

**BURLINGTON**  
**BOARD OF ELECTRIC COMMISSIONERS**  
585 Pine Street  
Burlington, Vermont 05401

SCOTT MOODY, CHAIR  
BETHANY WHITAKER, VICE CHAIR  
LARA BONN  
JIM CHAGNON  
ROBERT HERENDEEN

*To be held at Burlington Electric Department (and)  
Via Microsoft Teams*

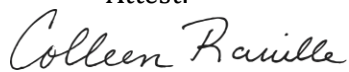
[+1 802-489-6254](tel:+18024896254)

Conference ID: 295 615 914#

**AGENDA**  
**Regular Meeting of the Board of Electric Commissioners**  
**Wednesday, July 12, 2023– 5:30 p.m.**

- |   |                |
|---|----------------|
| 1. Election of Officers   | 5:30 (5 min.)  |
| 2. Agenda   | 5:35 (5 min.)  |
| 3. Minutes of the June 14, 2023 Meeting                               | 5:40 (5 min.)  |
| 4. Public Forum   | 5:45 (5 min.)  |
| 5. Commissioners' Corner (Discussion)                                 | 5:50 (5 min.)  |
| 6. GM Update (Oral Update)  | 5:55 (10 min.) |
| 7. 2023 – 2024 Strategic Direction (Discussion and Vote): D. Springer | 6:05 (10 min.) |
| 8. Financials: May FY23   | 6:15 (10 min.) |
| 9. IRP Update (Discussion): J. Gibbons                                | 6:25 (10 min.) |
| 10. Commissioners' Check-In   | 6:35 (5 min.)  |

Attest:



\_\_\_\_\_  
Temporary Board Clerk

If anyone from the public wishes to speak during the public forum portion of the Commission Meeting and/or wishes to be present for the Meeting of the Board of Electric Commission via Microsoft Teams, please email [llemieux@burlingtonelectric.com](mailto:llemieux@burlingtonelectric.com) to receive a link to the meeting, or call (802) 489-6254, Conference ID: 361 667 284#

**Note:** Members of the public may speak during the Public Forum, or when recognized by the Chair during consideration of a specific agenda item.

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(for 07/12/23 meeting)

**\*\*\* FYI \*\*\***

- Minutes of the June 14, 2023 Meeting
- June Monthly Report
- Dashboard
- FY23 May Financials

**Note:** Members of the public may speak during the Public Forum, or when recognized by the Chair during consideration of a specific agenda item.

**\*\*\*DRAFT\*\*\***  
**MINUTES OF REGULAR MEETING**  
**BURLINGTON ELECTRIC COMMISSION**

**Wednesday, June 14, 2023**

The regular meeting of the Burlington Electric Commission was convened at 5:30 pm on Wednesday, June 14, 2023, at Burlington Electric Department at 585 Pine Street, Burlington, Vermont and virtually through Microsoft Teams.

Channel 17 was present to record this meeting.

Commissioners Lara Bonn, Jim Chagnon, Robert Herendeen, Bethany Whitaker, and Scott Moody were present.

Staff members present at 585 Pine Street included Paul Alexander, Rodney Dollar, Munir Kasti, Paul Pikna, Darren Springer, Paul Nadeau, Emily Stebbins-Wheelock, and Colleen Rouille (Temporary Board Clerk).

Staff members present via Microsoft Teams included James Gibbons and Amber Widmayer.

**1. Agenda**

There were no items added to the agenda.

**2. May 10, 2023, Meeting Minutes and May 16, 2023, Special Commission Meeting Minutes**

Commissioner Herendeen made a change to the minutes in written form given to the temporary board clerk, Colleen Rouille. Commissioner Chagnon then made a motion to approve the minutes of the May 10, 2023, Commission Meeting; the motion was seconded by Commissioner Bonn and approved by all Commissioners present.

Commissioner Herendeen made a motion to approve the minutes of the May 16, 2023, special Commission Meeting; the motion was seconded by Commissioner Chagnon and approved by all Commissioners present.

### 3. Public Forum

Ms. Anne Coss, Mr. Ted Agnew, and Ms. Wendy Agnew were present for the meeting at 585 Pine Street.

Ms. Anne Coss, resident of 120 Lyman Avenue for 43 years in Burlington stated that with the recent changes in lighting on Lyman Avenue that are being implemented by Burlington Electric, she has some concerns. She said there are three main issues. The first issue she brought up is the aesthetics of the new poles that were put on her street that she believes are out of character for a family neighborhood. The height and size of the poles produce a light in her home that was not there before the change. She called Commissioner Herendeen who helped with putting shields up. This helped but the light issue is still a concern to her. The second issue is the illumination of the light poles. L.E.D. lights are efficient and have good qualities, but the color and projection of them is unacceptable, in her opinion, on her street. The third issue is the number of poles has also changed. There were corner intersection lights and one utility light pole on the center of the street that worked well. Two new poles have been added on the street. Between Wells and Richardson Street there is now continuous lighting between those two streets. Ms. Anne Coss said that gives the resident's daylight lighting twenty-four hours a day. She has no refuge from the influx of light coming into her house. Ms. Coss believes this is a perfect example of light pollution. She does not feel any safer and does not believe the level of light is necessary. She compared her street to others in the city that look different and have different utility poles. She mentioned the current calendars that Burlington Electric Department puts out with the drawings the kids submit and said they promote turning off the lights instead of putting on more. She wants to know what solutions can, if any, happen to rectify her concerns and how Burlington Electric produced the engineering plan on her street, Lyman Avenue.

Ted Agnew from 146 Lyman Avenue spoke next. He stated that he lives on the corner of Lyman and Wells. There are three lights on that corner, one that shines into his bedroom from Wells Avenue. He said, too have three lights on one corner is overkill. Two of these have been put in over the past few years.

Ms. Wendy Agnew, who lives in the same house, then spoke and said that she appreciated that Commissioner Scott Moody came out to see the lighting the previous night. He saw the light issues that the neighborhood is dealing with. She was under the impression that they would get smaller, more palatable streetlights. When the industrial looking poles were installed, she was disappointed that they were not a better fit to her neighborhood. She also said that the lights were very bright, and it is worse because they have a corner lot. She walked with Commissioner Scott Moody and showed him the problems that she is having with the lighting. She does not like the look of the industrial light poles. Other nearby neighborhood light poles were referenced, and these lights look better aesthetically. All three did not understand why the industrial lights were installed in their neighborhood and not others. Ms. Wendy Agnew then read an email from John Davis, a neighbor that said he has a friend that has a light meter and asked if there is a design standard for lighting foot-candle level that can be measured against? Ms. Wendy Agnew asked if the lighting that is not uniform on her corner has been measured?

Commissioner Scott Moody then asked Munir Kasti, Manager of Engineering and Utility Services, and Paul Nadeau, Director of Engineering, to address the concerns and questions that have been brought up in the conversation. Munir Kasti started by saying he would go over the history of street lighting in the City of Burlington. He stated that that in 2014, the Burlington Electric Commission formed a committee to produce a street lighting standard policy. This committee included two residents, Commissioner Bob Herendeen, and Burlington Electric Department. The committee looked at the street lighting in the city and the recommendation was to follow the IES, (Illuminating Engineering

Society) recommended lighting levels to protect Burlington Electric Department and residents from liability. The committee looked at the type of fixtures to be installed, the elevation of the light when installed, the standard light, height of the pole, twenty-two feet, twenty-five feet and thirty feet above ground. The consensus from the committee was that if you go lower in height, there will be more poles. They did not like that idea and it would cost more. They decided to stay within twenty-nine to thirty feet, for the arial system. For the underground system, because people do not want to see the wires coming from the wood poles, it was decided to go with a fiberglass pole so that everything is hidden inside. The standard color for these poles is grey and the fixture is also grey. That is the history of how the standard policy for streetlights came to be on a residential street. There are different types of light fixtures in different neighborhoods, and the policy states that these will be maintained until the stock runs out at which point, they will be replaced by standard fixtures and poles selected by Burlington Electric Department unless a new district has been named. On the streets where you see the other fixtures, there were replacements in our stockroom so the consensus was that they would be replaced by the same pole for consistency on that street. There were wood poles on Lyman Avenue, so they were replaced with the standard fiberglass pole and fixture. When the policy calls for doing an engineering design, it must meet the requirement of the IES which looks at the average light on the street and the sidewalk. In the IES requirement there are different light levels for residential versus downtown or other city areas. In the latest IES requirement, the lighting level in the residential area for lights and the sidewalks was dropped to the minimum level. This is the level Burlington Electric is trying to meet. For the sidewalk, the IES score is .2 foot-candle level, and, on the road, it is .3 foot-candle level. Munir Kasti said that the design that was done on Lyman Avenue was at .2 foot-candle level. The Engineers look at the end of the life in twenty years so that the fixture will still meet the standard light level at that time. The light may be higher now so that the level is maintained at standard in twenty years. Also, on the intersections, the light requirement is higher because you Burlington Electric must account for the two roads. This is why there are multiple fixtures on an intersection which is accounted for in the design. Paul Nadeau said that the new lighting on Lyman Avenue allows Burlington Electric to go with a smaller wattage bulb at the southeast corner of Wells Avenue. The output of that fixture will be dropped by half. Munir Kasti said the light requirement in this intersection barely meets standards so the poles can not be moved, even by one foot. Anytime Burlington Electric reconstructs a street in the city, they are required to look at the street lighting and bring it up to the IES requirements. Most City of Burlington streets would require an update.

Paul Nadeau said that the reason that the Engineers went with the fiberglass poles was because the circuit was all put underground, and this caused the wood poles to be removed and replace with the standard. Commissioner Scott Moody said that this subject has come up a lot, but this is a little different because it was a bigger change and more dramatic to the neighborhood than most. Commissioner Bethany Whitaker asked the if there is a process with the public before the new lights are put in. She feels like we are always behind this issue and would like to see a process where there is community engagement and notification beforehand. Paul Nadeau said a letter stating what will be happening on the street, that it will be lit to IES standards, and that there would be new poles was sent to all residents affected, which is the standard practice. On the letter, there is also contact information of the engineer that is designing the project. There were a few residents from Lyman Avenue who did call and ask for adjustments. The engineer tried to accommodate for as many of those as possible to adjust the plans, so residents were as happy as possible, while still not compromising the standard. Commissioner Whitaker asked if an in-person community forum would be better so everyone is on the same page. Paul Nadeau said there are only a few of these type of projects per fiscal year so that would be a reasonable thing to do. They would show the plan, where things are going to go, the illumination standards and the actual poles and fixtures being installed. This would give everyone a chance to ask questions and have a conversation ahead of the project.

Paul Alexander, Center for Safety, stated that this subject has come up several times. In 1996, the City Attorney gave a very definitive answer that Burlington Electric is mandated to meet IES standards in the recent policy that has been mentioned. For every customer who calls, some say the lights are too bright, some say they are too dark, and the police have reached out several times. There was a significant claim that influenced the legal and insurance premium that Burlington Electric pays because of street lighting issue. The prior insurance broker and the current broker has made it clear not to go below IES standards. The City legal team gave another opinion in 2022 stating the same opinion on IES standards. From risk management to insurance and legal liability, we can not go below standard.

Darren Springer, General Manager of the Burlington Electric Department stated that he is sorry that the public members present are feeling the way they are, and he appreciates that they came to the meeting to voice their concerns. He wanted to note that the changes that happened on Ferguson and Scarf Streets had to do with the IDS standards changing while they were in the middle of that project. They went back with the updated standard to look at it a second time and make accommodations there.

Light shields were brought up. Paul Nadeau said that this would not fix the issue since it would lower the light standard. Commissioner Herendeen stated that there some ideas that are being discussed such as a warmer light and dimming lights later at night that would require new technology. He suggested that Ted Agnew do a project on this subject. He told him to get in contact with him for information.

In conclusion, it was decided that meetings with the Engineers would take place prior to any projects that would happen in the future. Munir has said that they would go to Lyman and Wells Avenue to see if shields can be installed assuming the light standards are still met. Also, lighting levels will be confirmed on these streets to make sure there is uniformity.

#### **4. Commissioners' Corner**

There were no Commissioner updates at this time.

#### **5. GM Update**

Mr. Springer stated that the 23-24 Strategic Direction is due, and BED is working on tweaks for consideration by the Commission in July for the 23-24 Strategic Direction and welcomes discussion with Commissioners who have ideas for updates that are needed (primarily for the Objectives).

The Governor has signed S. 137, which provides BED with another three years to continue using a portion of our efficiency dollars to support strategic electrification efforts including multi-family EV charging, geothermal test wells, and heat pumps. In addition, a pilot authority was granted for BED to test out new incentives to help "superusers" who are customers with a disproportionately large gasoline burden who would benefit greatly from switching to an EV. Vermont Public Radio is covering this, and there has been some national coverage as well, as BED may be the first utility in the nation to design such a program. Commissioner Bethany Whitaker asked about how the super users are identified. The transportation bill has a component that includes moving Vermont towards a vehicle miles traveled fee. Darren Springer said that the incentive could be as simple as saying to the customer to send us an odometer reading or to self-certify a certain miles per year or more.

The Governor also signed a bill creating an RES workgroup, that BED will be a part of. Carbon Fee Ordinance – BED is working with Councilors on Ordinance and TEUC to provide information relative to the carbon fee ordinance. We hope something can be introduced soon, and that Committees can review in July.

On the subject of EV charging, BED has several initiatives in the charging space currently, including grant applications, two new fast chargers that are installed and waiting to be energized at Pine St and Marketplace Garage, and the new chargers at the ONE Community Center which we will highlight at a press event on 6/13 that will focus on our 2022 Net Zero data. BED also has a cross-disciplinary and cross-division EV charging team working on mapping out expansion of charging for the city, and working with partners such as Parks & Rec, and DPW, in the effort.

FY 24 Rate Change was approved by Board of Finance 5/30 and City Council 6/5. It will be filed in mid-June, and effective as surcharge on bills rendered in September.

The TEUC forum on McNeil District Heat was held on 6/13. Commissioner Herendeen and Scott Moody were present. The materials are on the Burlington Electric Department website under the McNeil sub bullet. Darren has put his PowerPoint as well as the carbon and forestry analysis from Innovative Natural Resource Solutions and the draft GREET score, which is the carbon intensity model that is being utilized as part of the affordable heat act that passed by the legislature and was developed by Argonne National Labs. That analysis was conducted by First Environment and was commissioned by VGS and not by BED. Darren shared that the carbon score for District Energy came out for McNeil at 3.6 Grams of CO2 equivalent per mega jewel of energy. Natural gas is a 79. That means we are reducing emissions potentially over 95% in the GREET Score for district heat. That is consistent with the independent third-party analysis done by VEIC that also showed a reduction for District Heat using an older version of the system. The other analysis is from Innovative Natural Resource Solutions and that looked at a question that was part of the TEUC questions for Burlington Electric. Have you been able to characterize, on an annualized basis over a period of time, what the forest change is in the areas harvested compared to the stack emissions. Darren Springer tried to make the point that with biomass accounting, you do not want to double count the emissions from wood by counting them once when the tree is cut and once when the tree is burnt. You can only count them once to be accurate. You count these in the forest and land use change when the tree is harvested. The net flux in that change is where the emissions are captured, not at the stack. This report covers our stack emissions that shows them on a chart from 2007 to 2020. It also shows the land use change in the forest timberlands where we harvest and shows that between 2007 and 2022 we added over 24M ton of CO2 equivalent. The report makes clear that McNeil's forest management plans, and sustainable approach is contributing to that. If we had lost that equivalent that would be a concern. The net additions are significantly larger on an annualized basis than the stack emissions from McNeil which points to the sustainability of the operations of plant where we can add net forced carbon. The professors that were presenting from Massachusetts had the point that we could be adding even more forest carbon if we weren't harvesting. There was a lot of discussion around that. McNeil's point back, and the forestry community that was present, said that those lands might not be economically viable without the value from the tops and the limbs that McNeil provides. Eighty-eight percent of our fuel is coming from wood chips that are the tops and limbs that are left over from

higher value wood. McNeil is providing an economic value for this wood that's helps keep the land as working land. There are different points of view in the community. The key thing for us is that we already have a biomass plant built back in the 1980's, that remains a critical resource for us. From a regional reliability and a Vermont reliability standpoint and dispatchability during times of the year when energy prices are high, where renewable energy generation is low, and where natural gas is constrained. There is no question that McNeil will continue to play an important role for the near and medium term in terms of our energy portfolio. The question is do we want to make the improvements to McNeil with District Heat that would allow it to become a more efficient combined heat and power plant as it was originally envisioned and help us to displace approximately sixteen percent of the natural gas use in the commercial sector in Burlington consistent with our NetZero energy roadmap. That is a question we hope to be able to bring to the City Council if we are successful completing the feasibility work with District Energy and getting term agreements with the key partners sometime in the next few months.

Commissioner Scott Moody said that the dialogue seemed to be less about McNeil and more about the carbon issue. On the other side, there was a graph that was not illustrated well. The presenter had a good point that we can stop something today but there is a big lag in the time to catch up too itself. He also stated that was their dismissal of Darren's point of the fact that trees are the above ground carbon cycle and discounting all the fossil fuels that are an additive to the amount of carbon in the atmosphere.

