

# What Powers You

August 4<sup>th</sup>, 2023

Melanie Bachman, Esq.  
Executive Director  
Connecticut Siting Council  
10 Franklin Square  
New Britain, CT 06051

**RE: Petition No. 1278, Bloom Energy Corporation for a Declaratory Ruling for the Location and Construction of a 2,000-Kilowatt Fuel Cell Customer-Side Distributed Resource at 195 McDermott Road, North Haven, Connecticut – Request for Amendment**

Dear Attorney Bachman:

We are submitting an original and fifteen (15) copies of the above-captioned Petition for Amendment.

In the Petition, Bloom Energy Corporation (“Bloom”) requests the Connecticut Siting Council approve a modification of the existing Facility at the Medtronic Complex, located at 195 McDermott Road, North Haven, Connecticut (“Facility”). The proposed modification consists of the construction and operation of a 2,000-kilowatt fuel cell and associated equipment. Electricity generated by the Facility will benefit Medtronic’s operations, and any excess electricity will be exported to the electric grid. The Facility will be fueled by natural gas.

Should you have any questions, concerns, or require additional information, please contact me at (917) 803-4511.

Sincerely,  
Bloom Energy Corporation



Kristen Grillo  
**Senior Permitting Specialist | East Coast Field Office**  
Customer Installations Group | North America  
(917) 803-4511  
[Kristen.Grillo@bloomenergy.com](mailto:Kristen.Grillo@bloomenergy.com)



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**STATE OF CONNECTICUT  
CONNECTICUT SITING COUNCIL**

PETITION OF BLOOM ENERGY : PETITION NO. 1278  
CORPORATION FOR APPROVAL OF A :  
MODIFICATION TO THE APPROVED FUEL :  
CELL FACILITY AT THE MEDTRONIC :  
CAMPUS, NORTH HAVEN, CT : AUGUST 4, 2023

PETITION OF BLOOM ENERGY CORPORATION  
FOR AMENDMENT TO DECLARATORY RULING

**I. INTRODUCTION**

Pursuant to Conn. Gen. Stat. §§ 4-176 and 16-50k(a) and Conn. Agencies Regs. § 16-50j-38 et seq., Bloom Energy Corporation (“Bloom”) hereby requests that the Connecticut Siting Council (“Council”) approve a second amendment to the declaratory ruling in Petition No. 1278. The second amendment is requested to approve the construction, maintenance and operation of an additional fuel cell installation at 195 McDermott Road, North Haven (the “Property”), within the Medtronic complex.<sup>1</sup>

Conn. Gen. Stat. § 16-50k(a) provides that:

Notwithstanding the provisions of this chapter or title 16a, the council shall, in the exercise of its jurisdiction over the siting of generating facilities, approve by declaratory ruling ... (B) the construction or location of any fuel cell, unless the council finds a substantial adverse environmental effect, or of any customer-side distributed resources project or facility ... with a capacity of not more than sixty-five megawatts, as long as such project meets air and water quality standards of the Department of Energy and Environmental Projection....

The proposed fuel cell will be a customer-side distributed resources facility under 65 MW that complies with the air and water quality standards of the State of Connecticut Department of Energy and Environmental Projection (“DEEP”). Bloom submits that no Certificate is required

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<sup>1</sup> The Medtronic complex includes several parcels along McDermott Road, Quinnipiac Avenue and Middletown Avenue. Existing Bloom fuel cell installations are located on three of the parcels.

for the proposed Facility, as the installation would not have a substantial adverse environmental effect in the immediate vicinity of the Site or in the State of Connecticut.

## **II. BACKGROUND**

On February 16, 2017, the Council ruled that the construction, maintenance and operation of two fuel cell facilities totaling 500 kilowatts (“kW”) proposed by Bloom at 195 McDermott Road and 20 Middletown Avenue would not have a substantial environmental effect and, pursuant to Conn. Gen. Stat. § 16-50k, would not require a Certificate of Environmental Compatibility and Public Need (“Certificate”). *See* Petition No. 1278. On December 5, 2019, the Council approved an amendment to the 2017 ruling, determining that the addition of two 2000-kilowatt facilities at 195 McDermott Road and 86 Quinnipiac Avenue would meet the air and water quality standards of the Department of Energy and Environmental Protection (“DEEP”), would not have a substantial adverse environmental effect and also would not require a Certificate. *See* Petition No. 1278A.

