishi Heat pumps, they want a specific triple evacuation process that is different

from industry standard. The main way it's different is you remove most of the air before putting any nitrogen in, vs the standard where you put nitrogen in with freshly installed tubing. The standard way has the potential to turn any humidity in there into ice, which is then a challenge to sublime away under vacuum. Pulling a vacuum to 4000 microns first, and then adding nitrogen makes sure you don't create ice to deal with later. The other unusual thing is they didn't suggest doing a pressure test. I still did a temperature compensated pressure decay test, after that first vacuum, just to make sure I didn't have any leaks. Their instructions were to do three vacuums, each deeper than the last, break the first 2 with nitrogen, release the refrigerant, and then do a leak test. Doing a vacuum test like they suggest is a good practice, but I prefer to pull down much further than 500 microns, and their upper limit was 1000 which we were far below in all three cases. We used the Testo Smart gauge, so we could watch it from inside the house, and generate a nice report if anyone wants to see it later in life.

## Charging station repair

I just got some parts today, and haven't had a chance to install them. I was out of town most of the last month, so I didn't get very far on the repair work.

### Vice President's Words

Tracey McFadden

Greetings EV Enthusiasts,

Earlier in the month I had the pleasure of shopping for a new EV with my good friend Jim Keen. We ended up at a KIA dealer and Jim leased a 2024 KIA EV9. With the help of our esteemed president Jeff Miller, Jim had his home charging station up and running in record time. Jim is now our newest member of FVEAA. I hope at some time in the near future Jim will give us a presentation on the EV9 and his thoughts on the EV9.

In October I represented our group at a PAC budget hearing in Kane County. I stressed the PACE should put more emphasis on purchasing electric buses for their fleet.

As many of you know I am a Rivian fan and have put down a deposit on the new Rivian R2 due out in 2026. Rivian recently announced a 5 year agreement with LG Energy Solutions to supply 4695 size cylindrical batteries. (Diameter of 46 millimeters and height of 95 millimeters) The batteries in their first year of production will be made in the LG facility in Arizona and shipped to the Rivian factory in Normal Illinois. According to LG these batteries have 6 times the capacity of the standard 2170 battery currently in use. However, the batteries also have 6.5 times the volume but will have higher energy density, better space utilization and increased safety.

I look forward to seeing you all at the FVEAA Christmas party on Dec. 13th. There will be food, fun, and music for all!

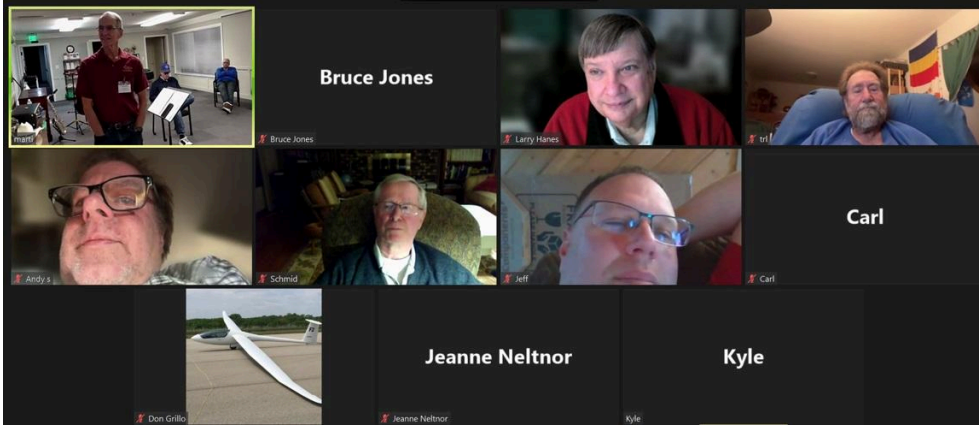
Stay charged!

