

# NORTH BAY CHAPTER



**Electric Auto Association**  
Promoting Electric Vehicles Since 1967

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## THIS MONTH'S NBEAA MEETING

October 11<sup>th</sup> NBEAA Meeting at **Thunderstruck Motors, 2985 Dutton Ave, Suite 3 in Santa Rosa** from 10 AM until noon. Kelly Foley of Sonoma Clean Power will describe the rates that Sonoma Clean Power offers and explain the Net Metering system (NEM). SCP's billing system is different than PG&E's so we should learn a lot from Kelly's presentation. We will also have a short discussion about the Drive Electric Day event.

## FUTURE NBEAA MEETINGS

### FUTURE MEETINGS:

November 8<sup>th</sup>: Kelly Kimberly of Hansel BMW will do a Show & Tell about the BMW i3 EV. Kelly will be bringing an i3 and giving test drives!

December 13<sup>th</sup>: Open discussion on meeting topics and Chapter Activities for 2015.

## UPCOMING EV EVENTS:

### Transition Sebastopol to Host its 2<sup>nd</sup> EV Show & Tell:

October 19<sup>th</sup> at the Community Market in the Barlow in Sebastopol. In an effort to encourage more people to buy and drive EVs, Transition Sebastopol is hosting a Show & Tell for EVs. They need 8 more volunteers to participate in the Show & Tell. The Community Market is right on Hwy 12 as you enter Sebastopol so it should draw a lot of people. Please let me know if you would like to volunteer to show your EV at this event or contact Sonja Cary directly: [sonjacary@gmail.com](mailto:sonjacary@gmail.com)

## UPCOMING EV EVENTS (CONT.):

### Climate Protection Campaign to Host a Symposium about “The Business of Local Energy”:

October 23<sup>rd</sup> from 9 AM until 4:30 PM at the Sheraton Hotel in Petaluma. This symposium will bring together cleantech entrepreneurs, utility staff, regulators and other interested public officials to explore opportunities in the emerging Community Choice Energy market and develop a plan for the future of distributed generation and community energy programs in California. There is a \$75 fee to attend.

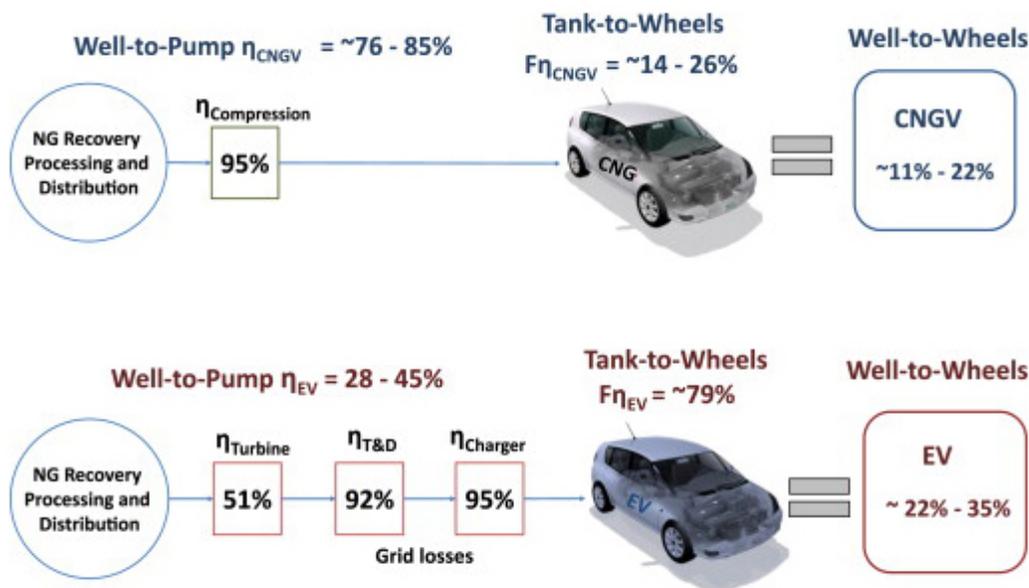
## EV NEWS

### New Study Shows the Rapid (Fast) Charging Does Not Damage Lithium-Ion Batteries as much as Thought:

The study, conducted by 12 researchers, examined the individual state of charge of lithium iron phosphate (LiFePO<sub>4</sub>) electrodes using X-ray microscopy. To quote the conclusion of the study: “Contrary to intuition, the current density, or current per active internal surface area, is nearly invariant with the global electrode cycling rate. Rather, the electrode accommodates higher current by increasing the active particle population.” In other words, the inherent properties of lithium iron phosphate batteries can handle the shorter charging times without degrading.