The previously approved fuel cells have been installed and are operational. These existing fuel cells, together with the proposed fuel cell installation, together comprise the Site.

## **III. COMMUNICATIONS**

Correspondence and other communication regarding this petition should be directed to the following parties:

Kristen Grillo  
Bloom Energy Corporation  
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#### **IV. DISCUSSION**

Bloom will install a fuel cell consisting of seven (7) ES-5 Bloom Energy Server solid oxide fuel cells and associated equipment (the “Facility”) that will provide a total of 2,000 kilowatts (“kW”) (net) of power to the Site. *See* Exhibit 3. The Facility will be installed, maintained and operated by Bloom under a six-year power purchase agreement with Medtronic, Inc. owned by a third-party financing source. The proposed installation is part of Medtronic’s commitment to a goal of reducing carbon emissions to net zero in its operations, supply chain, and logistics by fiscal year 2045, and part of its continuing effort to utilize renewable energy sources at its North Haven complex.

##### **A. Project Description**

The Facility will be a 2,000-kW customer-side distributed resource consisting of seven (7) Bloom solid oxide fuel cell Energy Servers, five (5) ES5-2750US0501S-NASK10-0 and one (1) each model ES5-3000US0601S-NASK10-0 and ES5-3250US0601S-NASK10-0; and associated equipment. As shown on Exhibits 2 and 3, the fuel cell and associated equipment (utility cabinets, water deionizers, telemetry cabinets, and disconnect switches) will be installed in the same area as the existing fuel cells associated with 195 McDermott Road, adjacent to the 300-kW fuel cell and north of the 2,000-kW fuel cell.

Underground electrical and communication lines will be installed by Medtronic to points within a switchboard building northeast of the Facility. Connection to existing water service will be at the southwest corner of the Facility. The Facility will be fueled by natural gas supplied by Southern Connecticut Gas from existing service, with a point of connection north of the proposed installation. Exhibits 1 and 2 depict the Facility location; Exhibit 3 contains plans; Exhibit 4 contains photographs and equipment specifications.

Bloom has sized the system at 2,000 kW based on consultation with Medtronic's representatives and analysis of Medtronic's operational needs. The Facility will replace a portion of the average baseload of the manufacturing building at 195 McDermott Road with a Class I renewable energy source and improve reliability of electrical systems and equipment. The Facility has been sized to provide at least 41% of Medtronic's average annual baseload at that location. Exhibit 4. Electricity generated by the Facility will be consumed primarily at by Medtronic's operations and any excess electricity will be exported to the grid.

The operational life of the Facility is for the life of the six-year contract with Medtronic, Inc. At the conclusion of the six-year contract, Medtronic may renew the contract, return the Facility at no cost, or buy the Facility at a fair market value.

The interconnection application for the Facility was filed with United Illuminating in June, 2023. Approval is anticipated in September, 2024.

#### **B. Public Health and Safety**

The Facility will be installed in compliance with applicable building, plumbing, electrical, and fire codes. The Facility is enclosed, factory-assembled and tested prior to installation on the Site. Solid oxide media in the fuel cells are exchanged at roughly five-year intervals. Extensive hardware, software and operator safety control systems are utilized, and will be controlled from a Bloom Energy Remote Monitoring Control Center ("RMCC"). Internal sensors continuously monitor system operation and provide for system components to shut down if safety circuits detect a condition outside normal operating parameters; the RMCC operator can initiate an emergency shutdown if warranted. Bloom will provide Town of North Haven

(“Town”) Fire Department personnel and Medtronic’s operations/emergency personnel with an Emergency Response Plan and will offer to provide training.<sup>2</sup> Exhibit 6.

The Facility will be installed in accordance with NFPA 853.<sup>3</sup> The Facility does not burn natural gas; it is used in a chemical reaction to generate electricity, and is digested almost immediately upon entering the unit and is no longer combustible. Before commissioning, the fuel lines (pipes) are cleaned in accordance with Conn. Gen. Stat. Section 16-50ii<sup>4</sup>.