### PHOTOS OF October, 18 2024 MEETING

Bruce Jones



Meeting attendees at the FVEAA meeting, Unitarian Universalist Society of Geneva



On-line attendees



Jeanne Neltnor, her beautiful 2023 Chevy Bolt, and the charging station that Jeff Miller installed in her garage→





**Don Grillo's new 2024 Cadillac Lyriq with great looking gloss black wrap around top area and roof**



## Don's Lyriq - saga Order Details

Placed Order for 2024 Luxury 1 RWD on  
8/29/2022

Cancelled Order on 4/17/2024

Lease/Purchase 2024 Sport 2 AWD Lyriq on  
8/22/2024

2 years of waiting and observing



### Incentives:

- \$1500 for QMerit Charger install or 2 years of EVgo charging
- \$7500 Tax Credit
- \$500 Local City Utility Credit
- \$500 Military Discount
- Loyalty Rewards (Credit Card)

## Upcoming Events

Rich Hirschberg

\*\*\*If you know of upcoming car shows, cruise nights, parades, or get-togethers, please shoot me an email - [GoAFVs@yahoo.com](mailto:GoAFVs@yahoo.com)

Take care,  
Rich Hirschberg  
(c/t) 847.347.7171  
Email: GoAFVs@yahoo.com

## FVEAA HOLIDAY PARTY - FRIDAY, DEC. 13, 2024

Put it on your calendar!

RSVP to [FVEAA.rsvp@yahoo.com](mailto:FVEAA.rsvp@yahoo.com)

Do **NOT** put your rsvp/regrets on the forums. It may be missed.

The FVEAA holiday party

Fri., Dec. 13th

The Great Escape, 9540 W Irving Park Rd, Schiller Park, IL 60176

847.671.7171

Co-payment for the event is **\$10 per person, collected at the door.**

Family style meals

Estimating about 25 ppl at this point, the restaurant will need the most accurate headcount prior to our party.

NOTE: They have 3 EV charging ports at the parking spaces at the base of the wind turbine

## FVEAA business cards available!

Ted Lowe

See one of the officers to get some cards to hand out to people at various EEvents and daily life to promote EVs and our organization!

### Fox Valley Electric Auto Association

PO Box 214  
Wheaton, IL 60187-0214

630-260-0424  
[contactfveaa@fveaa.org](mailto:contactfveaa@fveaa.org)

Free Yourself From The Pump<sup>fm</sup>



Join Us and Discover How!

Check [fveaa.org](http://fveaa.org) for details about our monthly meetings!



## Login to our FVEAA website for access to lots of member-only tools!

Ted Lowe

You can use the many membership-only tools on our website after you login! If you haven't logged in to our website already, please check your email for instructions and login to check it out! Please let me know if you have any questions. Thanks!



## FVEAA Web Report as of 2024-11-13 04:58:09

### Website Registered User Statistics

| Statistic                  | Value      |
|----------------------------|------------|
| Total Users                | 118        |
| Users Never Logged In      | 41         |
| % Active Users             | 65.3%      |
| Ave. Days Since Last Visit | 863.6 days |

FVEAA On Facebook - Join Us! Like Us!

Ted Lowe

The **FVEAA Facebook group** has 135 members as of 1/17/24! 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!

<https://www.facebook.com/groups/889497691136309/>

Here is the **FVEAA's Facebook Page**. Like Us!

<https://www.facebook.com/FoxValleyElectricAutoAssociation>

FVEAA On YouTube - Check out our videos!

Ted Lowe

The **Fox Valley Electric Auto Association** has a YouTube channel! Subscribe to us and check out

our videos! We've had this channel for many years but we're going to start using it more to attract new members and promote EVs. Please let me know if you have some FVEAA-related videos to post.

<https://www.youtube.com/@evsforever/videos>

## Membership Update

Ted Lowe

Keep an eye on the **active paid-up** members count! Many members have taken advantage of the multi-year renewals offered by the new website! **Please renew & recruit new folks!!!**



## FVEAA Membership Report

as of 2024-11-13 04:58:09

### Count of Members by Type

| Membership Type  | Count | Paid Up |
|------------------|-------|---------|
| Charter Business | 1     |         |
| Family           | 4     | 4       |
| Individual       | 62    | 60      |
| Lifetime         | 2     | 2       |
| Totals           | 69    | 66      |

### Other Statistics

| Statistic         | Value      |
|-------------------|------------|
| % Paid Up         | 95.7%      |
| Avg. Paid Up Days | 366.0 days |
| % With Email      | 97.1%      |