Darren Springer said that his understanding from all the scientific organizations that have called attention to this problem is that human activity primarily is what is driving the carbon challenge in the atmosphere. The scope of the challenge in fossil fuels relative the potential scope of the challenge from the above ground carbon are different and we should recognize that. We should focus on what we can do to impact the use of fossil fuels and if we take our eye off the ball, we have lost something. Beyond that, the real question is the ISO grid marginal fuel when we operate McNeil is natural gas and when its not gas it is coal and oil. If the marginal fuel that would replace McNeil was wind, for example, 100 percent of the time it would be a different dialogue. We would ask do you want to run wind or McNeil. That is not the conversation we can have for a while. The region needs a lot more wind or hydro to reduce its reliance on natural gas. When we get to that point where we have done that, and we want to debate what is better, that is a different conversation. Vermont produces ninety percent of the wood that we utilize as a state and Massachusetts has stopped harvesting and has not counted wood as part of its renewable energy standard anymore. They are only producing about two percent of the wood being used in the state. That means that their wood demand for things like furniture and anything else is from out of state or out of country. They are taking a very different approach with wood than Vermont who uses its local renewable resource.

It was good to have a community discussion on this subject.



## 6. FY23 April Financials

Ms. Stebbins-Wheelock presented the April FY2023 financial results.

The Department's net income for the month of April was \$868K compared to a budgeted net loss of 1.376M, which is \$2.244M better than budget. This is due to the timing of REC revenues which we got in April instead of May.

Sales to customers were \$63K lower than budget for April and \$642K or .98% lower than budget for the fiscal year to-date. Commercial sales are \$580K less than budget for the year to date and residential sales are \$580K less than budget. Other revenues, primarily EEU, were \$167K better than budget for the month and \$1.5M for the fiscal year-to-date.

Net power supply expenses were favorable to budget by \$146K in April, due largely low prices for sale of excess power. Fuel had a 163K positive variance because McNeil did not run the month of April. Transmission fees were slightly favorable, and those variances were offset by the 128K Mystic, MA power plant charge and some savings on the purchase power side with some lower wind production. Non-power supply operating expenses were \$739K higher than budget for April and \$188K higher for the fiscal year to date, some due to labor and overhead charges due to vacancies. There was also a large variance in outside services due to some GT work being moved to capital expense causing a positive variance.

Other income was \$133K higher than budget due to customer contributions that came in in April.

For FY23 to date, the Department has an actual net income of \$231K compared to a budgeted net income of \$1.9M which is \$1.7M less than budgeted. In terms of net income, a 4M loss of revenue from sales of excess winter energy was amortized and a request will be included in the rate case being filed. That will help with the income side and the adjusted debt service coverage ratio.

As of April 30, the Department's capital spending was \$6.5M versus the \$7.9M budgeted, or 72% of the total FY23 capital budget. Emily expects that most of the capital budget will be spent in this fiscal year.

Operating cash as of April 30 was \$5.73M compared to a budget of \$9.8M, off by \$4.2M dollars budgeted to be at this time or 85 days cash on hand. We have been \$4M short of cash since December.

For the 12 months ended April 2023, the Department's adjusted debt service coverage ratio is .92, and the regular debt service coverage is 2.96.

Burlington Electric Department has reached out to the Moody's analyst to give them an update on how our year has gone including what the winter prices were and the impact that has had on us, our cash position, our plan to seek regulatory approval to amortize that expense through the rate filing as well as letting them know that we expect to end the year with less than 90 days cash, which is not typical for us. As of the last forecast that was done, we are expected to end the year at 65 days cash on hand for the year. The Department management will continue to monitor the cash position closely over the remainder of the fiscal year.

Darren Springer said that the trajectory should improve in FY24 budget since the Department did not assume some of the assumptions made in the FY23 budget, which were more conservative with the benefit of the additional rate change.

## **7. Net Zero Update**

Mr. Springer stated the Burlington Electric Department has been the top city per capita in solar in the Northeast and now in the East. This comes from the Environment America Shining Cities report in terms of solar per capita. In addition, we continue to be above the required amount for tier 3 electrification incentives through the State. We had a big jump in 2020 when we had the two electric buses and the HULA geothermal and even without those, we have been able to exceed it both in 2021 and 2022. We are hopeful there will be some additional electric buses coming soon. We also have our electric bucket truck arriving soon and some other geothermal opportunities including at the high school. There is some opportunity to continue to drive this number up as we also grow our EV and heat pump adoption and other incentives. When Burlington Electric launched the green stimulus program during the pandemic in June of 2020, we compared the residential tier 3 heat pump incentives and installations, and we are now over 22X higher compared to where we were then. There has been a sizable growth in the residential heat pump sector, which is favorable for our goal. We are still not at the trajectory that we need, but we are getting better.

The NetZero roadmap focuses on the electric thermal ground transportation sectors being 100 percent renewable by 2030. It's not just a Burlington Electric Department initiative but the whole City Department playing a role. Department of Public Works, with its work on its fleet for the city, walking and biking, planning, permitting and inspections with a variety of our building ordinances all contribute. VCA is a great partner and is doing work to try to make the building just down the street a great example of a NetZero approach for building the library with education. There are so many partnerships throughout the city and a variety of departments that are moving towards electric vehicles in their fleet.

The data itself comes from Synapse Energy Economics and they draw from Burlington Electric, Vermont Gas Systems, the Department of Motor Vehicles in Vermont and the Vermont and Chittenden County travel data, some of which is provided through Chittenden County Regional Planning Commission.

The good news is, in the ground transportation sector, for a third year in a row, we continue to be ahead of the pace of the NetZero 2030 roadmap. We had a big drop off in emissions in 2020 due to the pandemic, but we have been able to hold that decline steady. The reasons are we are continuing to see reduced vehicle miles traveled, we are seeing more EV adoptions and less vehicles registered overall in the City of Burlington. Car Share and having free transit plays a role in this. We are seeing that the less vehicles, more electric vehicles, and less miles traveled equals the result we are seeing. There is a one-year lag in the data.

On a less positive note, we are seeing some rebound in building sector natural gas use. This is not weather normalized so some of this can be weather variants. Residential and commercial sectors are still down from the 2018 baseline that we began with for the roadmap. Residential came down and has flatlined. Commercial came down in more of a pronounced rebound. In addition to the potential weather variants, it is possible we have units coming online that were permitted before we had the renewable heating ordinance. It is also possible that buildings are using their ventilation systems differently post pandemic. Overall, combining the thermal and ground transportation sector in 2019 to 2022, we had a big drop off in emissions and we have held on to it. We are up 3.2 percent between 2020 and 2022. The US is more than double that in terms of rebound. We are doing a better job overall than the nation in terms of holding on to some of those gains that we saw in the pandemic in terms of a reductions in emissions. We are 11.2 percent lower today than we were in 2018 based on this data. We are not yet bending back towards the NetZero curve, but we are holding on to some significant gains in terms of lowering our emissions.

We are not yet on pace with electrification to the levels that we need to be in terms of EV's and heat pumps. The reduced vehicles and reduced VMT is masking the EV number for the moment. The focus now is we will need the EV number to grow to maintain and build on that progress. In the building sector, the rental weatherization policy that was passed but has just begun to be implemented, and the renewable heating ordinance for new construction will have some impact in the coming years. This potentially will be an even bigger impact from the carbon pricing and policy that could come into effect in 2024. This would ensure that new construction is being built that is renewable, clean, or paying a carbon fee and that large existing buildings and city buildings as they replace heating systems and water heating systems are coming into compliance with the goals. That could have a transformative impact in the building sector.

The other piece that would have a transformative impact for commercial sector natural gas use is District Heat. This would be a 16% reduction right away. The incentives from the federal legislation should give us a benefit, combined with the Vermont rebates and the Burlington Electric incentives in terms of helping us get more adoption for EV's and heat pumps.

There is reason for optimism but there is work to do. We have two important things to do in 2023. If we get District Energy approved and if we can implement the carbon fee policy. If we can do these, we have made significant impact on future updates on the NetZero roadmap.

This presentation is on the Burlington Electric website for more information.

## **8. IRP Forecast Update #5**

Mr. Gibbons stated that because of the time, he will give a full presentation on the IRP forecast at the next Commission meeting,

## **9. Commissioners' Check-In**

There were no items discussed in the Commissioner's Check in.

Commissioner Chagnon made a motion to adjourn; the motion was seconded by Commissioner Herendeen and approved by all Commissioners present.

The meeting of the Burlington Electric Commission adjourned at 7:30 p.m.

Attest:

A handwritten signature in cursive script that reads "Colleen Rouille".

Colleen Rouille, Temporary Board Clerk



To: Burlington Board of Electric Commissioners  
From: Darren Springer, General Manager  
Date: July 7, 2023  
Subject: **June 2023 Highlights of Department Activities**

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### **General Manager**

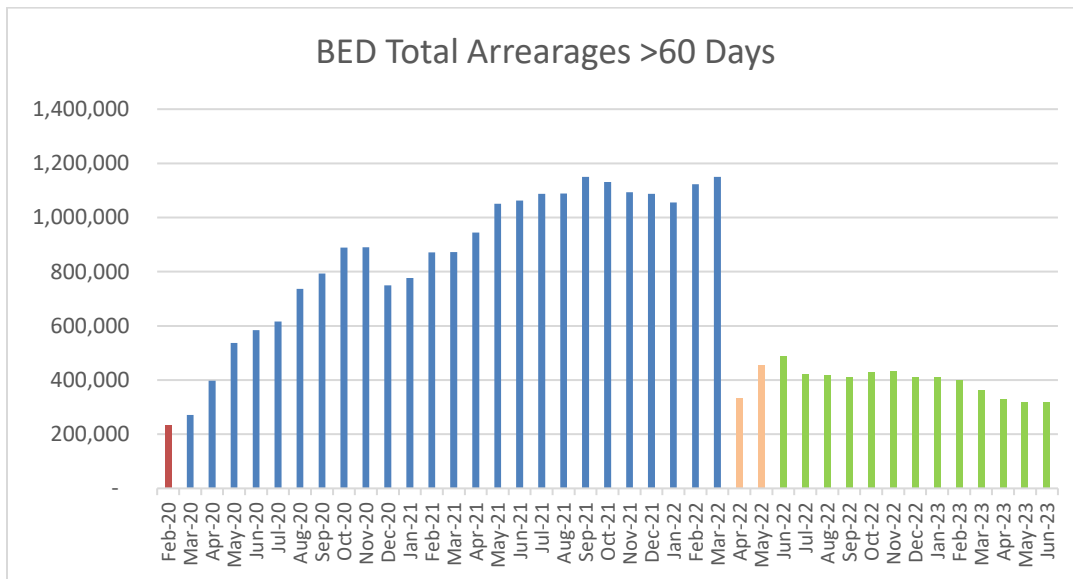
- **Carbon Fee** – We expect the carbon fee policy ordinance to be introduced in July, with work at TEUC and Ordinance Committee in July and August to follow.
- **District Heat** – Customer term sheet meetings taking place in July, with potential City Council work sessions in September. Working towards the GO/NO GO decision. Expecting decision on financing in late July. Also working on transfer of TEPF funds to complete feasibility/design work, pending PUC approval.
- **Legislative Working Group on RES** – There will be a summer/fall legislative workgroup on changes to the Renewable Energy Standard, BED is a named participant and will engage.
- **Rates** – Still awaiting PUC approval of FY23 rate case. FY24 rates will change for bills rendered September.
- **Incentive Uptake** – We are seeing relatively robust uptake on heat pump and EV incentives in 2023, perhaps aided by Inflation Reduction Act incentives at federal level. Changes to the Act 151 program to allow BED to tap TEPF funds (currently used for district heat feasibility work) in 2024-2026 will help us continue enhanced incentive levels for key programs, although we may want to consider changes based on the new federal incentives, including focusing on reducing operating costs for heat pumps as opposed to upfront capital costs.

### **Center for Innovation - Emily Stebbins-Wheelock**

- Acting supervisor of Finance & Accounting and Billing staff.
- Coordinating efforts to track and respond to federal and state funding opportunities, including battery storage, public EV charging infrastructure, and flexible load management software.
- Overseeing 2022 and 2023 rate case development/implementation.
- Mentoring 2023 DeltaClima cohort.
- Continued sponsorship of IT Forward implementations. Portal go-live target date is July 20.

## Finance & Accounting

- FY 2024 budget approved by the City Council.
- Set-up and preparation of new fiscal year budget, general ledger, and payroll.
- Finalized cost of service model and filed 2023 rate case, including request for regulatory accounting treatment of lost revenue from sales of excess energy in winter 2022-2023.
- Monitoring FY23 net income and cash position.
- Assessing new GASB Standard 96-Subscription Information Technology Arrangements for implementation in FY23.
- Began FY23 audit fieldwork/testing with KPMG.
- Submitted FEMA reimbursement grant for damage from Winter Storm Eliot.
- Monitoring receivables in response to COVID19: as of June 30, 2023, BED's total non-current receivables had decreased \$43,255 or 7.3% compared to the end of May 2023. Arrearages >60 days were \$319,025.



## Information Services

- Ongoing phishing and security testing of our users.
- Stabilization of the new MDMS continues post go-live. Small changes have been made to update outage map and outage notifications.
- Continued progress on the new Portal. Vendor continues to work through enhancements and BED training. User acceptance testing is underway. Anticipated go-live in July.
- Project to replace AMI cell relays with pole-mounted routers underway. Prioritization of replacements continues based on location of devices.
- Implementation of Itron Mobile Radio for metering Field Collection System underway.
- Attended DPS Annual Cybersecurity Meeting in Montpelier.

## **Policy & Planning**

- Filed TEPF fund balance responses and DES TEPF transfer request with PUC.
- Shared IRP Generation and Distribution chapter drafts as well as final McNeil economic and carbon reports with DPS.
- Filed request for revised rules re: in-person disconnects with PUC.
- Supported EV charging infrastructure grant application.
- Continued DES term sheet negotiations.
- Filed June 2023 rate case and testimony.
- Resolved Solar Test Center easement issue, amendments in process.
- DeltaClimateVT pilot projects awarded.
- Attended TEUC meeting on DES.
- Preparation for DPS Energy Storage Access Program grant applications for flexible load management and battery storage.
- Discussion on statute change re Act 151 and Act 151 budgets for balance of CY23.
- Winooski One relicensing discussion with Gomez & Sullivan.
- Preparation for Defeat the Peak events.

## **Sustainability & Workforce Development**

- Continued outreach to stakeholder groups and community members, including Family Room; launched outreach efforts at several Parks and Recreation Community Gardens and continued Monday afternoon program in King Street Laundry whereby Program and Equity Analyst is available to answer questions and address customer bill concerns.
- Staffed BED Juneteenth table for the City's Juneteenth Celebration; Organized & attended Asian American and Pacific Islanders (AAPI) Municipal Employee Lunch.
- Connected with Working Bridges program about how to incorporate BED's programs into their work, including starting to identify ways to table with them in the future.
- Shared BED programs with Community Action, VT Legal Aid, UVMMC, CCTV, Media Factory
- Interviewed by VT Human Rights Commission about being AAPI in Vermont
- Joined Energy Action Network (EAN's) spring summit including conversations with members on possible pitches for September meeting.
- Advanced translation work including fliers on home energy savings and reduced electric rate for low-income customers. Launched internal work to create in-house video on reading one's utility bill.
- Worked with Communications & Technology Specialist, Adam Rabin, to edit and release new podcast episodes, including one with Cristina Garcia, Associate Director of the Building Electrification Institute and founder of Latinx in Sustainability, a group dedicated to diversifying sustainability in the workforce.
- Assisted BED EV team in drafting DOT proposal to advance electric car charging in Burlington, including sections pertaining to community benefits and equity.
- Joined the final session of the Clean Energy to Communities working group hosted by World Resources Institute, including conversation on innovative approaches to equity and community engagement.

- Submitted VLITE 1/4ly report and managed progress on VLITE-funded effort to complete project; attended press event at Old North End Community Center highlighting NZE progress and celebrating successful completion of EVSE installments at ONE CC.
- Hosted June Lunch and Learn, featuring episode 4 of “Empowered: Energy Leaders” and BED’s renewable energy status.
- Attended Transportation, Energy and Utility Committee Panel discussion on McNeil and the carbon implications of biomass.
- Facilitated tour of GT for new and other interested staff to further build community and educate staff on BED assets and resources.
- Participated in the selection of DeltaClimateVT Energy 2023’s awards winners for BED’s monetary prize and the opportunity to pilot with BED.
- Represented BED at VT Works for Women GEAR session and conversation on women in leadership; coordinated with REV staff on upcoming women in energy gathering and REV 2023 panel selection; as conference co-chair, reviewed list of panels for October REV event.
- Represented BED on ANR workshop regarding the development of a Vermont Municipal Vulnerability Index tool for the state of Vermont. The tool is intended for primary use by municipalities to assist in planning for and implementing projects to address climate change. The workshop was to help inform the content, data, information, use, functions, and outputs of the tool.
- Met with Sierra Club staff regarding Net Zero Energy Festival and the orchestration of EV ride and drive. Continued outreach to prospective NZE Festival participants.