### **C. Existing and Proposed Environment**

#### **i. The Site**

The Site is located within one of several large parcels along McDermott Road, Quinnipiac Avenue and Middletown Avenue, which together constitute the Medtronic complex. The complex is developed with multiple manufacturing, office and operational buildings, and associated roadways and parking lots. The properties are zoned Light Industrial (IL-30).

Interstate 91 is to the west. Properties to the north, south and east are a mix of commercial and light industrial uses; beyond the immediately surrounding properties, residential development extends to the east and south.

The additional fuel cell installation will be located behind the building at 195 McDermott Road in the same area as the two existing fuel cells at that address. The Facility is designed to take advantage of existing and planned infrastructure. After construction, there will be no impact to vehicular or pedestrian traffic.

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<sup>2</sup> Because Bloom has existing fuel cell installations operating at the North Haven complex, Medtronic personnel are already familiar with operation and emergency procedures associated with the fuel cells.

<sup>3</sup> Standard for the Installation of Stationary Fuel Cell Power Systems, 2015 Edition

<sup>4</sup> Public Act 11-101, An Act Adopting Certain Safety Recommendations of the Thomas Commission

ii. Wildlife and Habitat

Based on a review of the publicly available Connecticut Department of Energy and Environmental Protection (“DEEP”) Natural Diversity Database (“NDDB”) June 2023 data and previous determinations, an NDDB area extends onto the eastern portion of the property. Exhibit 5. Eastern box turtle, a State Special Concern species, has been identified as present or potentially present in the area. An NDDB request for review, including a turtle protection plan, has been filed and is under review by DEEP.

The Site and the immediate surrounding vicinity are heavily developed with buildings and paved surfaces. The addition of the Facility within a limited area in proximity to multiple structures and areas heavily utilized by vehicles and pedestrians will have no effect on wildlife habitat.

iii. Wetlands and Watercourses

In connection with previous and ongoing development of the Medtronic complex, wetlands associated with the Little River have been delineated north of the proposed installation. The Facility is not within the wetlands, and will be located within an already developed area that includes lawn and paved surfaces. As described herein, appropriate erosion and sedimentation control measures will be employed during construction. Therefore, no direct or indirect effects on the mapped wetland or watercourse resources is anticipated.

iv. Flood Zones and Aquifer Protection Area

A review of the flood hazard mapping data from the Federal Emergency Management Agency’s (“FEMA”) National Flood Insurance Program (“NFIP”) shows the Facility would not be located in either a 100-year or 500-year flood zone. *See* Exhibit 5.

The Site was also reviewed for proximity to Aquifer Protection Areas. According to GIS data provided by DEEP, the Facility is approximately 5.25 miles southeast of the nearest Aquifer Protection Area.

A coastal boundary extends through the property in a north-south direction to the west of the proposed Facility. The proposed Facility is not within the coastal boundary and no coastal resources exist on the property. Therefore, there will be no impact on coastal resources as a result of development and operation of the proposed fuel cell installation.

v. Cultural Resources

The Site, including the Facility location, has been previously developed and disturbed. Construction and operation of the Facility is therefore not expected to have an adverse effect on cultural (archaeological and historical) resources.

**D. Environmental Effects and Mitigation**

i. Natural Gas Desulfurization Process

Sulfur compounds that are added to natural gas as an odorant are removed in the first step of electricity production in a Bloom Energy Server. Sulfur is separated from the natural gas by filtering in a specialized canister within the Energy Server (the “Desulf Unit”) that uses a copper catalyst to remove the sulfur. The Desulf Units are periodically removed and replaced. The spent units are transported to ShoreMet, L.L.C. (ShoreMet) in Indiana, where they are opened, the contents are removed and copper is used as an ingredient in various products. The Desulf Units are then cleaned, refilled, and sent back to the field for reuse. Handling and transportation are performed in accordance with hazardous waste restrictions.

ii. Water, Heat and Air Emissions

The construction and operation of the Facility will comply with DEEP’s air and water quality standards and will not have a substantial adverse environmental effect.

