Roper Chevrolet Bolt EV (CBEV) First Trip
11 April 2017

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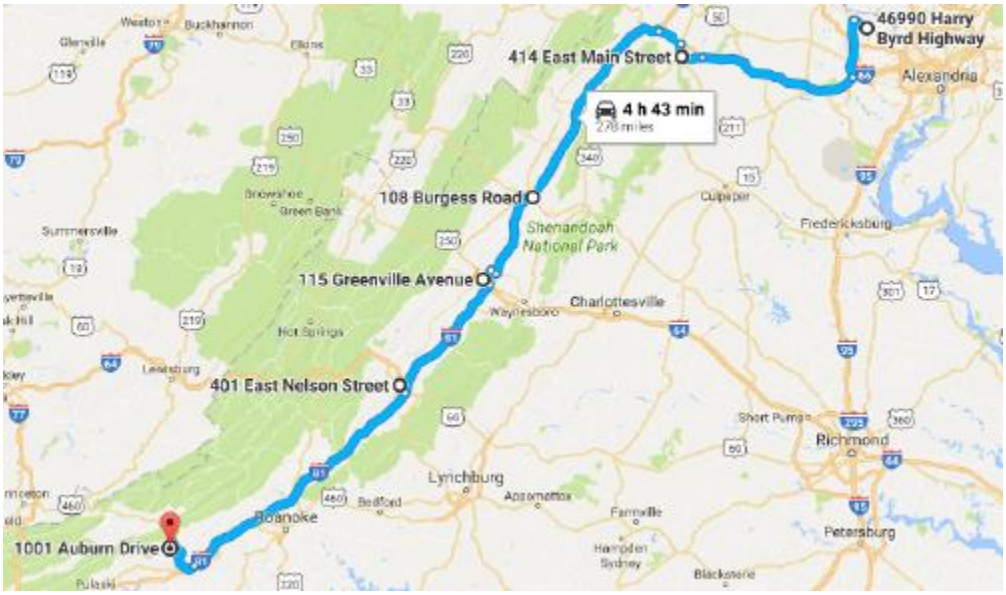
I purchased a 2017 Chevrolet Bolt EV Premium with Driver Confidence Package and fast-charging capability from Ted Britt Chevrolet (TBC; sales consultant Anthony Saunders) in Sterling VA north of Dulles Airport. I left the dealer at about 2 PM and arrived in Blacksburg VA at about 9 PM. The distance, including short side trips to charge the battery 3 times for 30 minutes, is 278 miles. I actually traveled 283 miles because I meandered in Front Royal with inadequate navigation before I found the fast-charging station.



The battery presumably held ~60-kWh when I left TBC.

We could not get Android Auto to work at the dealer. (After I got home I discovered the reason Android Auto did not work was that the short cable I used to connect it to the CBEV as not adequate.)

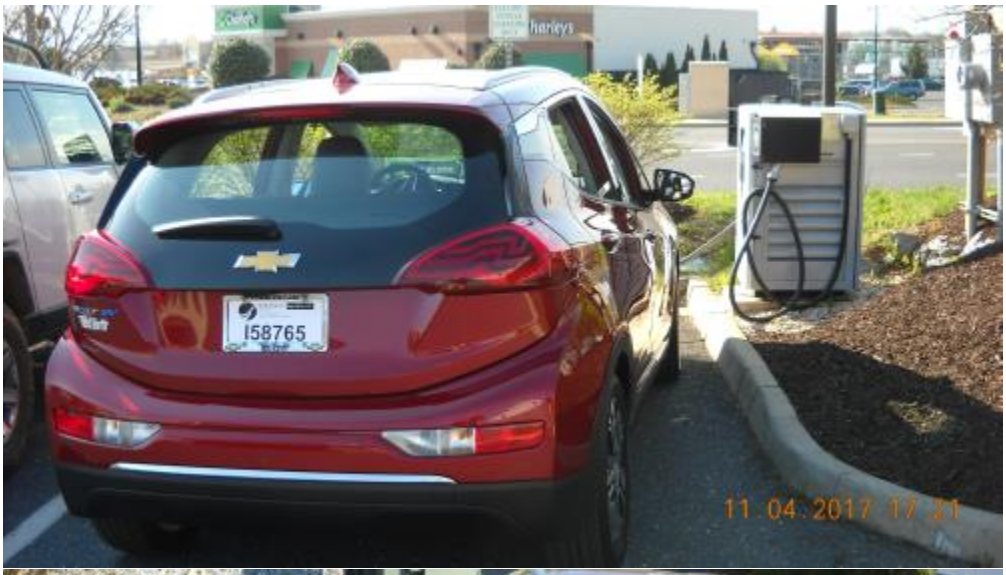
Also, I could not get Google/maps to work properly on my Samsun Galaxy S7, so I had trouble finding the first charging station in Front Royal VA. For the remaining 3 charging stops I used OnStar to download driving directions. I really liked that as no map was involved and good voice directions and turning diagrams were shown on the large center screen.