### **Center for Safety and Risk Management – Paul Alexander**

#### **Safety**

- Coordinated 3 days of CPR/FA/AED Recertification for Generation employees.
- Participated in June BED Safety Committee meeting.
- Performed General Manager safety briefing with IBEW.
- Conducted monthly inspection of fire extinguisher inspections for Pine Street
- Conducted monthly inspection Substation inspections for first aid and fire extinguishers.
- Conducted Operational & Generation Field Audits
- Issued No Trespass Order to irate customer.
- Completed weekly OSHA 300 reporting.
- Completed Special Considerations section in Generation APM for Solar Safety.

#### **Environmental**

- Completed quarterly wastewater sampling.
- Completed CEMs factory acceptance testing.
- Met with Engineering and Maintenance to discuss CEMs installation.
- Submitted oil start up exceedances to our state air inspector.
- Conducted a stormwater MSGP inspection with state officials.



### **Risk Management**

- New Claims Investigations (5 total: 2 Property, 1 Auto, 2 Liability).
- Review C4S' input on BED's SI/SD
- Reply to VT State Attorney pole claim (dec page)
- Created agenda and chaired BED's Safety Committee (BSC)
- Reply to ES on Project Risk grant.
- Create a second release for Bike tune-up Day (BTU)
- Attend NZE Festival meeting.
- Finish 1 employee performance evaluation
- Attend L&L ("Empowered")
- Review video for BPD (robbery) and BED internal incident
- Respond to parking lot issues (illegal dumping and possible car theft)
- Review Insurance "*known and measurable*" (K&M) for finance.
- Attend Naloxone/Narcan HR in-person training.
- Conduct new "employee" orientation (Westaff)
- Review TIV history for finance/H&B
- Create releases for Summerville, BPD 7/4 parking, EV Ride & Drive, Will Raap memorial.
- Review Juneteenth sponsorship agreement
- Send out annual garage use policy and DOE's EOP-004 incident report.
- Attend Hard hat webinar.
- Help with EFC luncheon setup.
- Confirm UFLS 6-month verification for NPCC.
- Attend Delta clime award presentation/pilot presentations.
- Atten hydroponic meeting at Farmhouse site
- Help NPPV in their ALGIN v4.5 beta pilot.

### **Purchasing/General Services**

- Monthly meeting with the state on our new All Electric Bucket Truck
- Worked with Adam Rabin on design for new truck.
- Meet with the team on planning for the NetZero festival later this year.
- Meeting on purchasing an all-electric bike for BED and employee use.
- Wrapping up the FY23 and getting things in order for FY24.

## **Center for Operations & Reliability – Munir Kasti**

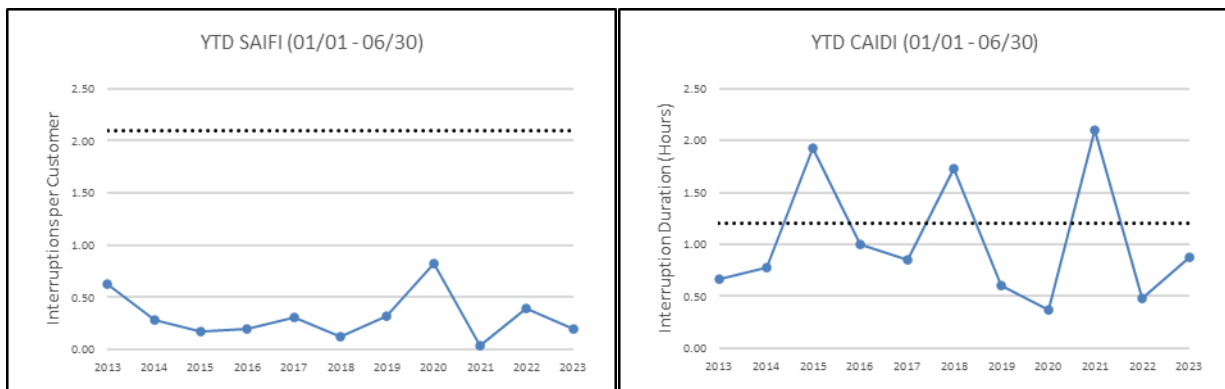
### **Engineering & Operations**

- Continued to work on upgrading the primary voltage from 4 KV to 13.8 KV on Sunset Cliff Road.
- Completed replacement of Milot Switch (722S - 724S)
- Surveyed BED's utility holes on Main Street related to the Great Streets project.
- Removed a pole, transferred two services, and replaced open secondary wires on Fergusson Avenue.
- Moved a secondary pole on Home Avenue and re-attached services as part of the Champlain Parkway project.
- Completed the installation of new streetlights on Lyman Avenue.
- Installed and energized the new capacitor bank at the UVM Athletic Complex.
- Replace two condemned lease light poles.
- DC Fast Charger at 585 Pine St is all set for commissioning from Chargepoint.
- Continue review and discussions with all parties on plans for proposed rebuild of Main Street related to the Great Streets project.
- Completed revised estimate for streetlighting upgrades related to the City Place project.
- Completed revision of Engineering Design and Estimate for electrical work related to City Place project.
- Started work on 2023 version of the distribution chapter of the BED Integrated Resource Plan (IRP)
- Issued Request for Proposals for civil work related to the 3-phase upgrade on Ethan Allen Parkway
- Developed civil plan for underground circuit replacement on Summit Ridge.
- Completed a service upgrade at 421 South Union St.
- Completed estimates for a service upgrade at 284 East Ave.

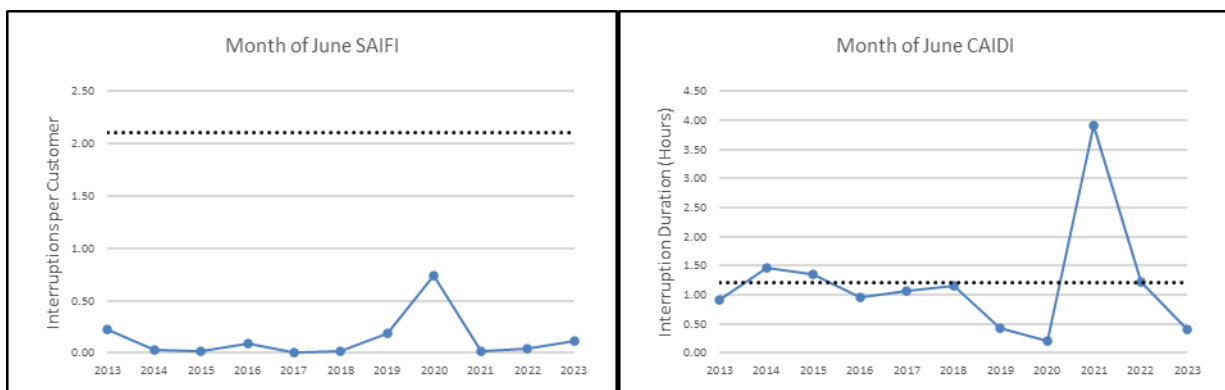
**SAIFI & CAIDI Outage Metrics:**

BED's distribution system experienced 22 outages in June 2023 (5 unscheduled and 17 scheduled). BED's SAIFI for the Month of June was 0.11 interruptions per customer and CAIDI was 0.39 hours per interruption. BED's YTD SAIFI is 0.2 interruptions per customer and YTD CAIDI is 0.88 hours per interruption. The high number of scheduled outages for the month of June was due to the crew's converting customers to the new infrastructure built this fiscal year along Sunset Cliff Road.

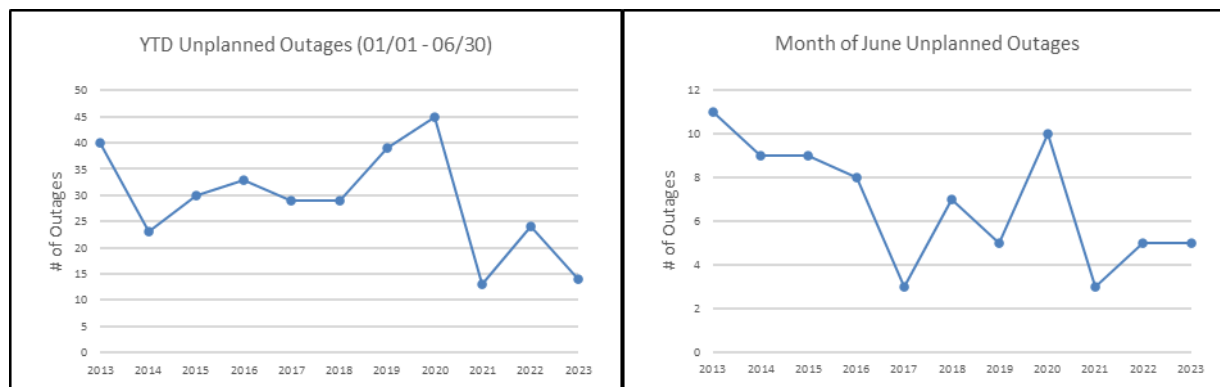
The following figure shows BED's historical YTD SAIFI and CAIDI:



The following figure shows BED's historical June SAIFI and CAIDI:



The following figure shows BED's historical Unplanned Outages:



## GENERATION

### ***McNeil Generating Station***

Month Generation: 13989 MWh  
 YTD Generation: 97296 MWh  
 Month Capacity Factor: 38.86%  
 Month Availability: 99.70%  
 Hours of Operation: 291.95 hrs.

This month at McNeil we conducted routine maintenance, preventative maintenance, and some process improvement projects. We replaced our A belt with a fire-retardant belt, installed wiring for Infrared cameras (fire protection), and new CEMs equipment testing.

### ***Winooski One Hydroelectric Station***

Monthly Generation: 1987.27 (89.8 % of average)  
 YTD Generation: 17184.327 (108.76 % of average)  
 Month Capacity Factor: 37.30%  
 Annual Capacity Factor: 53.46%  
 Month Availability: 99%

This month at Winooski One conducted routine maintenance, preventative maintenance, and a few process improvement projects. We have had fluctuations of flow during this spring from the heavy rains.

***Burlington Gas Turbine***

Month Generation:	00.000 MWh
YTD Generation:	12.870 MWh
Month Capacity Factor:	0.000%
Month Availability:	50%
Hours of Operation Unit A:	0.0
Hours of Operation Unit B:	0.0

The asset was fully out of service since 7/20/22 undergoing troubleshooting and repairs due to the forced outage resulting from the failed PT A coupling shim pack. After commissioning activities initiated, alignment and vibrations were found to be excessive. One unit, B Jet, was eventually commissioned on 3/9/23 with a successful single unit operation however A PT vibrations were too severe and A Jet could not be commissioned and is presently out of service. The best-known plan to remedy the misalignment of A PT that results in high vibrations is an engineered coupling capable of taking up the misalignment, this new coupling is on order. This coupling is expected to arrive early July for installation.

(June Ecomax=19.2), (October Ecomax=23.0)

**Solar (Airport 499 kW)**

Month Generation:	76 MWh (-10% from previous year)
YTD Generation:	287 MWh
Month Capacity Factor:	21%
Month Availability:	100%

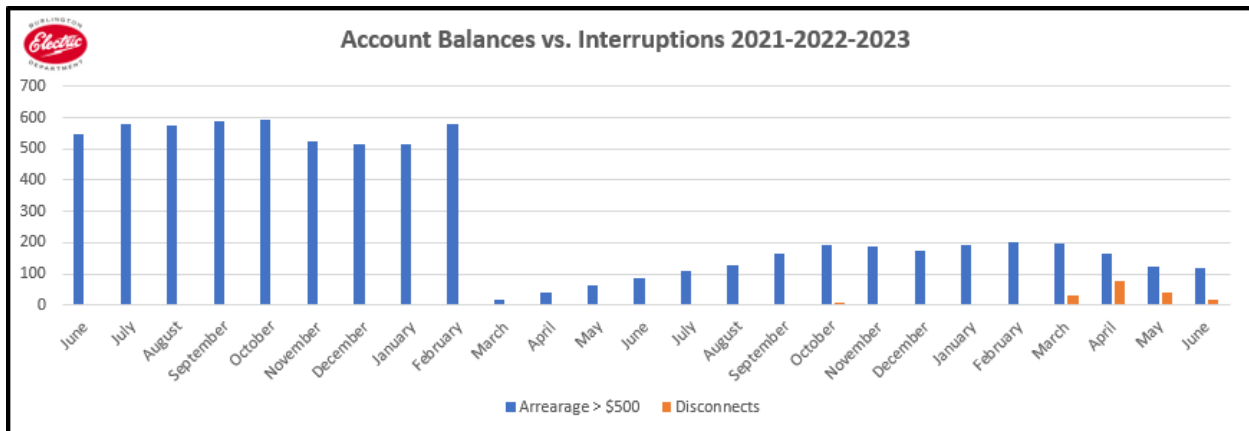
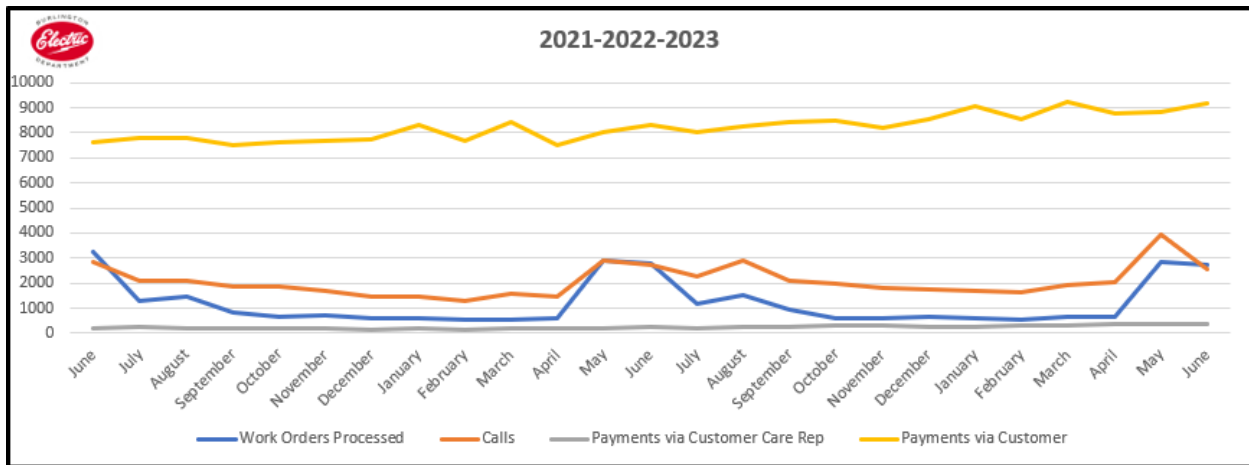
**Solar (Pine Street 107 kW)**

Month Generation:	15 MWh (-7% from previous year)
YTD Generation:	22 MWh
Month Capacity Factor:	19%
Month Availability:	100%

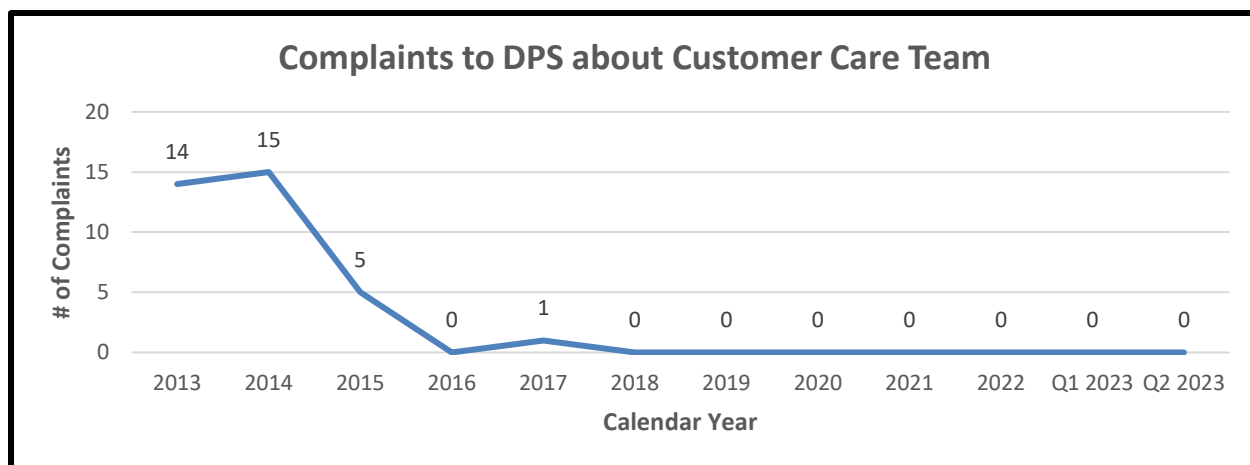
## **Center for Customer Care & Energy Services – Mike Kanarick**

### **Customer Care**

- **Call Answer Time (75% in 20 seconds):** June 2023 79.5%, May 70.9%, April 85.3%, March 87.9%, February 88.9%, January 85.4%. June 2022 77.5%, May 71.1%, April 85.0%, March 85.8%, February 85.2%, January 83.9%. Meaningful improvement of 2.0% over same time last year, during one of busiest months of year.
- **June 2023 Stats:** please see dashboard for additional metrics categories.