The Facility is designed to operate without water discharge under normal operating conditions. There are no connections or discharge points to the proposed Facility. The Facility uses no water after start-up, which requires a 1,680-gallon injection.



Heat generated by the proposed Facility is used internally to increase the electrical efficiency of the fuel cell system. As a result, there is no useful waste heat generated by the fuel cell. The minimal amount of thermal load present at the Site would preclude the efficient deployment of a combined heat and power application.

Conn. Agencies Regs. § 22a-174-42 exempts fuel cells from air permitting requirements. Accordingly, no permits, registrations, or applications are required based on the actual emissions from the Facility.<sup>5</sup> It should be noted, however, that Bloom Energy fuel cells do meet the emissions standards of Section 22a-174-42.

The Facility will also meet state criteria thresholds for all greenhouse gases defined in Section 22a-174-1(49). Table 1 lists thresholds set by the Low and Zero Emissions Renewable Energy Credit (LREC/ZREC) program<sup>6</sup>, and compares them to emissions generated from the proposed Facility.<sup>7</sup> By virtue of the non-combustion process the Bloom Energy fuel cells virtually eliminate NOx, SOx, CO, and VOCs from the energy production process. Similarly, there are no CH<sub>4</sub>, SF<sub>6</sub>, HFC or PFC emissions.

**Table 1: Connecticut Thresholds for Greenhouse Gases**

<b>Emission Type</b>	<b>Bloom Output</b>	<b>LREC allowance</b>
Nitrous Oxides (NOx)	<0.01 lbs/MWh	0.07 lbs/MWh
Carbon Monoxide (CO)	<0.05 lbs/MWh	0.10 lbs/MWh
Sulfur Oxides (SOx)	Negligible	Not Listed
Volatile Organic Compounds (VOCs)	<0.02 lbs/MWh	0.02 lbs/MWh
Carbon Dioxide (CO <sub>2</sub> ) <sup>8</sup>	679-833 lbs/MWh	Not Listed

The proposed Facility will ultimately displace less efficient fossil fueled marginal generation on the ISO New England system. Based upon the most recent US Environmental

<sup>5</sup> See Conn. Agencies Regs. §§ 22a-174-42(b) and (e).

<sup>6</sup> Sec. 16-244t

<sup>7</sup> This information is offered for comparison; however, the proposed Facility is not within the LREC/ZREC program.

<sup>8</sup> Carbon dioxide is measured at Bloom’s stated lifetime efficiency level of 53-60%.

Protection Agency (EPA) “eGrid” data (2021), the proposed Facility is expected to reduce carbon emissions by approximately 13.6% while essentially eliminating local air pollutants like NOx and SOx.

The Town’s Plan of Conservation and Development (“POCD”), effective September 1, 2017, continues the goal initially established in the 2005 POCD to move North Haven “toward a more environmentally sustainable future” and recognizes significant strides toward that goal. There are no specific references to fuel cells technology. The Town’s Zoning Regulations, amended through 2015, are silent as to renewable energy generally and fuel cells specifically.

### iii. Sound Levels

The Facility will comply with both State of Connecticut and City regulations for the control of noise.

Bloom retained Veneklasen Associates to evaluate the impact of noise from the proposed Facility on nearby properties. *See* Exhibit 7, Veneklasen Associates Property Line Noise Analysis (“Report”). As indicated in the Report, calculated noise levels at nearby receptors are within the limits established by the Town. They are also within the limits of State regulations.

Bloom typically performs project construction Monday through Friday, 7:00 a.m. to 5:00 p.m.

### iv. Visual Effects

The visual effect of the Facility will be primarily limited to portions of the Medtronic complex. In general, any visibility from beyond the complex would be obstructed by structures within the heavily developed area or by vegetation at the perimeter of the complex. The addition of the Facility is consistent with the existing development on the property.

## **E. Project Construction and Maintenance**

Bloom anticipates construction to start in the second quarter of 2025 with approximately four months of total construction time (4 - 6 weeks of site prep, 4 - 6 weeks of installation, and 4 – 6 weeks of commissioning).