## Encouraging Our Membership To Grow and Some History

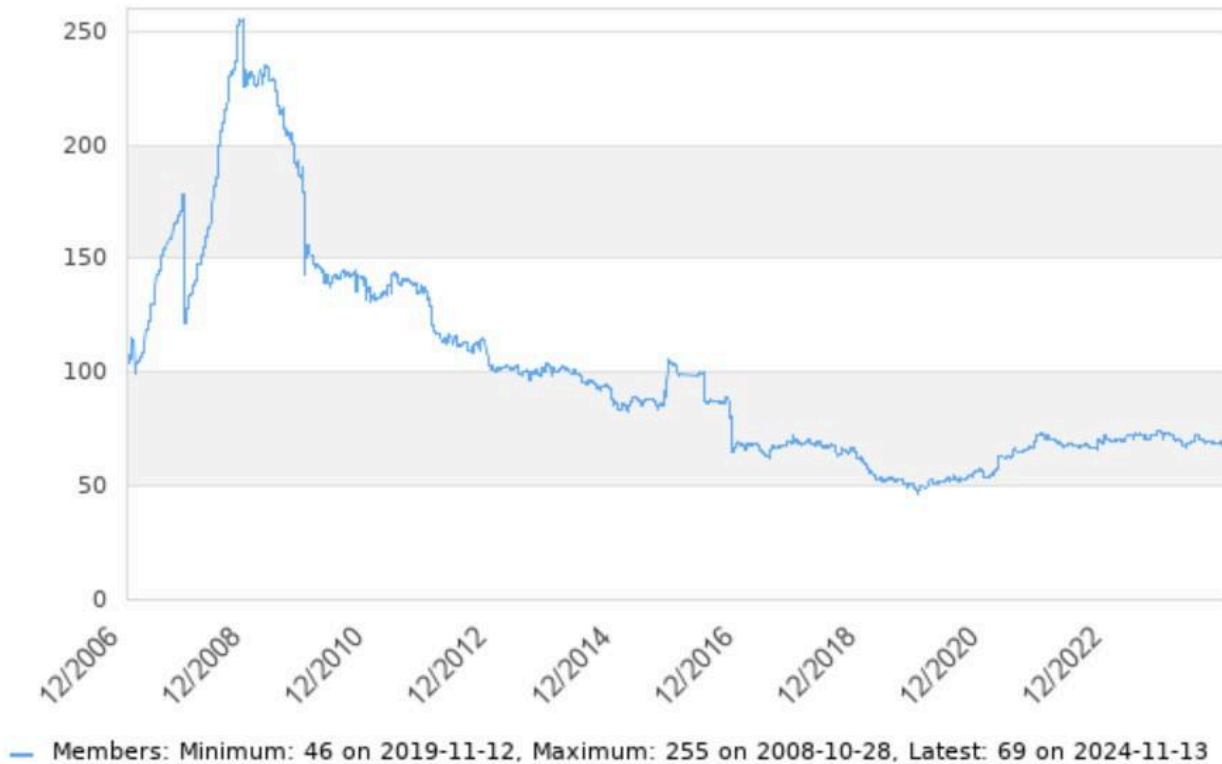
Ted Lowe

**We are growing!** 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 13, 2024 10:19am



### 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:

[FVEAA Committees](#) > [Finance](#) > [Treasurer Reports](#)

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!**

- The meeting began at 7:10 p.m.
- V.P. Tracey McFadden held introductions all around.
- First Time Visitors
  - Donna McCormick, is looking for an EV - a Hyundai Kona
  - Laura Baus and Kevin Zak (long time member) Welcome!
  - Sharon White and son Phil White attended, he works for International Harvester's electric transportation division. Welcome!
  - (Jacqueline - several visits, 4-EV owner and electric motorcycle owner. Welcome!)