*\*Please note that our account balances greater than \$500 were substantially reduced with the application of more than \$1M in ARPA funds in early April 2022.*



### Communications and Marketing

- Net Zero Energy press conference:** on June 13, 2023, BED, along with Mayor Miro Weinberger, Champlain Housing Trust CEO Michael Monte, Car Share Vermont Founder Annie Bourdon, and Vermont Low Income Trust for Electricity Executive Director Gabrielle Malina, announced the annual update to the City's Net Zero Energy Roadmap from newly installed electric vehicle charging stations in the parking lot of the Old North End Community Center. The new 2022 data provided by Synapse Energy Economics showed that Burlington continues to be ahead of Roadmap pace in the ground transportation sector; natural gas consumption, particularly in the commercial sector, has rebounded moderately since hitting pandemic-era lows; and Burlington emissions remain lower overall by 11.2 percent compared to the 2018 baseline.
- Energy Assistance Program:** monthly bill credit program to offset by 12.5% the rate increases (3.95% proposed this year and 7.5% last year) began July 1, 2022 – boost to former Temporary Energy Assistance Program of 7.5%. Last year's participants in Temporary Energy Assistance Program of 7.5% automatically enrolled in new program. So far, 154 customers (up from 146 last month) have been approved. Customers can learn about eligibility requirements and apply by visiting [burlingtonelectric.com/rates](http://burlingtonelectric.com/rates). After this month, we will not include this metric on this report since we added it to the dashboard as of April 2023.
- Vermont Emergency Rental Assistance Program (VERAP - [erap.vsha.org](http://erap.vsha.org)):** VERAP helps tenant households with paying rent, as well as paying utility and home energy costs. While December 31, 2022, was the last date to apply for assistance, the state will continue to provide certain levels of assistance for the most vulnerable Vermonters through June 2023. BED so far has received \$1.212M (up from \$1.207M) in funds awarded to its customers. We likely will receive further payments as the final applications are processed.
- Vermont Homeowner's Assistance Program (VHAP):** launched by the State of Vermont through the Vermont Housing Finance Agency (VHFA) in January 2022 to help prevent home foreclosure and displacement with assistance for overdue mortgage payments, homeowners' association fees, property taxes, and utilities. While the VHAP program applicant portal closed on June 12, 2023, a few more applicants continue to be sent our way by VHFA. So far, BED has certified 101 (up from 94 last month) applicants. As of June 14, 2023, an applicant can add their

name to a wait list and those applications will be evaluated based on need and program fund availability. Tax sales and foreclosures will be prioritized above utility bill payments.

- Net Zero Energy Podcast: we invite you to take a listen to our new episodes added in June at [burlingtonelectric.com/podcast](http://burlingtonelectric.com/podcast).
- North Avenue News: our June column shared the news about our proposed 5.5% rate increase, promoted our Energy Assistance Program, and provided our annual NZE Roadmap update. We did not place an ad in the June issue.
- Website and Facebook Highlights
  - Overall site-wide pageviews for June 2023 = 36,499
    - May = 46,750
    - April = 40,507
    - March = 41,409
    - February = 31,290
    - January = 40,165
    - December = 20,272
    - November = 21,290
    - October = 21,797
    - September = 22,639
    - August = 27,972
    - July = 23,885
    - June = 24,859
    - Unique homepage pageviews for June 2023 = 20,495
    - May = 27,691
    - April = 23,286
    - March = 28,317
    - February = 15,040
    - January = 21,866
    - December = 8,207
    - November = 7,371
    - October = 6,762
    - September = 6,921
    - August = 8,895
    - July = 8,565
    - June = 7,860
  - Full site visits for June 2023









- Visitors by website page


page title	June 2023	May 2023	Apr 2023	Mar 2023	Feb 2023	Jan 2023	Dec 2022	Nov 2022	Oct 2022	Sep 2022	Aug 2022	July 2022	June 2022
Burlington Electric Department	21676	29074	24511	29277	19854	26553	8207	7134	7730	8080	10549	8565	9206
My Bill	2717	2811	2541	2657	2512	2735	2445	2520	2862	2850	3201	3113	3207
Waste Wood Yard	1199	1634	2010	330	259	593	590	1234	1332	920	1034	1070	1386
Report A Problem	251	104	344	91	74	82	871	167	120	455	1646	103	188
Stop or Start Service	908	2256	603	269	230	289	273	294	348	407	841	738	951
E-billing	337	254	207	240	240	280	234	241	319	330	362	443	524
Contact Us	762	1192	746	485	514	474	473	507	510	553	862	530	654
McNeil Generating Station	543	572	906	384	334	396	393	614	699	624	410	425	482
Heat Pumps	501	491	515	446	421	519	408	883	508	435	579	589	490
Rebates	694	776	831	645	562	860	554	584	588	627	689	1129	754
Rebate Center	715	833	769	652	595	732	524	617	609	597	876	852	934
Rebates for 2023	44	59	73	71	219	333	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Green Stimulus	n/a	n/a	n/a	n/a	n/a	28	22	36	19	66	32	37	29
Stop or Start Service	908	2256	603	269	230	289	273	294	348	407	841	738	951
Leadership Team	198	210	244	204	191	249	178	202	216	224	206	159	174
Rates & Fees	198	295	239	216	169	209	201	226	226	289	228	225	208
Usage Tracker Registration	189	127	92	99	115	118	112	124	120	124	177	118	128
RFP	329	329	354	331	316	498	413	374	516	419	268	225	335
Residential   Ways to Save	169	181	173	132	123	125	134	125	133	142	187	194	199
Electric Vehicles	323	355	454	414	431	492	331	356	295	355	497	483	324
E-Bikes	199	141	205	172	114	118	76	107	151	173	292	375	202
Net Zero Energy News	40	12	28	38	23	33	40	48	40	37	25	25	32
Electric Vehicles	323	355	454	414	431	492	331	356	295	355	497	483	324
Our Energy Portfolio	99	82	94	108	85	70	49	65	74	57	102	90	55
Lawn Care	145	274	205	103	79	120	67	71	123	110	135	249	259
RFP Detail	74	192	190	84	274	622	195	241	533	214	143	35	93
Defeat The Peak	5	5	5	7	3	13	8	9	12	15	333	242	15
Commercial   Ways to Save	48	40	47	43	28	34	46	49	38	31	40	46	48

- Top-performing June Facebook posts

## Big responses to Lake Monsters games events

	Join Burlington Electric Department on ... burlingtonelectric	Boost post	...	Thu Jun 29, 8:14am	117 Accounts Center accou...	--	4 Likes
	Join Burlington Electric Department on ... Burlington Electric Department	Boost post	...	Thu Jun 29, 8:14am	301 Accounts Center accou...	6 Post engagements	3 Reactions
	BED will be joining our @vermontlakem... burlingtonelectric	Boost post	...	Fri Jun 2, 9:56am	130 Accounts Center accou...	--	5 Likes
	BED will be joining our Vermont Lake M... Burlington Electric Department	Boost post	...	Fri Jun 2, 9:56am	275 Accounts Center accou...	1 Post engagements	1 Reactions

## Excitement for this year's Net Zero Energy Festival

	Vermonters, mark your calendars... Burlington Electric Department	Boost unavailable	...	Tue Jun 13, 7:39am	146 Accounts Center accou...	19 Post engagements	3 Reactions
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## Energy Services

### *UVM*

- Christie-Wright-Patterson Corridor Lighting Retro-fit – This lighting retrofit project in a major student dormitory replaces existing T8 fluorescent technology with new LED fixtures with bi-level dimming. The upgrading includes corridors and stairwells and encompasses about QTY=300 fixtures. The project began about a year ago and has just been completed. BED is now updating the energy saving calculations and has arranged a site visit to view the final results.

### *UVMMC*

- ACC Lighting Retrofits to LED – BED is working with several Facility entities to determine the least-cost methods of upgrading existing fluorescent fixtures to LED. The installation of QTY=1000 High-Bay LED fixtures has begun in the ACC mechanical rooms and switch-gear areas. A second project seeks to replace all linear fixtures and downlights in corridors on five floors in the ACC (about 1600 fixtures).

### *Other Services*

- Weatherization coordination with VGS- VGS requested electrical account usage histories (with customer permission) for 3 SF and 4 MF buildings (representing 15 living units) this month for the purpose of weatherization audit preparation and building energy use analysis. This brings the total YTD (2021-2023) requests to 183 SF and 144 MF buildings. The overall increase in multifamily building interest, in the VGS weatherization program, is being driven by the Burlington rental housing weatherization ordinance.
- Consolidated Communications / Chiller System Replacement – A local engineering company is working with the Owner to create a proposal for the replacement of the existing water-cooled chiller system at this large telecom facility hub on Main St. BED received updated documentation on the design this month, along with project cost information. We have developed a preliminary rebate offer for the project. The work is structured to occur in two phases, with completion targeted for the cooling season in 2024.
- Consolidated Communications / Facility Lighting Upgrade – BED has been contacted by an out-of-state contractor who will be developing a plan to upgrade the old fluorescent lighting fixtures at 266 Main St., replacing the lamps with TLEDs. This will be a sizable facility lighting retrofit. BED completed a lighting upgrade analysis in 2007 and already has information on the existing fixtures. BED reviewed this existing lighting information this month – and believes that replacement of existing lamps with ballast-bypassed TLEDs is a cost-effective method of upgrading the building's lighting. The contractor will be completing their own survey soon, with the project expected to be completed before the end of 2023.

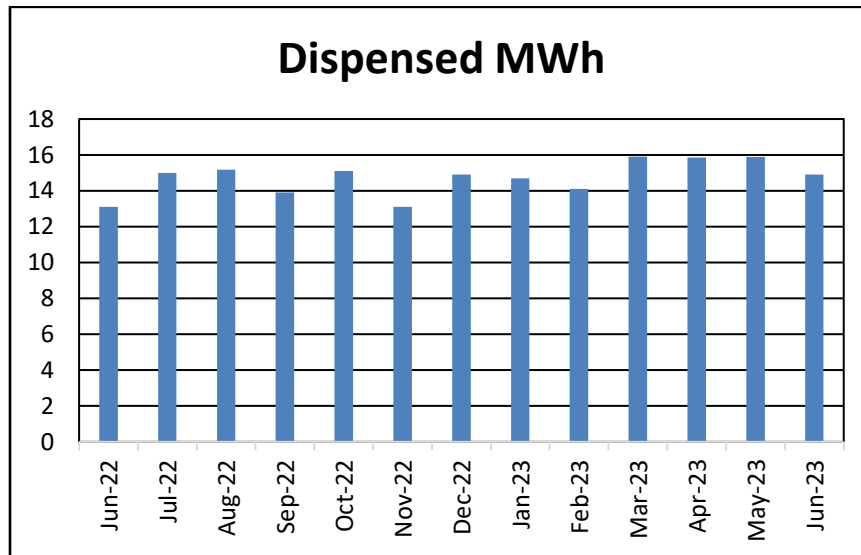
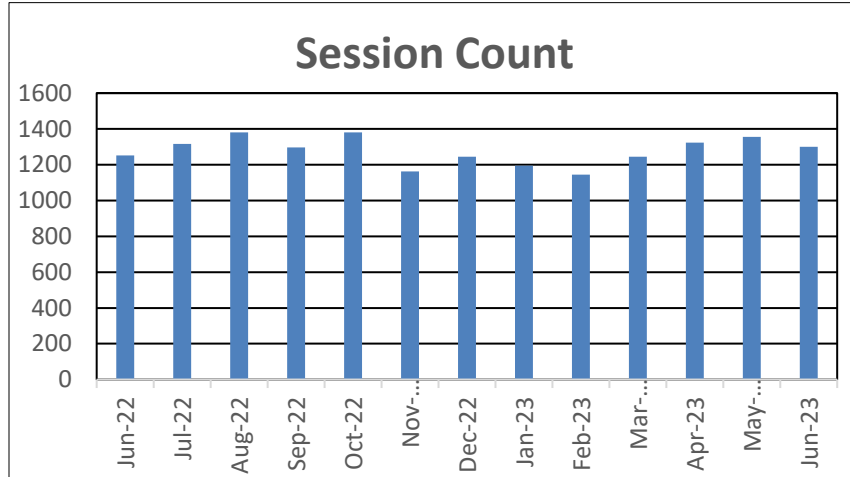
- Rhino Foods / Freezer Dehumidifier Control Improvements – BED downloaded power data from the BED DENT logger that we installed earlier at the main power feed to the unit. This data will be used to develop a baseline energy use for the system before any control improvements are made. We are still analyzing the data, in conjunction with OA conditions and RH% levels in the freezer – to see where better control can reduce energy consumption of the system.
- Village Hydroponics / Shipping Container Vegetable Grow – A non-profit in Burlington is working on a design for a fully enclosed vegetable grow facility which will fit into a standard metal shipping container. The focus is on non-summer only growing, and to provide vegetable types that may be unavailable in Vermont, especially in winter, but familiar to various other cultures now living here. The news this month is that the facility has finally found a home at Burlington's Intervale. BED is now helping to update the energy modeling with the latest technical data, to ensure that the latest design features are accurate for the model inputs.
- Champlain School Apartments / Corridor Lighting Upgrades – A BED site visit was arranged with the owner of this facility last month, which was the original Champlain School building, now converted into apartments. The plan is to replace all of the corridor fixtures, removing fluorescent technology and installing new LED fixtures. BED was in conversation with the apartment building's owner this month, and they have decided to go ahead with the project. The scope of the work is QTY=76 fixtures in both the corridors and in the stairwells of the apartment complex.
- Main St. Landing / 60 Lake St. Boiler Circulation Pump Replacement – BED has been working with the owner to identify a 7.5 HP pump replacement that will qualify for high-efficiency rebates. Further investigation confirmed that the existing pump is already driven by a VFD, controlled by their BMS. BED advised that just replacing the existing defective pump in-kind would be the most cost-effective repair while still maintaining their existing energy efficient control configuration.
- King St. Laundry / Ventilation Upgrade – BED has been in contact with the new Owner of this facility and discussed a proposed ventilation project which will isolate the gas dryer vent system from the main customer area of the building. This will stabilize and better control air flow in the customer area, and to allow a new ductless heat pump to provide effective cooling to the space. BED has offered an On-Bill-Financing loan to the owner to support the completion of the work. The owner is presently considering the offer.
- Rhino Foods / New Freezer Warehouse High Efficiency Envelope Enhancements – A meeting was held last month with the owner, to discuss the incremental costs and energy savings associated with (1) an enhanced dock door seal system for ten loading docks (2) high speed roll-up doors (3) highly insulated and sealed personnel doors. Recommendations were discussed, and a decision was made to consolidate selected portions of these measures into a single project for which BED can then assign a single rebate offer. This updated rebate offer was delivered to the owner this month. An additional meeting was held this month to discuss further possibilities for incentives, which include the reduction in truck diesel fuel usage through the consolidation of their freezer warehouse under the same roof as their production facility, a Tier 3 rebate measure.

- City Place Phase 2 – A Technical Review Committee meeting was held for this project earlier this month, updating the City of Burlington with the latest design changes. This precipitated a follow-up meeting with BED, the Owner, the architect, and the MEP engineer to discuss the BED rebate process in more detail. The design of the project is still in its early phases, so no specific rebate estimates are yet possible. However, the owner is engaged in the process and interested in maximizing the incentives that might be available.
- Pathways VT / 141 Maple St. New Construction (Soteria) – Several months ago, BED discussed this upcoming major renovation project with the architect and a local engineering company. This is a nine-room affordable housing facility with common areas and common bathrooms. Cost constraints are focusing the mechanical work towards retention of the existing natural gas boiler baseboard heating system. Space cooling is intended to be added to the building. An updated recommissioning proposal was received by BED this month from the owner, to focus specifically on the best way to move forward to provide cooling for the building. BED and VGS have agreed to split the cost of the proposal three ways with the Owner.
- Howard Center / 300 Flynn Ave. New Construction – BED has been in contact with the architects and the MEP engineering firm associated with this 40,000 SF NC project. A geothermal test well has been completed, with only marginal results for an open loop geothermal system. BED has submitted payment for the drilling incentive that we agreed upon earlier in the year. The marginal test results may make a geothermal mechanical solution uneconomical to pursue. We also supplied budgetary estimates for Tier 3 and EEU rebates, based on energy modeling reports supplied by the MEP engineer. Those figures will likely need to be refined in the future.
- Old YMCA Building Renovation / 266 College St. – BED attended a Technical Review Committee Meeting this month, to be introduced to the preliminary plans to renovate this vacant building. The building will be developed into apartment spaces, with only the south side of the existing building to be retained. Other portions of the building will be demolished and re-built. The present scope of work is essentially a feasibility study to see if renovating this space is financially viable.

### *Electric Vehicles*

- The EVSE dispensed a total of 14.9MWh and supported 1,301 sessions.
- The top 3 sales were 72, 78 (x2) kWh and occurred at the Cherry St. and College St. garages.
- The top 10 sessions (0.76% of total) accounted for 4.6% (691kWh) of the total monthly sale. The ten sessions ranged from 62kWh-78kWh.
- The EVSE served 700 unique drivers last month.
- The Pine DCFC installation is complete. ChargePoint has been notified and they are scheduling the commissioning.
- The Marketplace Garage DCFC is not progressing. The City Wire Inspector notified Peck Electric/iSun that they are not allowing the installation to continue for safety reasons.
- The Oakledge Park installation is 95%. We will activate shortly. Since this station is located behind the Oakledge Park (PR&W) meter, we will access monthly usage from the ChargePoint portal and subtract the kWh from their monthly bill. We are exploring more administratively efficient longer-term solutions.
- We have requested a replacement quote for BE13 (Hannaford).