Construction of the Facility would conform to best management practices for erosion and sedimentation (“E&S”) controls, including those provided for in the 2002 Connecticut Guidelines for Soil Erosion and Sediment Control or revisions adopted prior to that time. During construction, appropriate erosion and sedimentation (E&S) controls will be installed and areas of disturbance will be promptly stabilized in order to minimize the potential for soil erosion and the flow of sediments off site. Temporary E&S control measures will be maintained and inspected throughout construction to ensure their integrity and effectiveness. The temporary E&S control measures will remain in place until the work is complete and all disturbed areas have been stabilized. No effects to drainage patterns or stormwater discharges are anticipated. Due to the limited disturbance required for the Facility’s installation, no construction-related storm water permits will be required.

Soils that are generated during construction activities would not be stored or stockpiled inside of wetlands or adjacent to a watercourse, and appropriate E&S control measures would be employed and maintained for any temporary soil stockpiles. Any excavated soils compatible for reuse will be used as backfill in proximity to the same excavation area from where it originated. Any excess excavated soils not suitable for reuse would be trucked off-site and managed in accordance with applicable regulations. Rock, concrete and other debris would be removed and trucked off-site.

Areas affected by construction would be re-graded as practical and stabilized using revegetation or other measures before removing temporary E&S controls. Construction-related impacts will therefore be minimal.

If there is a default in the contract or the Facility is to be removed at the end of the contract, the Energy Server, associated equipment and components will be dismantled and removed and the site will be restored as nearly as practicable to its effective original condition.

## **V. NOTICE AND CONSULTATION**

Bloom has provided notice of this petition via certificate of mailing to abutting property owners and appropriate municipal officials and governmental agencies to whom notice is required to be given pursuant to Conn. Agencies Regs. § 16-50j-40(a). Lists of officials and abutting property owners, a copy of the notice letter and documentation of mailing are provided in Exhibit 8.

A representative of Bloom contacted Mr. Alan Fredricksen, Land Use Administrator for the Town of North Haven, by email on July 17, 2023 and provided plans for the proposed Facility for review and comment. Neither Mr. Fredricksen nor any other municipal official has provided comments or questions to date. *See* Exhibit 9.

## **VI. CONCLUSION**

Under Conn. Gen. Stat. § 16-50k(a), the Council is required to approve by declaratory ruling the construction or location of a customer-side distributed resources project or facility with a capacity of not more than 65 MW, as long as the facility meets DEEP air and water quality standards. The proposed Facility, individually and in combination with previously approved fuel cell installations at the Medtronic complex, meets each of these criteria.

The proposed project will replace a portion of the Site's baseload with a Class I renewable energy source, assist in achieving the State's sustainability goals, and improve reliability of electrical systems and equipment.

Bloom submits that no Certificate is required for the proposed Facility, as the installation would not have a substantial adverse environmental effect in the immediate vicinity of the Site or in the State of Connecticut. Bloom therefore respectfully requests that the Council approve the proposed modification to the existing Facility and amend its Declaratory Ruling in Petition No. 1278 and previous amendment in Petition No. 1278A.