#### HAPPY NEW BOLT OWNER

- Jeanne Neltner, who had worked for Toyota, wanted to buy an American electric vehicle.
- She recently heard our FVEAA VP Tracey McFadden give a presentation on electric vehicles and was sold on the idea.
- She approached Tracey, knowing what car she was looking for and asked for help. With his excellent guidance she bought a used 2023 Chevy Bolt at a great price.
- She loves the car, the Bose speakers, sunroof, lane assistance, backup assist and said in the future she will likely buy another.
- Jeanne already had a subpanel in her garage so Jeff Miller made her a good deal and installed a Level 2 charger as shown in the photo.
- Great teamwork guys. Now all she needs to do (she said) is to drive it more!

#### 50th ANNIVERSARY

- Secretary Bruce Jones presented a draft of possible events we can run next year to celebrate the FVEAA's 50th Anniversary.
- (Note an email with the updated list of volunteers and events was sent to the FVEAA Members email list)
- **SEE END OF THIS NEWSLETTER FOR THE CURRENT LIST**

#### BREAK

#### CADILLAC LYRIQ ELECTRIC VEHICLE

- Don Grillo, friend of the club described his new Cadillac Lyriq and his purchase ordeal with Cadillac that began over two years ago in 2022.
- He said, "You ought to drive a Cadillac at least once in your life" so this was the car he decided to get.
- After a lengthy delay and more delays upon delays, he finally canceled the order and after discussions with Tracey, he decided to lease one instead.
- He finally received the car a few months ago and had it specially wrapped – which looks sharp - see the photos – a very classy looking EV.
- Don then presented the specifications and information on the Lyriq Thanks Don!

The meeting ended around 9:05 p.m.

**FVEAA Membership Application Form - Version 2023-12-04**

Name: \_\_\_\_\_

Address: \_\_\_\_\_

City, State Zipcode: \_\_\_\_\_

Phone: \_\_\_\_\_ Phone Type: Home \_\_\_ Work \_\_\_ Cell \_\_\_

Email: \_\_\_\_\_

Please check one:    New Member \_\_\_\_\_ Renewal \_\_\_\_\_

How did you hear about the FVEAA ? \_\_\_\_\_

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

|                       |   |
|-----------------------|---|
| Individual            | \$20 (1 year), \$38 (2 years), \$56 (3 years) |
| Business              | \$100   |
| Premier Business      | \$250   |
| Charter Business      | \$500   |
| Youth (21 or younger) | \$10  |

**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 Charter Business Members

### Illinois Alliance for Clean Transportation (IACT)

Samantha Bingham  
2 N LaSalle St #950  
Chicago, IL 60602  
Email: [info@il-act.org](mailto:info@il-act.org)  
Web: <https://il-act.org>



Illinois Alliance for Clean Transportation (IACT) (formerly known as Chicago Area Clean Cities) is a 501(c)(3) not-for-profit working to promote the use of clean fuels for clean air throughout Illinois. Our alliance includes people from private business, academia, government, scientific research and energy and environmental services. Our main goal is to help with the adoption of cleaner transportation options.

| MONTH 2025 | 2025 FVEAA ANNIVERSARY MEETING / EVENT  | CHAIR            | EMAIL                        | PHONE            |
|------------|---|------------------|------------------------------|------------------|
|            |   |                  |                              |                  |
| JANUARY    | ??  |                  |                              |                  |
|            |   |                  |                              |                  |
| FEBRUARY   | Special Speaker North Central College   | Maureen Stillman | maureen.stillman@gmail.com   | 630-605-0629     |
|            |   | Chris Sharp      | greenenergytriad68@gmail.com | 630-780-3271 (h) |
| MARCH      | ??  |                  |                              |                  |
|            |   |                  |                              |                  |
| APRIL      | Joint event w IL Solar Energy Assoc. 50th   |                  |                              |                  |
|            | <a href="https://illinoissolar.org/#:~:text=Founded%20in%201975%2C%20incorporated%20in,the%20majority%20of%20its%20history.">https://illinoissolar.org/#:~:text=Founded%20in%201975%2C%20incorporated%20in,the%20majority%20of%20its%20history.</a> | Ted Lowe         | ted.lowe@fveaa.org           | 630-260-0424     |
|            |   | Howard Hansen    | hghnsn@yahoo.com             | 708-243-3054     |
| MAY        | Union IL Electric Train museum / ride   | Rob Schwartz     | rschwartz350@sbcglobal.net   | 847-833-7598     |
|            |   | Rich Hirschberg  | goafvs@yahoo.com             | 847-347-7171     |
|            |   | Chris Sharp      | greenenergytriad68@gmail.com | 630-780-3271 (h) |
|            |   | Jeff Miller      | millerjeffreys@gmail.com     | 630-540-8351     |
|            |   |                  |                              |                  |
| JUNE       | Friday June 20 Summer Solstice Event/ Cookout.  | Marty Belovicz   | martin@totalsystemintegrati  | 847-321-5734     |