- *Session Count* and *Dispensed Energy* plots from the public charging network are shown below.



- Number of EV and PHEV rebates to date – 548 (of this 98 LMI rebates to date as shown below)
  - New All Electric Vehicle – 231
  - New All Electric Vehicle (LMI) – 45
  - New PHEV – 133
  - New PHEV (LMI) – 41
  - Used All Electric Vehicle – 42
  - Used All Electric Vehicle (LMI) – 9
  - Used PHEV- 23
  - Used PHEV (LMI) – 3
  - New All Electric Vehicle (\$60K plus) – 19
  - New PHEV (\$60K plus) – 2
- Number of customer loans with lending partners to date – 5
- Number of customers currently participating in the new EV Charging Rate- 208
- Number of E-Motorcycle rebates to date – 1

#### **Electric Vehicle Charging Stations**

- Number of home EV charging stations rebates to date – 158
- Number of Multi-family EV charging stations rebates to date – 1
- Number of Multi-family Non-EVmatch charging stations rebates to date (LMI) – 3
- Number of Multi-family Non-EVmatch charging stations rebates to date – 3
- Number of Multi-family EVmatch Public charging stations rebates to date – 2
- Number of Level 2 Workplace charging stations rebates to date – 8

#### **Electric Lawn Equipment to Date**

- Number of e-mower rebates to date – 611 632 (11 commercial & 600 621 residential)
- Number of e-leaf blowers to date – 70
- Number of Residential e-Trimmers – 66
- Number of Residential e-chainsaws – 12

**Heat Pump Installations to Date** (since the September 2019 NZEC announcement)

- Total Number of Heat Pump Technology rebates to date- 1,013 (of this 141 LMI rebates to date as shown below)
  - Number of ductless heat pumps to date – 604
  - Number of LMI eligible ductless heat pumps to date – 114
  - Number of centrally ducted heat pumps to date – 208
  - Number of LMI eligible centrally ducted heat pumps to date – 18
  - Number of air-to-water heat pumps to date – 1
  - Number of commercial VRF heat pump systems to date – 2
  - Number of geo-thermal heat pump systems to date – 1
  - Number of heat pump hot water heaters to date – 56
  - Number of LMI eligible heat pump hot water heaters participants to date – 9

**Electric E-Bikes to Date**

- Number of e-bike rebates to date – 484

**Electric Induction Stovetops to Date (new offering in Jan 2021)**

- Number of induction Stovetops rebates to date – 45

**Electric Snow Blowers to Date (new offering in Jan 2022)**

- Number of snow blower rebates to date – 17

# BURLINGTON ELECTRIC DEPARTMENT 2023–2024 STRATEGIC DIRECTION

## MISSION

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To serve the energy needs of our customers in a safe, reliable, affordable, sustainable, and socially responsible manner.

## VALUES

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Safety, Reliability, Community, Innovation

## 2030 VISION

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Make Burlington a Net Zero Energy city by eliminating fossil fuel usage across the electric, thermal, and ground transportation sectors by strategically electrifying, managing demand, realizing efficiency gains, and expanding local renewable generation while increasing system resilience.

## STRATEGIC OBJECTIVES

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### Engage Customers and Community

1. Focus on customer first-call resolution to provide exceptional customer care
2. ~~Better educate and engage~~Increase education and engagement with customers on our Net Zero Energy vision through all communications channels, with a focus on web and social media and video
3. Ensure all programs are equitable and accessible to all, including people whose primary language is not English, with a priority given to low-to-moderate income, rental, Black, Indigenous, and People of Color (BIPOC), immigrant, and refugee populations, and
4. Evolve traditional energy efficiency programs to ~~drive deeper greenhouse gas emissions reductions,~~ complement strategic electrification efforts, to drive deeper



greenhouse gas emissions reductions, help manage peak demand, and improve community resilience and environmental health

5. Proactively seek customer input, with the help of existing and strategic community partners, including through new community ambassador program, and listen to and hear their needs and incorporate their input into program design
6. Provide website and other educational tools so that customers can evaluate both cost and carbon outcomessavings from heat pumps, electric vehicles, and other electrification technologies technology installations relative to current fuel sources

### **Strengthen Reliability**

1. Maintain five-year Distribution System and Generation construction plans to accommodate potential load increases due to the Net Zero Energy goals, and design and construct projects to continue to improve safety, reliability, and efficiency
2. Continue to follow maintenance plans for McNeil Generating Station, Winooski One Hydro, Gas Turbine, and the Distribution System
3. Take steps to ensure reliable operations through staff succession planning
4. Ensure consistent fuel supply availability at McNeil based on annual operational strategy and procurement procedures
5. Implement Outage Management System (OMS) and grid analytics to improve response to system outages, system reliability, and efficiency

### **Invest in our People, Processes, and Technology**

1. Attract, develop, and retain a diverse workforce with the knowledge, skills, and ability to support BED's Net Zero vision and strategic objectives
2. Develop a culture of integrity, safety, inclusion, innovation, teamwork, and continuous learning and improvement
3. Continually improve internal processes to design and deliver innovative programs and services, maximize operational efficiency and effectiveness, and optimize use of data to inform decision-making
4. Plan and invest in the technology infrastructure necessary to support BED's mission, vision, and strategic priorities, including multi-year replacement of core business systems
5. ~~Implement remote work flexibility, as permitted under City policy, to lead by example in reducing vehicle miles traveled and emissions~~Lead by example in reducing vehicle miles traveled through remote work flexibility, support for multi-modal transit and carsharing partners, and supporting bicycling (both conventional and e-bikes) through employee programs

### **Innovate to Reach Net Zero Energy**

1. Advance district energy, battery storage projects, and local renewable energy production including customer-owned and community-based projects
2. Improve and expand automated demand response capability, with focus on EV charging and thermal, and implement appropriate end-use technologies to manage loads
3. Advance additional dynamic and creative rates to achieve Net Zero Energy goal

4. Continue to track and report to the community on progress toward the Net Zero Energy Roadmap goal
5. Provide clean and affordable transportation fuel through renewable electricity, and invest in and encourage use of the necessary infrastructure to serve customers across all modes of transportation, including electric bikes, electric vehicles, and electric transit buses
6. Actively participate in City policy processes aimed at reducing greenhouse gas emissions in the ground transportation and building sectors
7. Build and maximize use of partnerships that provide unique value and opportunities to make progress toward Net Zero Energy at a more rapid pace and greater scale
8. Maintain and invest in quality facilities and use them to pilot and showcase new technologies that advance Net Zero Energy

#### **Manage Budget and Risks Responsibly**

1. Create financially responsible and sustainable budgets that balance the need for stable rates, investment in core infrastructure, and strong credit rating factors
2. Develop and maintain a sustainable debt financing plan for Net Zero Energy to support electrification while mitigating upward rate pressure
3. Ensure timely and diligent compliance with risk, safety, environmental, and other legal and regulatory standards
4. Efficiently and effectively manage procurement of goods and services
5. Mitigate cybersecurity risk through awareness, assessment, policy, and best practices

# BED 2022-2023 Strategic Direction Dashboard

Metrics by Strategic Initiative	Target	June 2023 Actuals	May 2023 Actuals	Apr 2023 Actuals	Mar 2023 Actuals	Feb 2023 Actuals	Jan 2023 Actuals	2022 Yearly Actual	2021 Yearly Actual	2020 Yearly Actual	2019 Yearly Actual
<b>Engage Customers and Community</b>											
Call answer time 75% within 20 seconds	75%	80%	71%	85%	88%	89%	85%	avg 82%	avg 82%	avg 81%	
Delinquent accounts >\$500	0	118	122	163	197	203	194	avg 188	avg 529	avg 201	
Disconnects for non-payment	0	17	42	77	32	3	0	12	0	45	
Energy Assistance Program Participants		154	146	138	134						
# of residential weatherization completions	10	0	2	3	1		0	5	5	3	11
Weatherization completions in rental properties		0	2	2	0	2	0	6	0	0	TBD
# or % of homes or SF weatherized		TBD	TBD	TBD	TBD	TBD	TBD	TBD	TBD	TBD	0
# of commercial building with improved thermal envelopes		0	1	1	1	0	0	4	5	5	0
% of EEU charge from LMI customers spent on EE services for LMI customers (cumulative for 2021- 2023 year 3-year EEU Performance Period)	\$ 180,240	\$ 474,930	\$ 470,255	\$ 464,839	\$ 375,327	\$ 350,165	\$ 348,213	\$ 335,234	TBD	TBD	TBD
# of customers enrolled in DtP mailing list	TBD	782	NA	NA	NA	NA	NA				523
# of large customers participating in DtP		NA	NA	NA	NA	NA	NA	11			
<b>Strengthen Reliability</b>											
SAIFI (AVG interruptions/customer) (annual target)	< 2.1	0.11	0.01	0.06	0.0	0.0	0.01	1.06	0.22	1.50	1.03
CAIDI (AVG time in hrs to restore service) (annual target)	< 1.2	0.39	0.91	1.51	1.36	1.22	2.17	21.39		0.55	0.75
Distribution System Unplanned Outages (annual target)	82	5	3	2	0	1	3	61	44	90	98
McNeil Forced Outages	0	0	0	1	1	0	1	14	5	21	TBD
W1H Forced Outages	0	0	0	0	0	0	0	6	9	2	TBD
GT Forced Outages	0	0	1	1	1	1	1	6	2	3	TBD
<b>Invest in Our People, Processes, and Technology</b>											
Avg. # of days to fill positions under recruitment	120	241	211	155	178	238	179	100	68	179	
# of budgeted positions vacant	0	12	11	11	10	7	7	avg 9	avg 9	6	NA

# BED 2022-2023 Strategic Direction Dashboard

Metrics by Strategic Initiative	Target	June 2023 Actuals	May 2023 Actuals	Apr 2023 Actuals	Mar 2023 Actuals	Feb 2023 Actuals	Jan 2023 Actuals	2022 Yearly Actual	2021 Yearly Actual	2020 Yearly Actual	2019 Yearly Actual
<b>Innovate to Reach Net Zero Energy</b>											
<i>Tier 3 Program</i>											
# of residential heat pump installs	See NZE Roadmap Goals below	4	24	13	8	10	25	255	315	203	10
# of commercial heat pump installs		0	1	0	0	1	0	4	4	13	0
# of residential hot water heat pump installs		2	5	1	1	0	6	26	14	6	4
# of commercial hot water heat pump installs		0	0	0	0	0	0	0	0	0	0
Heat pump rebates		4	31	14	9	12	26	271	328	212	0
Heat pump hot water heater rebates		2	3	1	1	16	6	18	15	3	0
LMI heat pump rebates		2	0	1	2	0	0	43	28	6	4
Heat pump technology installs in rental properties		0	1	1	1	1	1	10	14	9	TBD
LMI heat pump hot water heater rebates		0	0	0	2	1	0	1	2	0	1
EV rebates - new		9	8	5	10	6	4	53	67	14	36
EV rebates - pre-owned		0	0	5	0	0	0	18	7	8	2
LMI EV rebates		5	0	0	1	2	1	9	11	7	7
PHEV rebates - new		0	1	0	4	3	3	27	41	10	17
PHEV rebates - preowned		0	1	1	1	1	0	12	6	5	3
LMI PHEV rebates		0	0	0	0	0	0	15	13	6	2
Public EV chargers in BTV (total)		30 ports	30 ports	30 ports	30 ports	30 ports	30 ports	30 ports	27 ports	27 ports	14
Public EV charger energy dispensed (kWh)		14,900	15,900	16,000	15,900	14,100	14,700	151,360	86,570	35,690	78,000
Home EV charging station rebates		7	10	12	8	5	3	70	32	20	12
EV rate charging customers (total)		208	204	192	178	168	162	157	40	40	28
Level 2 charger rebates		0	2	1	0	0	1	11	10	0	1
Level 1 charger rebates		0	0	0	0	0	0	-	0	1	0
E-bike rebates		946	23	13	3	3	0	152	88	36	65
E-mower rebates		21	42	16	0	0	1	159	154	95	142
E-forklift rebates		0	0	0	0	0	0	1	0	0	0
MWE of Tier 3 measures installed		1,302	1,892	1,563	965	786	1,602	22,837	23,763	35,112	3,342
% Tier 3 obligation met with program measures	100%	42%	35%	26%	17%	12%	8%	131%	159%	283%	31%
<i>Net Zero Energy Roadmap Goals</i>											
# of solar net metering projects installed		1	1	3	5	4	5	33	29	24	33
No. of homes receiving NZE Home Roadmaps		0	0	0	0	0	0	7	10	7	
Residential heat pumps for space heating (no. of homes)	2022: 8615	NA	NA	NA	NA	NA	NA	TBD	1235, 20% of goal	891	572
Commercial heat pumps for space heating (1000 SF floor space served)	2022: 5397	NA	NA	NA	NA	NA	NA	TBD	405, 11% of goal	374	374
Residential heat pumps for water heating (no. of homes)	2022: 4365	NA	NA	NA	NA	NA	NA	TBD	108, 4% of goal	108	87
Commercial heat pumps for water heating (1000 SF floor space served)	2022: 1019	NA	NA	NA	NA	NA	NA	TBD	0	0	-
EV registrations in BTV (light-duty)	2022: 2294	NA	NA	NA	NA	NA	NA	TBD	549, 45% of goal	361	296
Greenhouse gas emissions (1000 metric tons CO2)	2022: 150	NA	NA	NA	NA	NA	NA	TBD	188, 114% of goal	185	214
Fossil fuel consumption (billion BTU)	2022: 2418	NA	NA	NA	NA	NA	NA	TBD	3220, 120% of goal	3,182	3,660

# BED 2022-2023 Strategic Direction Dashboard

Metrics by Strategic Initiative	Target	June 2023 Actuals	May 2023 Actuals	Apr 2023 Actuals	Mar 2023 Actuals	Feb 2023 Actuals	Jan 2023 Actuals	2022 Yearly Actual	2021 Yearly Actual	2020 Yearly Actual	2019 Yearly Actual
<i>Demand Response</i>											
# of Defeat the Peak events called		0	0	NA	NA	NA	NA	3	5	3	4
Average kW savings per DtP event		0	0	NA	NA	NA	NA	463	419.5	261	242
<b>Manage Budget and Risks Responsibly</b>											
<i>Safety &amp; Environmental</i>											
No. of workers' compensation/accidents per month	0	0	1	1	0	1	0	16	4	8	
Total Paid losses for workers' compensation accidents (for the month)	annual	\$10,839	\$5,357	\$4,412	\$2,472	\$8,466	\$4,031	\$ 145,102	\$ 93,612	\$ 165,402	\$38,288
Lost Time Incident Rate (days/year) (Dec numbers reflect annual results)	<= 3.5 annual	N/A	N/A	N/A	N/A	N/A	N/A	1.99	0.0	0.93	0.89
Lost Time Severity Rate (days/year) (Dec numbers reflect annual results)	<= 71 annual	N/A	N/A	N/A	N/A	N/A	N/A	112.63	0.0	41.71	78.2
Lost work days per month	0	0	0	0	0	0	0	avg 9	0.0	45	
NOx reporting levels to EPA (Quarterly) (lbs/mmbtu)	<0.075	0.067	0.075	0.070	0.070	0.070	0.067	0.06	0.07	0.07	
# of reported spills, waste water incidents (monthly)	0	1	0	0	0	0	0	6	4	4	
Phosphorus levels to DEC in lbs (monthly/yearly total)	<0.8/37	0.032/0.597	0.048/0.674	0.294/0.650	0.037/0.475	.050/.543	0.017/0.560	0.688	2.028		1.169
# of new power outage claims reported (monthly)	1	0	0	0	0	0	0	5	7	4	
# of new auto/property/other liability claims reported (monthly)	2	4	6	2	4	2	2	27	18	27	
<i>Purchasing &amp; Facilities</i>											
# of Purchase Orders for Inventory (Target: avg for winter months)	42	23	36	59	56	72	40	636	644	593	
\$ value of Purchase Orders for Inv. (Target: avg dollars spent during winter)	\$78,000	\$67,205	\$78,868	\$130,111	\$94,837	\$196,551	\$229,809	\$ 4,861,023	\$ 3,278,620	975,531	
# of stock issued for Inventory (Target: avg during winter months)	320	470	695	575	571	516	569	6,187	4,402	4,545	
\$ value of stock issued for Inventory (Target: avg. during winter)	\$ 65,000	\$ 57,035	\$ 141,919	\$ 317,305	\$ 130,896	\$ 175,308	\$ 275,666	\$ 2,200,233	855,456	1,086,478	
# of posters pulled from poles monthly (Taget: goal to remove each month)	58	179	88	43	59	43	73	900	2,728	627	
# of Spark Space and Auditorium setup/breakdowns monthly (Target: Covid impact)	3	19	23	18	20	9	16	132	88	87	
<i>Finance</i>											
Debt service coverage ratio (avg of previous 12-months)	1.25		2.71	3.83	2.36	2.64	3.91	NA-FY basis	NA-FY basis	NA-FY basis	NA-FY basis
Adjusted debt service coverage ratio (avg of previous 12-months)	1.5		0.84	1.02	0.67	0.8	1.02	NA-FY basis	NA-FY basis	NA-FY basis	NA-FY basis
Days unrestricted cash on hand	>90		107	117	93	100	120	NA-FY basis	NA-FY basis	NA-FY basis	NA-FY basis
<i>Power Supply</i>											
McNeil generation (MWH) (100%)	per budget	13,989	1,360	0	22,522	29,391	30,034	228,981	273,355	192,696	
McNeil availability factor	100%	100%	98%	32%	94%	100%	84%	67%	80%		
McNeil capacity factor	per budget	39%	3.7%	0%	61%	87%	81%	52.4%	62.4%		
Winooski One generation (MWH)	per budget	1,987	2,505	3,717	2,878	2,489	3,609	25,350	24,752	21,194	
Winooski One availability factor	100%	99%	99%	99%	99%	99%	99%	98.3%	97%		
Winooski One capacity factor	per budget	37%	46%	69.8%	52.3%	50.1%	67.7%	41.7%	37%		
Gas Turbine generation (MWH)	NA	0.0	0	0	8.1	4.7	0.0	356	373	441	
Gas Turbine availability factor	100%	50%	39%	35%	36%	0%	0%	54.5%	96%		
Gas Turbine capacity factor	NA	0%	0%	0%	0%	0%	0%	0.2%	0.21%		
BTV solar PV production (mWh)		571	723	531	359	233	82	5,260	5,015	5,182	
Cost of power supply - gross (\$000)			\$2,639	\$2,509	\$3,558	\$2,953	\$2,772	\$36,755	\$30,285	\$31,081	
Cost of power supply - net (\$000)			\$1,995	\$1,534	\$3,558	\$927	\$2,772	\$27,487	\$22,134	\$23,388	
Average cost of power supply - gross \$/KWH			\$0.11	\$0.10	\$0.13	\$0.11	\$0.10	\$0.11	\$0.09	\$0.10	
Average cost of power supply - net \$/KWH			\$0.08	\$0.06	\$0.13	\$0.04	\$0.10	\$0.08	\$0.07	\$0.08	