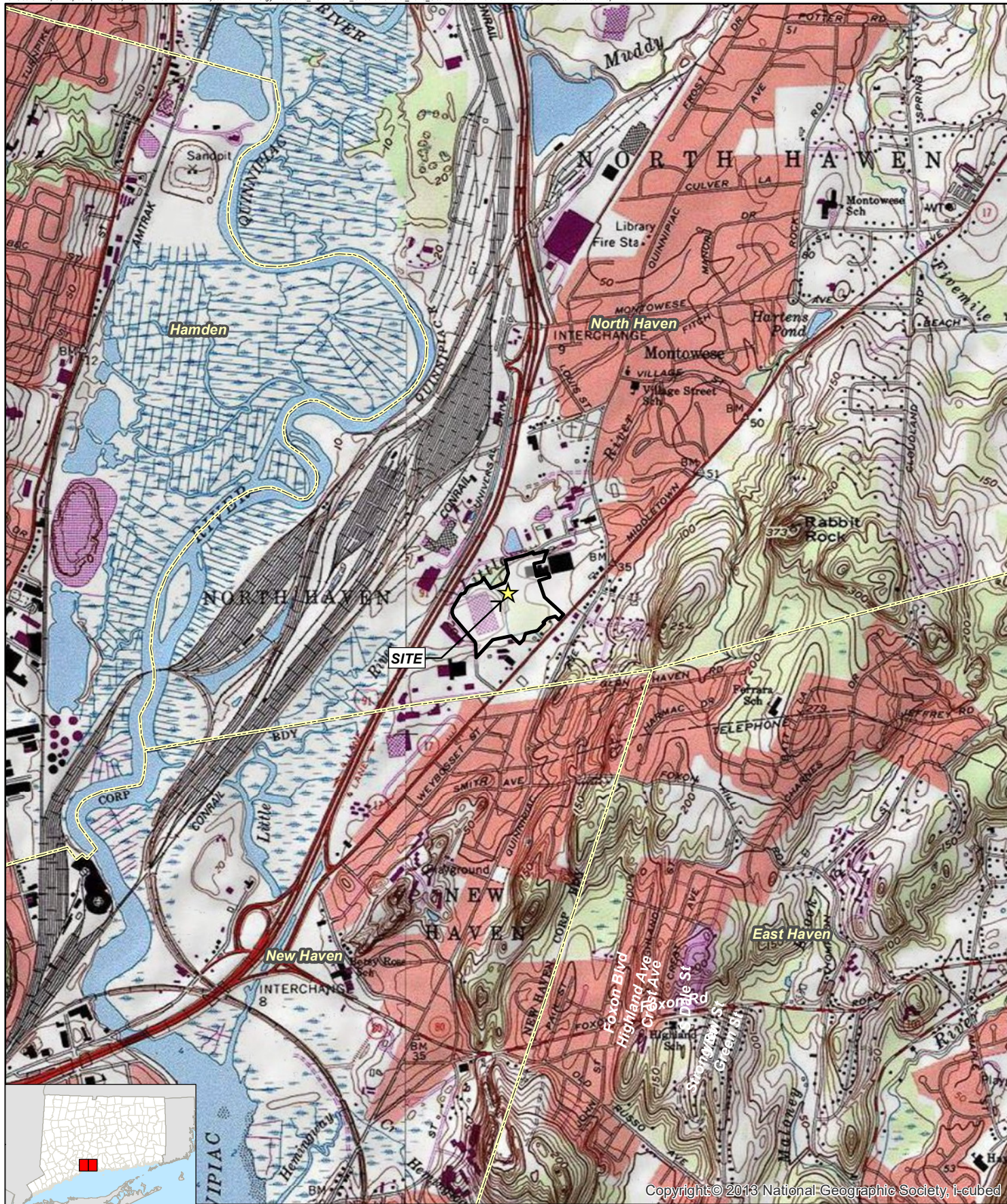
Respectfully submitted,

Bloom Energy Corporation

By: 




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# Exhibit 1

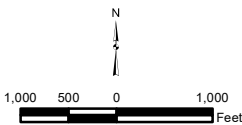


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**Legend**

-  Site
-  Property
-  Municipal Boundary (CTDEEP)

**Map Notes:**  
 Base Map Source: USGS 7.5 Minute Topographic Quadrangle Map: Branford, CT (1984) and New Haven, CT (1984)  
 Map Scale: 1:24,000  
 Map Date: July 2023