All of the charging stations I used were installed by Virginia Clean Cities through a grant. They all had two cables for CHAdeMO charging for Asian cars and CCS charging for US/European cars.

The first charging stop was at 414 East Main Street in Front Royal VA

The distance from TBC is 63.1 miles, not counting extra distance trying to find the station without good navigation directions. Two parking spaces are well marked. The station accepted my Greenlots card after a few tries. It started at ~18-kW and provided 11.7 kWh in about 30 minutes.

The second charging stop was at 108 Burgess Road in Harrisonburg VA



The distance from the previous charging stop is 64.4 miles to find the station with good navigation directions by OnStar. One parking space is not marked with either a sign or pavement marking. I could not get my Greenlots card or app to work, so I called the telephone number on the station and the automatic answer got the station running for me. It started at ~39-kW and provided 15.4 kWh in about 30 minutes. See the bottom for why the card did not work. See the bottom for why the card did not work.

The third charging stop was at 115 Greenville Avenue in Staunton VA

The distance from the previous charging stop is 27.3 mile to find this station with good navigation directions by OnStar. One parking space is marked with a sign, but no pavement marking. I could not get my Greenlots card or app to work, so I called the telephone number on the station and the automatic answer got the station running for me. It started at ~41-kW and provided 11.8 kWh in about 30 minutes. See the bottom for why the card did not work.

The fourth charging stop was to be at 401 East Nelson Street in Lexington VA

The fourth planned charging stop was at 401 East Nelson Street in Lexington VA at the Hampton Inn, 39.5 miles from the Staunton VA station. The Greenlots card did not work and the Greenlots app would not accept the station number. I call the telephone number on the station and the automated answer would not accept the station number. The Plugshare.com description tells why: “Note: This is now a private DCFC for hotel guests only. If you are staying at the hotel, ask the desk clerk for the RFID card and they will give it to you. No charge to use it.” I do not understand why Hampton Inn is allowed to restrict the stations use in this way because it was installed through Clean Cities through a grant. I did not try to get permission to charge there since the CBEV had enough charge get home in Blacksburg VA. See the next section for why the card did not work.

It is 85.8 miles from this charging station to our home in Blacksburg VA.

Conclusion

The trip used 75.3-kWh for 283 miles, or 3.76 miles/kWh. Except in the four charging locations I was driving between 63 and 67 mph.

The trip presumably started with ~60-kWh and added (11.7 + 15.4 + 11.8) 38.9-kWh, for a total of 98.9-kWh. Since 75.3-kWh was used for the trip, the battery must have had ~23.6-kWh when I arrived at home in Blacksburg VA, or ~39% of full charge. I really miss seeing the % of battery charge (SOC) in a display, such as my 2015 Nissan LEAF had.

I could have charged for 30-minutes at 2 of the 3 charging stations to make it home, but I did not want to chance one of the 2 not be working.

I dialed into Greenlots.com and got this:

Start Time	End Time	Station Id	Location	Electricity Used (kWh)	Duration (H:M:S)	Sale Amt($)
April 11,2017 18:29	April 11,2017 18:59	63029	Staunton	12.40	0 : 30 : 3	6.01
April 11,2017 17:13	April 11,2017 17:44	63140	Harrisonburg Fast Charger	16.20	0 : 30 : 47	6.16
April 11,2017 15:14	April 11,2017 15:45	63142	Front Royal Visitor Center	12.50	0 : 31 : 0	3.10

Notice, of course, that the electricity used is more than what the car got (11.7, 15.4 & 11.8) due to less than 100% efficiency. The efficiency was between 94.4% and 95.1%.

So, it cost me $15.27 for electricity, but I had ~22-kWh left in the battery when I got home.

I really like my CBEV; it did a great job getting me home!

Correction

The next day I realized that I was using the green GE charging card instead of the green Greenlots charging card.

And I was told that, even though the Greenlots app does not work for the charging station in Lexington VA, the Greenlots card does work there.

Future Similar Trip

If I were making a trip from our place in Blacksburg VA to Dulles Airport or reverse (275 miles from home), I would plan to charge at Staunton VA going and Harrisonburg VA returning. It is 125.3 miles from our place to Staunton and 122.2 miles from Dulles Airport to Harrisonburg. If something were wrong with those two charging stations, I would charge at Harrisonburg VA going (142 miles from home) and at Staunton VA returning (143 miles from Dulles Airport).