*FY 2023  
Financial Review  
May*

*June 29, 2023*

# **Burlington Electric Department Financial Review**

**FY 2023**

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## FINANCIAL HIGHLIGHTS – BUDGET VS ACTUAL as of May FY23

(\$000)	Full Yr Budget	CURRENT MONTH			YEAR TO DATE		
		Budget	Actual	Variance	Budget	Actual	Variance
Sales to Customers	51,553	3,802	3,414	(388)	47,174	46,144	(1,030)
Other Revenues	3,631	283	180	(103)	3,223	4,678	1,456
Power Supply Revenues	8,385	2,170	644	(1,526)	8,385	7,470	(915)
Total Operating Revenues	63,569	6,256	4,238	(2,017)	58,781	58,292	(489)
Power Supply Expense (Net)	31,423	2,989	2,640	349	28,635	32,247	(3,612)
Operating Expense	22,952	1,816	1,459	358	20,006	19,461	545
Depreciation & Amortization	6,391	533	524	9	5,858	5,681	177
Taxes	3,466	291	263	28	3,179	2,956	224
Sub-Total Expenses	64,232	5,629	4,885	744	57,679	60,345	(2,666)
Operating Income	(664)	626	(647)	(1,273)	1,102	(2,053)	(3,155)
Other Income & Deductions	5,009	452	382	(70)	4,568	4,982	414
Interest Expense	3,114	242	275	(33)	2,872	3,238	(366)
Net Income (Loss)	1,231	836	(540)	(1,376)	2,798	(309)	(3,107)

### Year-to-Date Results:

- **Sales to Customers** down \$1,030,000 (2.2%). Non-Residential Sales down \$811,500 and Residential Sales down \$219,100.
- **Other Revenues** up \$1,456,000 (45%)
  - a. DSM billable (customer driven).
- **Power Supply Revenues** down \$915,000 (11%)
  - a. McNeil REC revenue of \$3,571,000 compared to a budget of \$4,299,000.
  - b. Wind REC revenue of \$3,018,000 compared to a budget of \$3,110,000.
  - c. Hydro REC revenue of \$697,000 compared to a budget of \$787,000.
- **Power Supply Expenses (Net)** up \$3,612,000 (12%)
  - a. Purchased Power up \$5,217,000.
  - b. Fuel down \$1,115,000.
  - c. Transmission down, \$490,000.
- **Taxes** down \$224,000 (7%)
  - a. Actual Payment in Lieu of Tax (PILOT) is less than budget assumption.
- **Operating Expenses** down \$545,000 (2.7%)
  - a. DSM (rebates & outside services) higher \$1,678,300. Offset by items that are less than budget. This includes labor and overhead (\$1,100,000).
- **Other Income & Deductions** up \$414,000 (9%)
  - a. Interest/investment income up \$400,000 and unrealized gain on investment up 28,500.
  - b. Timing: retirements budgeted in August, December and February delayed.
  - c. Budget assumed customer contributions for Champlain Pkwy, \$516,300 and other overhead/underground billable, \$197,100. Actual includes prior year billable for UVM LCOM \$237,400, Champlain Pkwy \$138,700, University Place decorative lighting \$159,700, Shelburne St Roundabout relocation \$10,300, Main St Great Streets \$10,100 and other overhead/underground projects and grant proceeds.



## FINANCIAL HIGHLIGHTS – BUDGET VS ACTUAL as of May FY23

Capital Spending – May YTD (\$000's)				
Plant Type	Full Yr. Budget	Budget	Actual	% Spent
Production	\$1,637	\$1,624	\$1,769	108%
Other	267	253	122	46%
Distribution	4,460	4,401	3,640	82%
General	2,127	1,998	1,208	57%
<b>Sub-Total</b>	<b>8,491</b>	<b>8,276</b>	<b>6,739</b>	<b>79%</b>
Transmission	632	632	634	100%
<b>Total</b>	<b>\$9,123</b>	<b>\$8,908</b>	<b>\$7,373</b>	<b>81%</b>

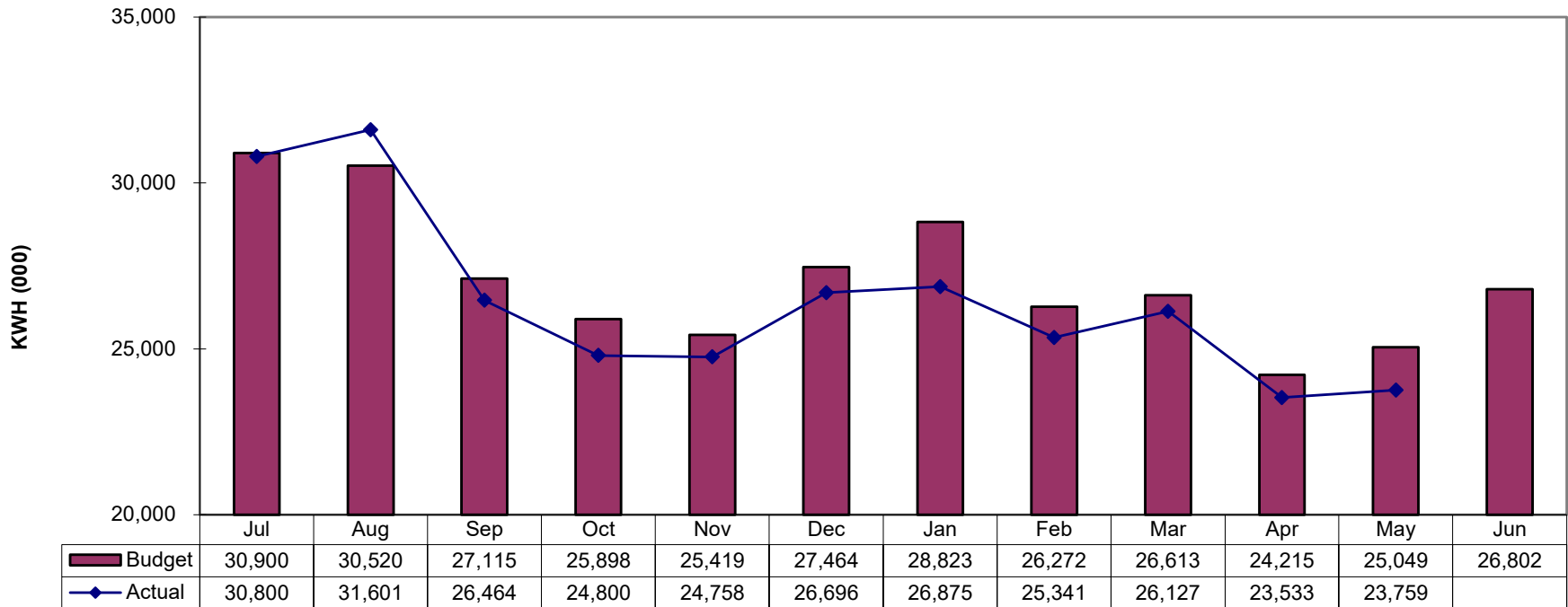
- (1) **Production** – Gas Turbine is higher than planned, \$531,000.
- (2) **Other** – Spending for direct current fast chargers is within budget. Timing of other projects include Distributed Energy Resources, and research & development.
- (3) **Distribution** – Timing of various projects.
- (4) **General** – IT Forward project budgeted throughout the year; YTD expenses of \$758,900 compared to a budget of \$1,306,000. Virtualized Hardware Refresh has deferred to FY24, \$109,500.

As of May 31, 2023 Operating Cash and Investments	
Operating Funds	\$6,777,300
Operating Fund – CDs	\$973,000
Total Operating Cash	\$7,750,300

Credit Rating Factors – May 2023				
	"A"	"Baa"	Current	3 Year Average
Debt Service Coverage Ratio	1.25	1.25	2.71	3.80
Adjusted Debt Service Coverage Ratio	1.50	1.10	0.84	1.02
Cash Coverage - Days Cash on Hand	90	30	107	116

**Burlington Electric Department  
Fiscal Year Ending June 30, 2023**

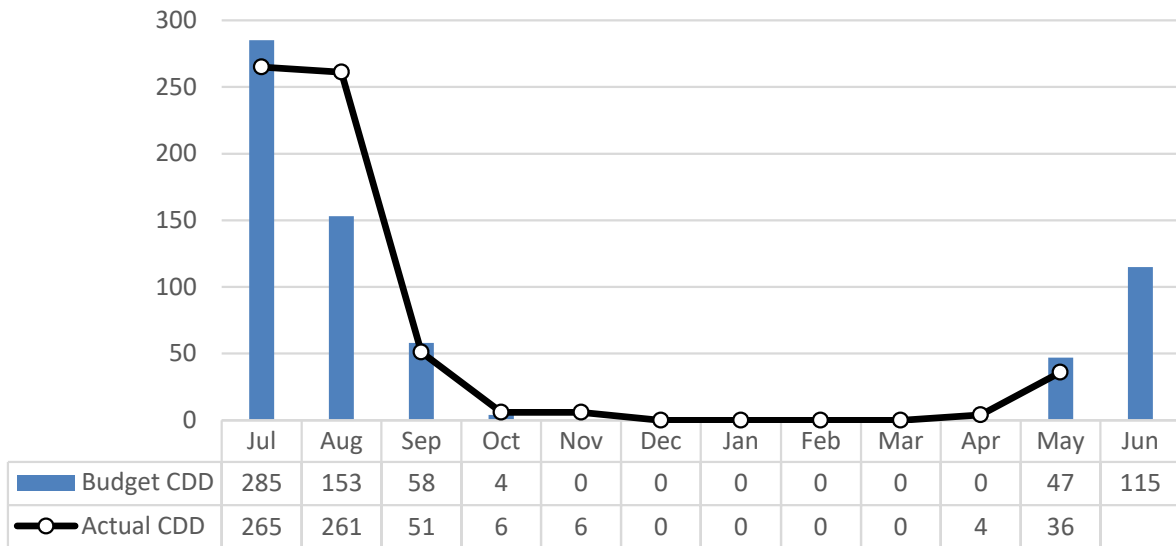
**Total Sales to Customers - KWH  
Monthly**



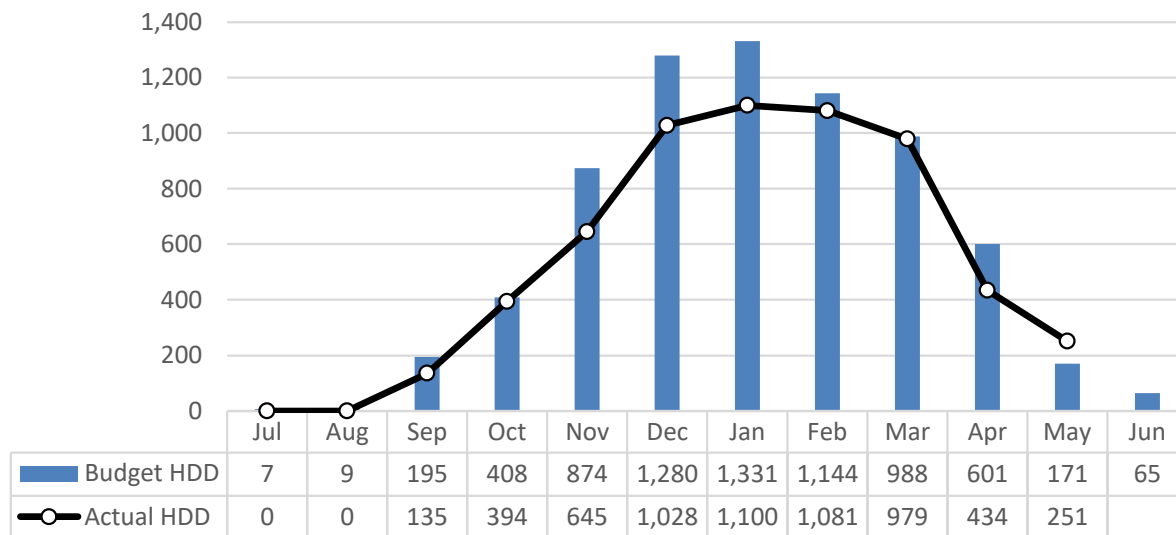
KWH Sales to Customers (YTD)												
	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun
<b>Budget</b>	30,900	61,420	88,534	114,432	139,851	167,316	196,138	222,410	249,023	273,239	298,288	325,090
<b>Actual</b>	30,800	62,400	88,864	113,664	138,422	165,118	191,993	217,334	243,461	266,995	290,754	