### Oak Ridge Lab Shows that It Is More Efficient to Use Natural Gas to Make Electricity than to Fuel Cars:

Oak Ridge National Laboratory performed an analysis of whether it was more efficient to use natural gas to fuel cars, directly, or to use it to make electricity and then use that electricity to fuel cars. The top diagram shows the overall well-to-wheel efficiency of directly fueling a car with natural gas to be anywhere from 11%-22%. The bottom diagram shows the well-to-wheel efficiency for using natural gas to make electricity and then using that electricity to fuel an EV to be anywhere from 22%-35%. Editorial comment: I would assume that it is also easier to clean the exhaust from a stationary natural gas power plant than it is to clean the exhaust from the number of cars that would use the same amount of natural gas for fuel.



## EV NEWS (CONT.):

### California Enacts a New Round of Pro-Plug-In Legislation:

In honor of [National Drive Electric Week](#), California Governor Jerry Brown signed into law half a dozen bills to further strengthen California's EV market. In 2012, Governor Brown set a target of 1.5 million zero-emission vehicles on the road in California by 2025. California accounts for 40% of US plug-in sales, and recently surpassed the 100,000-vehicle milestone.

The latest round of EV-boosting bills:

- AB 1721 grants free or reduced rates in high-occupancy toll (HOT) lanes to "clean air vehicles."
- AB 2013 increases to 70,000 the number of "partial zero-emission vehicles" that may be allowed in high-occupancy vehicle (HOV) lanes, regardless of occupancy level.
- AB 2090 repeals the level of service requirements on HOT lanes for the San Diego Association of Governments and the Santa Clara Valley Transportation Authority, and directs them to work with the California Department of Transportation to develop appropriate performance measures.
- AB 2565 requires commercial and residential property owners to approve installation of an EV charging station by renters, so long as the station meets requirements.
- SB 1275 creates the Charge Ahead California Initiative, which provides incentives to increase the availability of zero-emission vehicles in low-income communities.
- SB 1298 makes the pilot projects for the Los Angeles County Metropolitan Transportation Authority's operation of HOT lanes on State Highway Routes 10 and 110 permanent.

## UPDATE ON NEW CHARGING STATIONS IN THE NORTH BAY

### Blink Introduces Kilowatt-Hour Pricing and Network Enhancements:

September 2, 2014, CarCharging, who owns Blink, introduced various pricing policy changes, including kilowatt-hour ("kWh") pricing, reduced time-based charging increments, program participation confirmation, and remote start functionality. Fees for Level 2 EV charging stations owned by Blink and operated on the Blink Network in kWh eligible states, of which California is one, will range from \$0.39 to \$0.79 per kWh, depending on the state and individual's membership status. Fees for DCFC chargers owned by Blink and operated on the Blink Network will range from \$0.49 to \$0.69 per kWh, depending on the state and individual's membership status.

New Charging Stations. The list, below, shows the new charging stations in Sonoma and Marin Counties. Sorry if I missed one or repeated one.

- (1) DCFC and (1) Level II Whole Foods at Coddington Mall in Santa Rosa (CHAdEMO & SAE Combo, J1772, evGo)
- (1) DCFC and (1) Level II at Whole Foods, 790 De Long Ave, Novato (CHAdEMO & SAE Combo, J1772, evGo)
- (1) DCFC and (1) Level II at The Village at Corte Madera, 1616 Redwood Hwy, Corte Madera (CHAdEMO & SAE Combo, J1772, evGo)
- (1) Level II De Loach Winery, 1791 Olivet Rd, Santa Rosa (J1772, free)
- (1) Level II at Sears Automotive Center, 9000 Northgate Dr, San Rafael (J1772, Chargepoint)
- (1) Level II at Hauke Park, 1 Hamilton Dr, Mill Valley (J1772, Chargepoint)
- (1) Level II at Belvedere City Hall, 450 San Rafael Ave, Tiburon (J1772, Chargepoint)
- (1) Level II 240V/40A at Chef Steve's, 21278 Calistoga St, Middletown (J1772, no network, free)