|           |  |                 |                                   |              |
|-----------|--|-----------------|-----------------------------------|--------------|
|           |  |                 | on.com                            |              |
|           |  |                 |                                   |              |
|           | June 5 Cream of Wheaton (Thursday night EV display)        | Ted Lowe        | ted.lowe@fveaa.org                | 630-260-0424 |
|           |  | Bruce Jones     | bjone35@aim.com                   |              |
| JULY      | Fun Event for FVEAA  | Tracey McFadden | tracer500@gmail.com               | 630-697-5115 |
|           |  | Marty Belovicz  | martin@totalsystemintegration.com | 847-321-5734 |
|           |  |                 |                                   |              |
|           | Tailgate party Kane County stadium - throw first pitch     | ??              |                                   |              |
|           |  |                 |                                   |              |
| AUGUST    | Sport - Chicago EV mixed Celebration                       | Marty Belovicz  | martin@totalsystemintegration.com | 847-321-5734 |
|           | Ted Liu - coordinate a Tesla Meetup w Chicago and Michigan | Ted Liu         | tedliu@sector0.net                | 312-285-0845 |
|           |  | Tracey McFadden | tracer500@gmail.com               | 630-697-5115 |
|           |  |                 |                                   |              |
| SEPTEMBER | Parade -   | Laura Baus      | baushaus4@sbcglobal.net           | 224-279-5681 |
|           | Grundy County Corn Festival Parade or other location?      | Sharon White    | peezmom@gmail.com                 | 630-533-1181 |
|           |  | Phil White      | phil@photofill.com                | 630-269-7933 |
|           |  |                 |                                   |              |
|           | National Drive Electric Event - North                      | Rich Hirschberg | goafvs@yahoo.com                  | 847-347-7171 |
|           |  |                 |                                   |              |

|          |   |   |                                   |                  |
|----------|---|---|-----------------------------------|------------------|
| OCTOBER  | Fox Valley Mall 50th car show combination event with National Drive Electric Week-South   | Marty Belovicz  | martin@totalsystemintegration.com | 847-321-5734     |
|          | (note- 1983 car show at the Fox Valley Mall)  | Tracey McFadden                                       | tracer500@gmail.com               | 630-697-5115     |
|          |   |   |                                   |                  |
|          |   |   |                                   |                  |
| NOVEMBER | ??  |   |                                   |                  |
|          |   |   |                                   |                  |
|          |   |   |                                   |                  |
| DECEMBER | Special Dinner Celebration w speakers   | Chris Sharp   | greenenergytriad68@gmail.com      | 630-780-3271 (h) |
|          |   | Howard Hansen   | hghnsn@yahoo.com                  | 708-243-3054     |
|          |   | David Aarvold - (Chris Sharp to provide contact info) |                                   |                  |
|          |   |   |                                   |                  |
|          |   |   |                                   |                  |
| OTHER    |   |   |                                   |                  |
|          | 50th Anniversary Literature - promotions  | Chris Sharp   | greenenergytriad68@gmail.com      | 630-780-3271 (h) |
|          | Promotions  |   |                                   |                  |
|          | Batavia historical society event (Batavia Lions Club having 50th anniversary event this year 2024)<br><a href="http://batavialionsclub.org/">http://batavialionsclub.org/</a> |   |                                   |                  |
|          |   |   |                                   |                  |
|          | Library Displays  | Chris   | greenenergytr                     | 630-780-3        |

|  |         |             |                 |              |
|--|---------|-------------|-----------------|--------------|
|  |         | Sharp       | iad68@gmail.com | 271 (h)      |
|  | Banners | Bruce Jones | bjone35@aim.com | 630-864-9669 |
|  |         |             |                 |              |