## FY 2023

### Cooling Degree Days (CDD)



### Heating Degree Days (HDD)

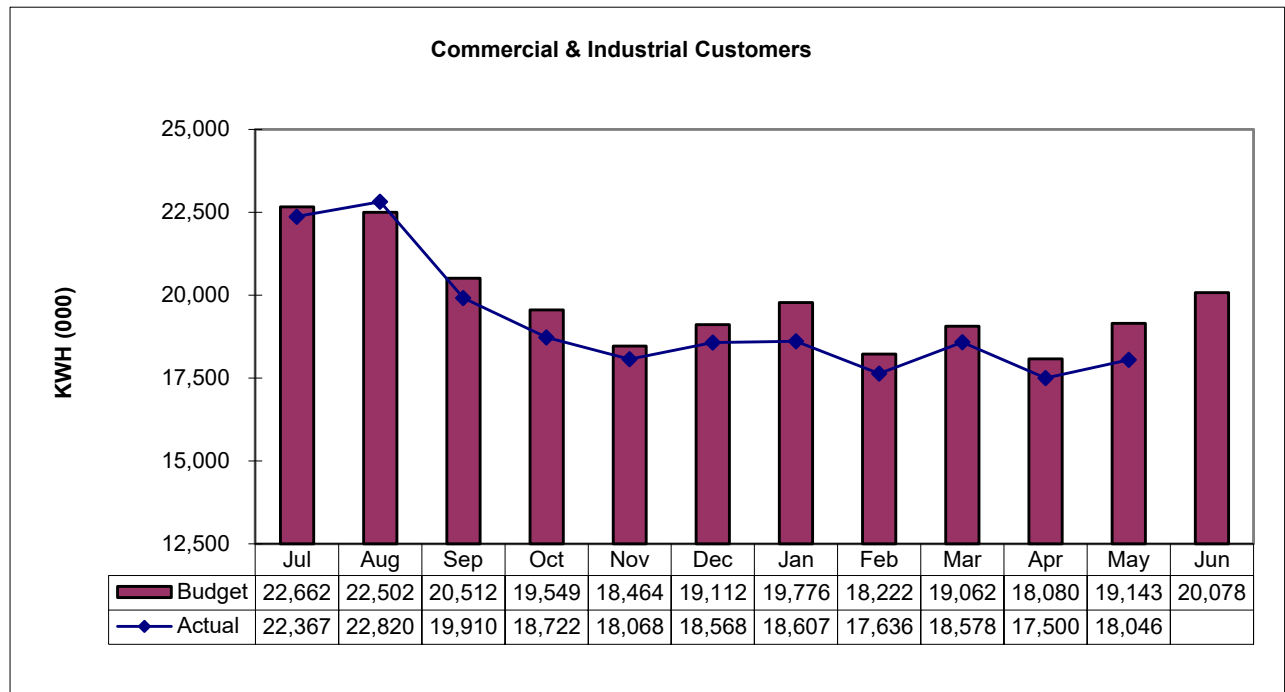
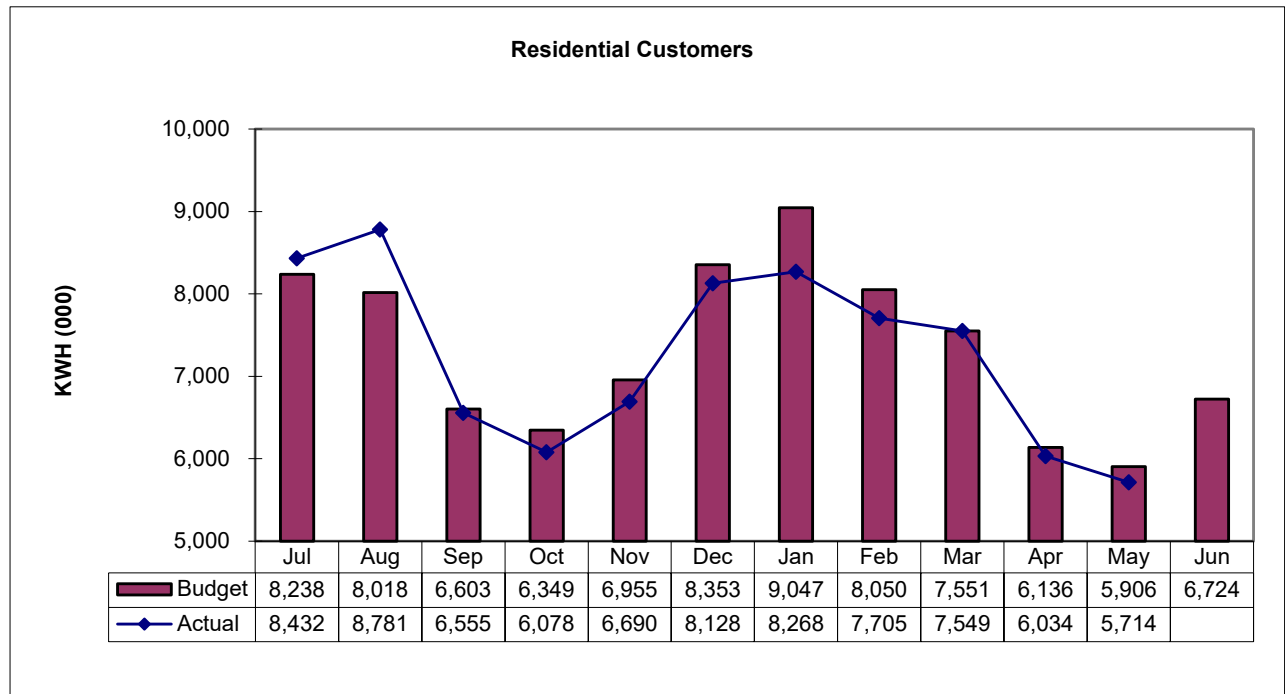


### Average Monthly Temperature

	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun
Budget	72	71	63	50	39	28	20	22	32	45	58	67
Actual	73	73	62	52	44	30	29	26	33	51	64	

**CDD/HDD definition per National Weather Service:** Degree days are based on the assumption that when the outside temperature is 65°F, we don't need heating or cooling to be comfortable. Degree days are the difference between the daily temperature mean (high temperature plus low temperature divided by two) and 65°F. If the temperature mean is above 65°F, we subtract 65 from the mean and the result is Cooling Degree Days. If the temperature mean is below 65°F, we subtract the mean from 65 and the result is Heating Degree Days.

**Burlington Electric Department  
Fiscal Year Ending June 30, 2023  
KWH Sales**



*Street Lighting is included with Commercial & Industrial Customers.*

**Net Power Supply Costs**  
**May - FY 2023**

	(\$000)						
	Current Month				Year-to-Date		
	Budget	Actual	Variance		Budget	Actual	Variance
<b>Expenses:</b>							
Fuel (p. 7)	\$644	\$149	\$495	(1)	\$8,972	\$7,857	\$1,115 (1)
Purchased Power (p.11)	1,472	1,681	(209)	(2)	10,641	15,858	(5,217) (2)
Transmission Fees - ISO	534	504	31	(3)	6,762	6,459	303 (3)
Transmission Fees - Velco	270	238	32	(4)	1,575	1,270	304 (4)
Transmission Fees - Other	69	68	2		685	803	(117) (5)
Total Expenses	2,989	2,640	349		28,635	32,247	(3,612)
<b>Revenues:</b>							
Renewable Energy Certificates - McNeil	1,013	49	(964)	(5)	4,299	3,571	(728)
Renewable Energy Certificates - Wind	942	404	(539)	(5)	3,110	3,018	(93)
Renewable Energy Certificates - Hydro	186	0	(186)	(5)	787	697	(90)
Renewable Energy Certificates - Other	29	191	162	(6)	188	185	(3)
Total Revenues	2,170	644	(1,526)	(5)	8,385	7,470	(915) (6)
Net Power Supply Costs	\$819	\$1,996	(\$1,177)		\$20,250	\$24,776	(\$4,526)
Load (MWh)	25,808	24,551	(1,257)		306,533	298,951	(7,582)
\$/MWh	\$31.74	\$81.29	\$49.55		\$66.06	\$82.88	\$16.82

**Current Month:**

- (1) See detail on page 7.
- (2) See detail on page 11.
- (3) ISO-NE Schedule 9 transmission rate below Budget.
- (4) BED's share of VELCO Common Charges under Budget.
- (5) Timing: REC sales Budgeted in May, completed in April.
- (6) Timing: REC sales Budgeted throughout year, completed in May.

**YTD:**

- (1) See detail on page 7.
- (2) See detail on page 11.
- (3) Peak Load and Transmission rates under Budget.
- (4) VELCO Common Charges and BED's share of Common Charges under Budget.
- (5) NYPA NYISO Transmission charges over Budget.
- (6) REC Sales under Budget due to lower McNeil and Winooski One production in calendar year 2022.

**Net Power Supply Costs**  
**May - FY 2023**

	(\$000)						
	Current Month				Year-to-Date		
	Budget	Actual	Variance		Budget	Actual	Variance
<u>FUEL:</u>							
McNeil:							
Fuel Consumed	422	29	393	(1)	6,355	5,878	477 (1)
Swanton Yard	41	50	(9)	(1)	517	507	9 (1)
Train Deliveries	84	4	80	(1)	1,045	858	188 (1)
Labor & Other Expenses	90	65	25	(2)	911	590	321 (2)
Total McNeil Fuel	637	149	488		8,827	7,832	995
Gas Turbine	7	0	7	(3)	145	25	121 (3)
Total Fuel	644	149	495		8,972	7,857	1,115

**Current Month:**

(1) McNeil production 91% under Budget. Wood Price per Ton 8% over Budget. (p. 9)

(2) Actual labor is based on tonnage consumed by McNeil; budgeted labor is based on personnel/days in the month, thus timing issues for comparative purposes.

(3) No GT Production.

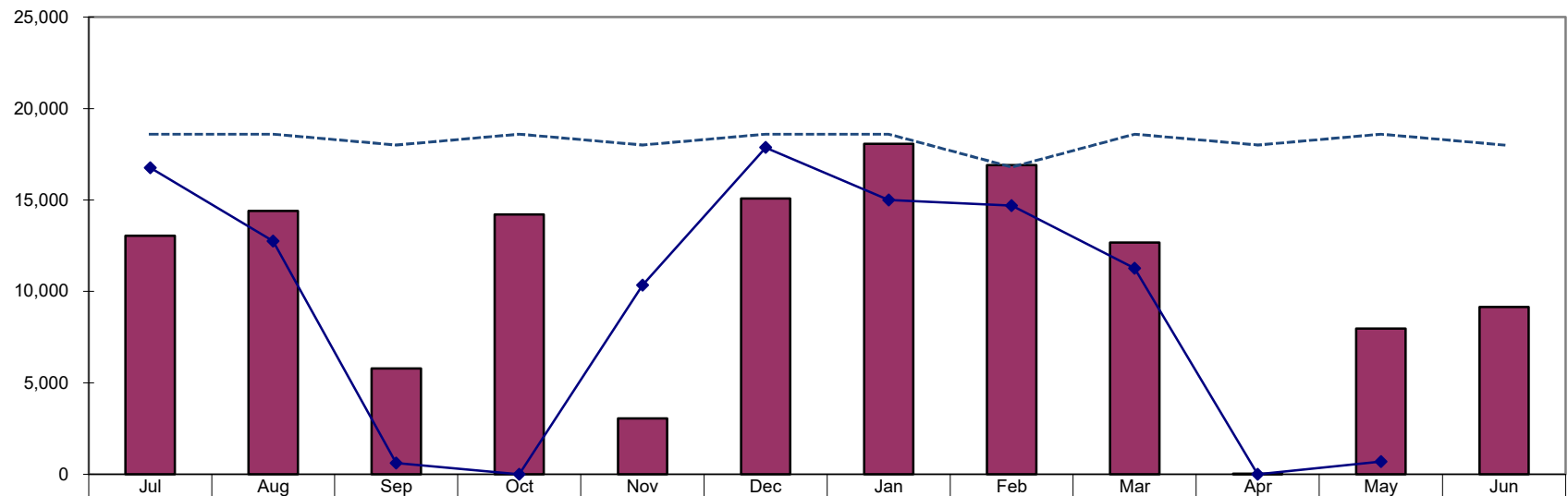
**YTD:**

(1) McNeil production 18% under Budget. Wood Price per Ton 15% over Budget. (p. 9)

(2) Actual labor is based on tonnage consumed by McNeil; budgeted labor is based on personnel/days in the month, thus timing issues for comparative purposes.

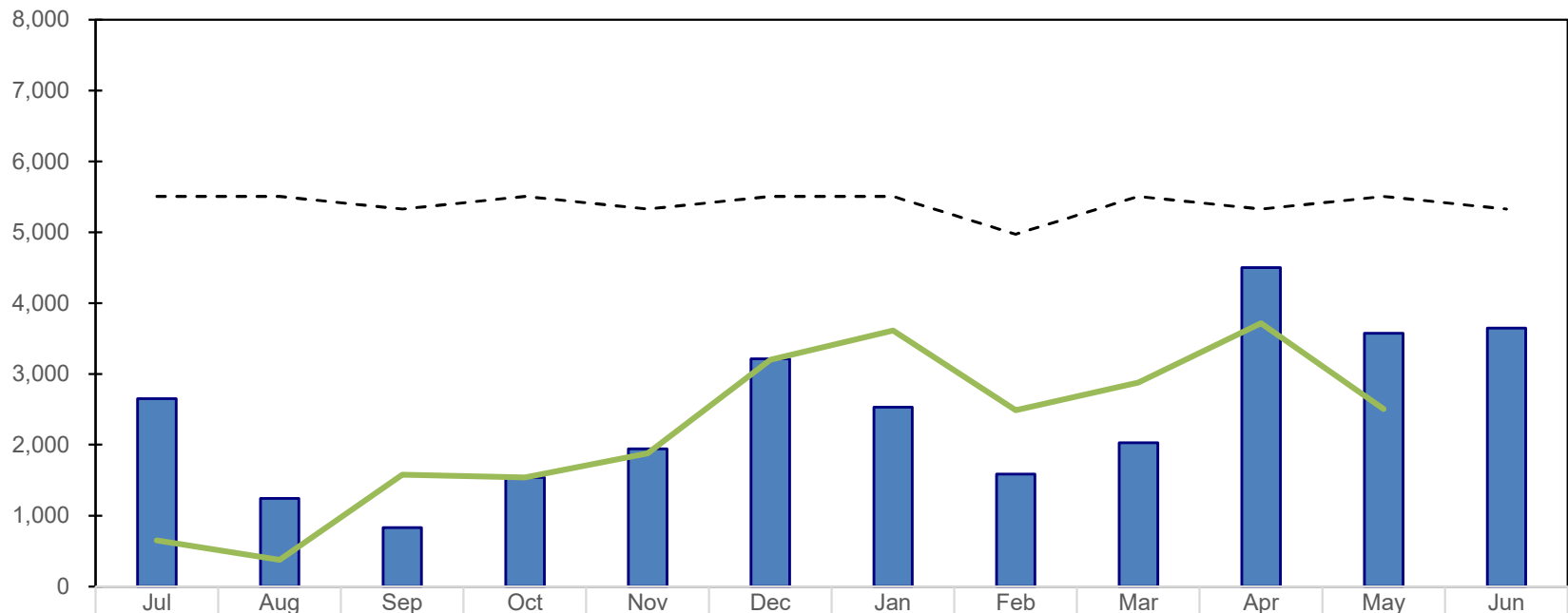
(3) GT produced 70 MWh (77% under Budget). GT outage started on 7/20/22. B Jet was brought online in the middle of March. A Jet continues to be offline, expected to be online in early July.

**Burlington Electric Department  
McNeil Plant - MWH Production (50%)  
FY 2023**



<span style="display:inline-block; width:15px; height:10px; background-color:maroon; border:1px solid black;"></span> Budget	13,047	14,395	5,792	14,209	3,057	15,088	18,082	16,912	12,671	23	7,963	9,152
<span style="display:inline-block; width:15px; height:1px; background-color:blue; border:1px solid black;"></span> ♦ Actual	16,763	12,756	619	0	10,354	17,868	14,993	14,691	11,263	0	680	
<span style="display:inline-block; width:15px; border-top:1px dashed blue; border:1px solid black;"></span> Maximum	18,600	18,600	18,000	18,600	18,000	18,600	18,600	16,800	18,600	18,000	18,600	18,000

**Burlington Electric Department  
Winooski One - MWH Production  
FY 2023**

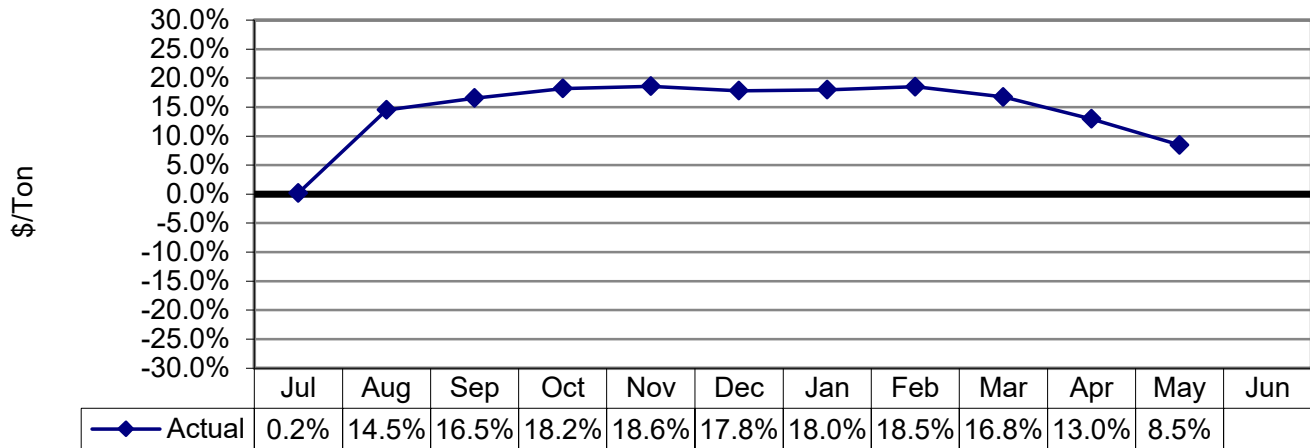


<span style="color: blue;">█</span> Budget	2,650	1,246	832	1,541	1,942	3,216	2,531	1,587	2,032	4,503	3,575	3,643
<span style="color: green;">—</span> Actual	651	376	1,578	1,541	1,878	3,197	3,609	2,488	2,878	3,717	2,505	
<span style="color: black;">---</span> Maximum	5,506	5,506	5,328	5,506	5,328	5,506	5,506	4,973	5,506	5,328	5,506	5,328

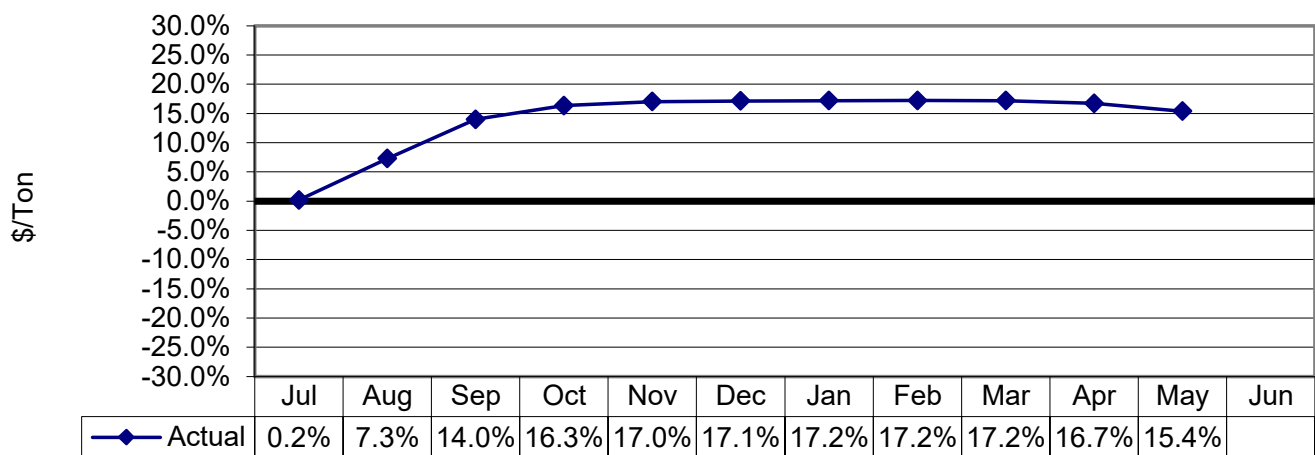


## Burlington Electric Department Fiscal Year 2023

### Woodchips Price Per Ton Monthly Variance



### Woodchips Price Per Ton Year-to-Date Variance



\* Wood only. Does not include other costs.

**Net Power Supply Costs  
May - FY 2023**

	(\$000)						
	Current Month				Year-to-Date		
	Budget	Actual	Variance		Budget	Actual	Variance
<b><u>PURCHASED POWER:</u></b>							
Non-Energy (capacity)	85	129	(43)	(1)	994	2,285	(1,291) (1)
<b>Energy:</b>							
Georgia Mountain Wind	263	226	37	(2)	2,941	2,976	(35) (2)
Hancock Wind	244	302	(58)	(3)	3,075	2,795	280 (3)
VT Wind	219	226	(7)		2,393	1,893	500 (4)
Hydro Quebec	293	293	(0)		3,011	3,011	(0)
Great River Hydro	176	176	0		1,882	1,969	(87) (5)
In City Solar Generators	89	119	(31)	(4)	743	782	(38) (6)
NYPA	6	7	(1)		68	77	(9)
ISO Exchange	(144)	100	(243)	(5)	(5,860)	(1,173)	(4,686) (7)
Velco Exchange	0	(0)	0		0	(3)	3
Total Energy	1,146	1,448	(302)		8,254	12,327	(4,074)
Ancillary Charges	(13)	(9)	(5)		31	198	(167) (8)
Miscellaneous	254	112	142	(6)	1,362	1,047	315 (9)
Total Purchased Power Expense	1,472	1,681	(209)		10,641	15,858	(5,217)

**Current Month:**

- (1) Includes \$38k Mystic Cost of Service not in Budget.
- (2) Production 14% under Budget.
- (3) Production 24% over Budget.
- (4) Solar Production over Budget.
- (5) Energy Prices under Budget. Production (McNeil (-91%) and Winooski (-30%)) under budget.
- (6) Timing: Budget includes May REC purchases.

**YTD:**

- (1) Includes \$1.3M for Mystic Cost of Service not in Budget.
- (2) Production 1% over Budget.
- (3) Production 9% under Budget.
- (4) Production 21% under Budget.
- (5) Includes REC purchases Budgeted under Miscellaneous.
- (6) Solar Production over Budget.
- (7) Energy Prices under Budget. Production (McNeil (-18%), Wind (-10%), and Winooski One (5%)) under budget.
- (8) Reflects loss of Forward Reserve Revenues due to GT outage.
- (9) Includes REC Adjustment Expense.

**Burlington Electric Department**  
**Operating and Maintenance Expense by Spending Category**  
**FY 2023 - May YTD**

	<b>Budget</b>	<b>Actual</b>	<b>Variance</b>	<b>% Variance</b>	<b>*</b>
Labor-Regular	8,032,744	7,366,924	665,820	8%	
Labor-Overtime	548,076	454,242	93,834	17%	a
Labor-Temporary	8,500	70,352	(61,852)	728%	b
Labor-Overhead	3,260,688	2,851,024	409,664	13%	c
Outside Services	2,348,774	2,067,079	281,695	12%	d
DSM	1,727,481	3,405,764	(1,678,283)	97%	e
Materials & Supplies	884,127	797,032	87,095	10%	
Insurance	683,857	684,455	(598)	0%	
A & G Clearing	(837,245)	(660,592)	(176,653)	21%	f
Other - RPS Compliance	600,189	513,345	86,844	14%	
Other	2,749,214	1,911,744	837,470	30%	g
<b>Operating and Maintenance Expense</b>	<b>20,006,405</b>	<b>19,461,369</b>	<b>545,036</b>	<b>3%</b>	

(a) Areas lower than budget include Customer Care (\$5,500), Distribution (\$28,600), System Operations (\$95,900) and Engineering & Technicians (\$6,400); offset by areas higher than planned include Finance & Accounting, \$13,000 and McNeil Plant, \$29,200.

(b) Budget assumed intern positions in Policy & Planning, \$8,500. Actual includes temporary help in System Operations, \$66,900 and Finance & Accounting, \$3,400.

(c) See page 13.

(d) Timing of items for McNeil outage & REC Broker Fees.

(e) Projects are driven almost entirely by customer decisions. The budget is based on information on specific projects or seasonal variations; otherwise the amount is spread evenly across the year. Actual includes Act 151 pilot programs and TEPF spending on the District Energy System engineering work.

(f) The credit for A&G ("Admin and General Expenses") charged to Capital projects was less than planned.

(g) Timing; areas that are less than budget including, Maintenance Contracts (\$108,000), Education & Training (\$92,100), Transportation Clearing (\$78,800) and Utilities (\$45,600).

**Burlington Electric Department  
Budget vs Actual Spending Analysis  
FY 2023 - May YTD**

Labor - Overhead	(000's)				
	Budget	Actual	Variance	%	
Pension	\$1,403	\$1,549	(\$146)	-10%	(a)
Medical Insurance	1,300	1,285	15	1%	(b)
Social Security Taxes	910	827	83	9%	(a)
Workers Compensation Ins.	346	312	33	10%	(b)
Dental Insurance	75	67	8	10%	(b)
Life Insurance	17	18	(1)	-4%	(b)
	<b>\$4,051</b>	<b>\$4,058</b>	<b>(\$7)</b>	<b>0%</b>	

<b>Rates Table:</b>		<b>Budget</b>
Pension		12.49%
Social Security		7.65%

(a) Function of labor cost. Actual includes monthly pension arbitration amortization, \$5,440.

Pension amount for the year provided by the City during budget development.

(b) Budget provided by the City during budget development.

**Net Income**  
**FY 2023 - May (\$000)**

		Current Month			Year - To - Date		
	Ref	Budget	Actual	Variance	Budget	Actual	Variance
<b>Operating Revenues</b>							
Sales to Customers	p.3	3,802	3,414	(388)	47,174	46,144	(1,030)
Other Revenues		283	180	(103)	3,223	4,678	1,456 (a)
Power Supply Revenues	p.6	2,170	644	(1,526)	8,385	7,470	(915)
Total Operating Revenues		<u>6,256</u>	<u>4,238</u>	<u>(2,017)</u>	<u>58,781</u>	<u>58,292</u>	<u>(489)</u>
<b>Operating Expenses</b>							
Fuel	p.6	644	149	495	8,972	7,857	1,115
Purchased Power	p.6	1,472	1,681	(209)	10,641	15,858	(5,217)
Transmission	p.6	873	810	63	9,022	8,532	490
Operating and Maintenance	p.12	1,816	1,459	358	20,006	19,461	545
Depreciation & Amortization		533	524	9	5,858	5,681	177
Revenue Taxes		52	40	12	544	534	10
Property Taxes Winooski One		43	40	3	476	445	31
Payment In Lieu of Taxes		196	183	14	2,159	1,976	182 (b)
Total Operating Expenses		<u>5,629</u>	<u>4,885</u>	<u>744</u>	<u>57,679</u>	<u>60,345</u>	<u>(2,666)</u>
<b>Other Income and Deductions</b>							
Interest/Investment Income		5	45	40	55	455	400
Dividends		367	368	1	4,024	4,032	8
Customer Contributions/Grant Proceeds		80	22	(59)	719	680	(39) (c)
Gain/(Loss) on Disp of Plant		0	(29)	(29)	(282)	(85)	197 (d)
Other		0	(24)	(24)	52	(100)	(152) (e)
Total Other Income & Deductions		<u>452</u>	<u>382</u>	<u>(70)</u>	<u>4,568</u>	<u>4,982</u>	<u>414</u>
<b>Interest Expense</b>		242	275	(33)	2,872	3,238	(366) (g)
<b>Net Income</b>		<u>836</u>	<u>(540)</u>	<u>(1,376)</u>	<u>2,798</u>	<u>(309)</u>	<u>(3,107)</u>

**Current Month:**

- (a) Energy Efficiency Program cost reimbursement was lower than planned, \$113,600.
- (b) Actual Payment in Lieu of Tax (PILOT) is less than budget assumption.
- (c) Budget assumed customer contributions for Champlain Pkwy, \$57,400 and other overhead/underground billable, \$22,800. Actual includes billable for Shelburne St Roundabout relocation, \$10,300 and Main St Great Streets, \$10,100. Also includes grant proceeds \$1,200.
- (d) Timing; retirements budgeted in August, December & February.
- (e) Timing of jobbing unfavorable \$21,700.
- (f) Revenue Bond 2022 actual interest higher than projected.

**Year - To - Date:**

- (a) Energy Efficiency Program cost reimbursement was higher than planned, \$1,433,200.
- (b) See current month.
- (c) Budget assumed customer contributions for Champlain Pkwy, \$516,300 and other overhead/underground billable, \$197,100. Actual includes prior year billable for UVM LCOM \$237,400, Champlain Pkwy \$138,700, University Place decorative lighting \$159,700, Shelburne St Roundabout relocation \$10,300, Main St Great Streets \$10,100 and other overhead/underground projects and grant proceeds.
- (d) Timing; retirements budgeted in August, December & February.
- (e) Timing of jobbing unfavorable, \$165,200.
- (g) Revenue Bond 2022 actual interest higher than projected.

**Burlington Electric Department  
Capital Projects - FY23**

	<b>\$000</b>			
	<b>Full Year Budget</b>	<b>Budget</b>	<b>May YTD Actual</b>	<b>Variance</b>
<b>McNeil (BED 50% Share)</b>				
ESP Mechanical Field Rebuild (312)	245	245	293	(49)
Boiler Grate Overhaul West	200	200	338	(138)
Routine Station Improvements	167	167	99	69
Continuous Emissions Monitoring Repl/Upgrade	146	146	14	132
Replacement Rail Cars	75	75	55	20 (a)
Switchyard 3321 Breaker Replacement	70	70		70
Turbine Control System Upgrade/Insurance (314)	49	49	30	19
A-Belt Belt Replacement (312)	30	30		30
Augers Replaced (312)	30	30		30
Demi/Service Water Pump	15	15		15
Safety Valve Replacements (312)	13	10		10
Shelving Footings	13	13	11	2
Station Tools & Tool Boxes	8	8	5	2
Rigging Equipment (316)	5	5		5
Other	11	6	11	(4) (b)
Total McNeil Plant	1,076	1,068	855	213

(a) Approved budget was for Replacement Rail Cars. Actual is for Trestle Wall Replacement.

(b) Budget includes energy efficiency improvements, equipment cameras, perimeter fence upgrade, portable radios upgrade and furniture replacement. Actual includes west grate emergency repairs, \$3,100, furniture replacement, \$1,100, backup boiler feed bpump, \$2,700 & perimeter fence upgrade, \$1,900.

<b>Hydro Production</b>	224	220	46	174 (a)
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(a) Timing of various projects including Control Room Fire Suppression, \$70,000, Turbine Painting, \$15,000 Stair replacement \$18,000 & Rake Hydraulic Pump replacement, \$40,000 deferred to future year.

<b>Gas Turbine</b>	338	336	867	(531) (a)
--------------------	-----	-----	-----	-----------

(a) Turbine repair higher than planned. Various items delayed to future year include roof, \$85,000, outlet bucket replacement, \$50,000 and painting outside, \$9,000.

<b>Other</b>				
Direct Current Fast Charger (new locations)	162	153	116	37
EV Charger Installation (Level 2)	39	37		37
Distributed Energy Resources	37	35		35
Policy & Planning Research & Dev	29	28	5	22
Total Other	267	253	122	132

<b>Transmission Plant</b>				
VT Transco Investment	632	632	634	(2)
Total Transmission Plant	632	632	634	(2)

**Burlington Electric Department  
Capital Projects - FY23**

	<b>\$000</b>			
	<b>Full Year Budget</b>	<b>Budget</b>	<b>May YTD Actual</b>	<b>Variance</b>
<b>Distribution Plant-General</b>				
<b>Aerial</b>				
Heineberg Rd Reconductor	186	186	129	56
Pole Inspection & Replacement	118	112	73	39
Ethan Allen Pkwy - Conv to 2ph P2942-2959	73	73	58	15
Replace Recloser 252R			39	(39)
Total Aerial	376	370	299	71
<b>Underground</b>				
Lyman Avenue Rebuild	669	669	647	22
2L5 Cable Replacement Pt3	573	573	701	(128)
Sunset Cliff Rebuild	455	455	313	142
1L2/2L5 Cable Replacement Pt1	294	294	367	(74)
2L5/2L2 Cable Replacement Pt2	223	223	157	66
Replace 322/323/324S (Main St and Univ Hts)	138	138	1	137 (a)
Appletree Point Rebuild (Electrical Work)	107	107	55	52
Edgemoor Drive Rebuild - Phase 3	92	92	88	4
Replace 724S/725S (Milot - College St)	71	71	47	24
Replace 910S/911S (Votey)	59	59	31	29
Replace Switch (303,307,308)			109	(109)
Replace Switch (756,757,758,730-Battery/Pearl)			164	(164)
Total Underground	2,680	2,680	2,680	(0)
(a) Moved to FY24.				
<b>Customer Driven/City Projects</b>				
Champlain Parkway	736	662	173	489
Champlain Parkway (CAFC)	(574)	(516)	(139)	(378)
UVM Athletic Facility	18	18	120	(101)
Shelburne St Roundabout Relocation			9	(9)
Shelburne St Roundabout Relocation (CAFC)			(10)	10
University Place Decorative Lighting			230	(230)
University Place Decorative Lighting (CAFC)			(160)	160
UVM LCOM Building			28	(28)
UVM LCOM Building (CAFC)			(237)	237 (a)
Main Street Great Streets			10	(10)
Main Street Great Streets (CAFC)			(10)	10
Total Underground	180	164	15	149

(a) Timing; prior year billable.

**Burlington Electric Department  
Capital Projects - FY23**

	<b>\$000</b>			
	<b>Full Year Budget</b>	<b>Budget</b>	<b>May YTD Actual</b>	<b>Variance</b>
<b>Other</b>				
Distribution Transformers	230	230	93	136
SCADA Field Device Upgrades	182	182	(5)	187 (a)
SCADA Network Switches Replacement	42	42	14	27
Communication Equipment Emergency Repair	29	29	4	25
SCADA Backup Server UPS Replacement	20	20		20
Metering CF-33 Toughbook	10	10		10
Other	0		17	(17)
Total Other	512	512	124	388
 Total Distribution Plant-General	 3,748	 3,726	 3,118	 608
 (a) Project cancelled this FY.				
<b>Distribution Plant - Blanket</b>				
Lighting	251	239	123	116
Lighting (Rebate)	(6)	(5)		(5)
Underground	347	309	327	(18)
Underground (CAFC)	(152)	(137)	(118)	(19)
Aerial	170	163	141	22
Aerial (CAFC)	(67)	(60)	(25)	(35)
Meters	92	90	46	43
Tools & Equipment - Distribution/Technicians	35	35	11	24
Replace Corroded Vista CT's/PT's	22	22	11	11
Substation Maintenance	16	16	7	9
Gas Detectors	4	4		4
Total Distribution Plant - Blanket	711	675	522	152
 Total Distribution Plant	 4,460	 4,401	 3,640	 761



**Burlington Electric Department  
Capital Projects - FY23**

	<b>\$000</b>				
	<b>Full Year Budget</b>	<b>Budget</b>	<b>May YTD Actual</b>	<b>Variance</b>	
<b>General Plant</b>					
Computer Equipment/Software	1,902	1,773	962	811	(a)
Vehicle Replacement	94	94	143	(49)	
Buildings & Grounds	120	120	94	26	(b)
Other	11	11	10	2	(c)
Total General Plant	2,127	1,998	1,208	790	
 (a) Budget includes IT Forward, \$1,306,000 and various other projects (desktop/laptop replacements, OpenWay upgrade, Pole Mount Routers and Virtualized Hardware Refresh). Actual includes IT Forward, \$758,900, Pole Mount Routers, \$122,400 and Desktop/Laptop replacements, \$45,800.					
(b) Timing of Fence for Solar Array, \$19,000.					
(c) Budget includes training yard material and AED Purchase. Actual is new Pitney Bowes postage machine and AED's. Material for training yard has been delayed.					
<b>Sub-Total Plant</b>	<u>\$9,123</u>	<u>\$8,908</u>	<u>\$7,373</u>	<u>\$1,535</u>	
Add: CAFC* reclass to "Other Income"	798	719	699	20	
<b>Total Plant</b>	<u><u>\$9,921</u></u>	<u><u>\$9,627</u></u>	<u><u>\$8,072</u></u>	<u><u>\$1,555</u></u>	

\* Customer Advances (Contributions) for Construction.

## Operating Cash - FY 2023 Monthly Ending Balance