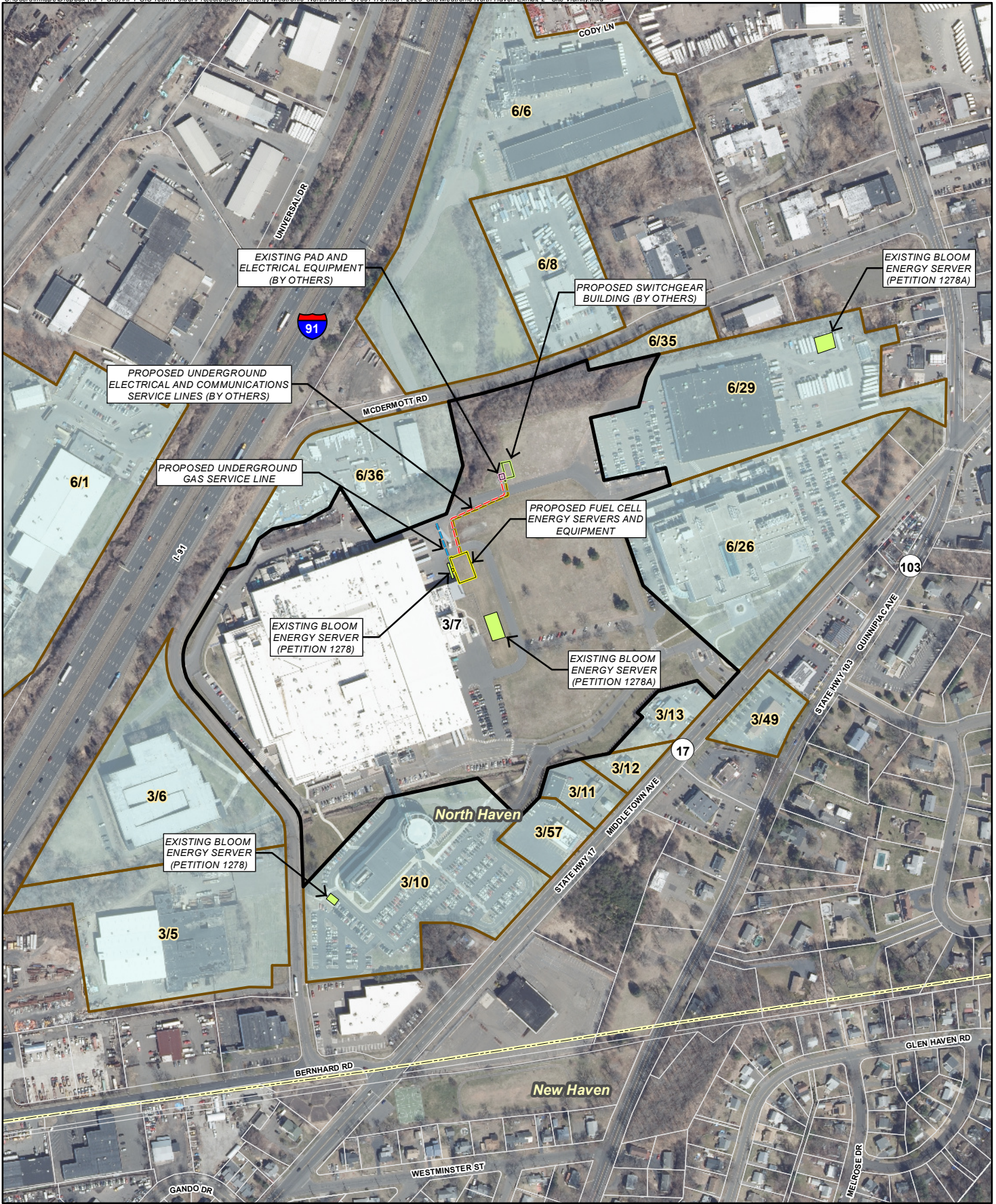
**Exhibit 1  
 Site Location Map**

Proposed Bloom Energy Facility  
 Medtronic, Inc.  
 195 McDermott Road  
 North Haven, Connecticut



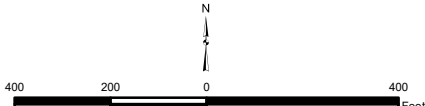
## Exhibit 2





- Legend**
- Proposed Energy Servers
  - Property
  - Abutting Property
  - Approximate Assessor Parcel Boundary
  - Proposed Electrical Service
  - Proposed Gas Service
  - Proposed Communication Service
  - Existing Equipment (By Others)
  - Proposed Equipment (By Others)
  - Municipal Boundary
  - Existing Bloom Energy Servers

**Map Notes:**  
 Base Map Source: CTECO 2019 Aerial Photograph  
 Map Scale: 1 inch = 400 feet  
 Map Date: August 2023

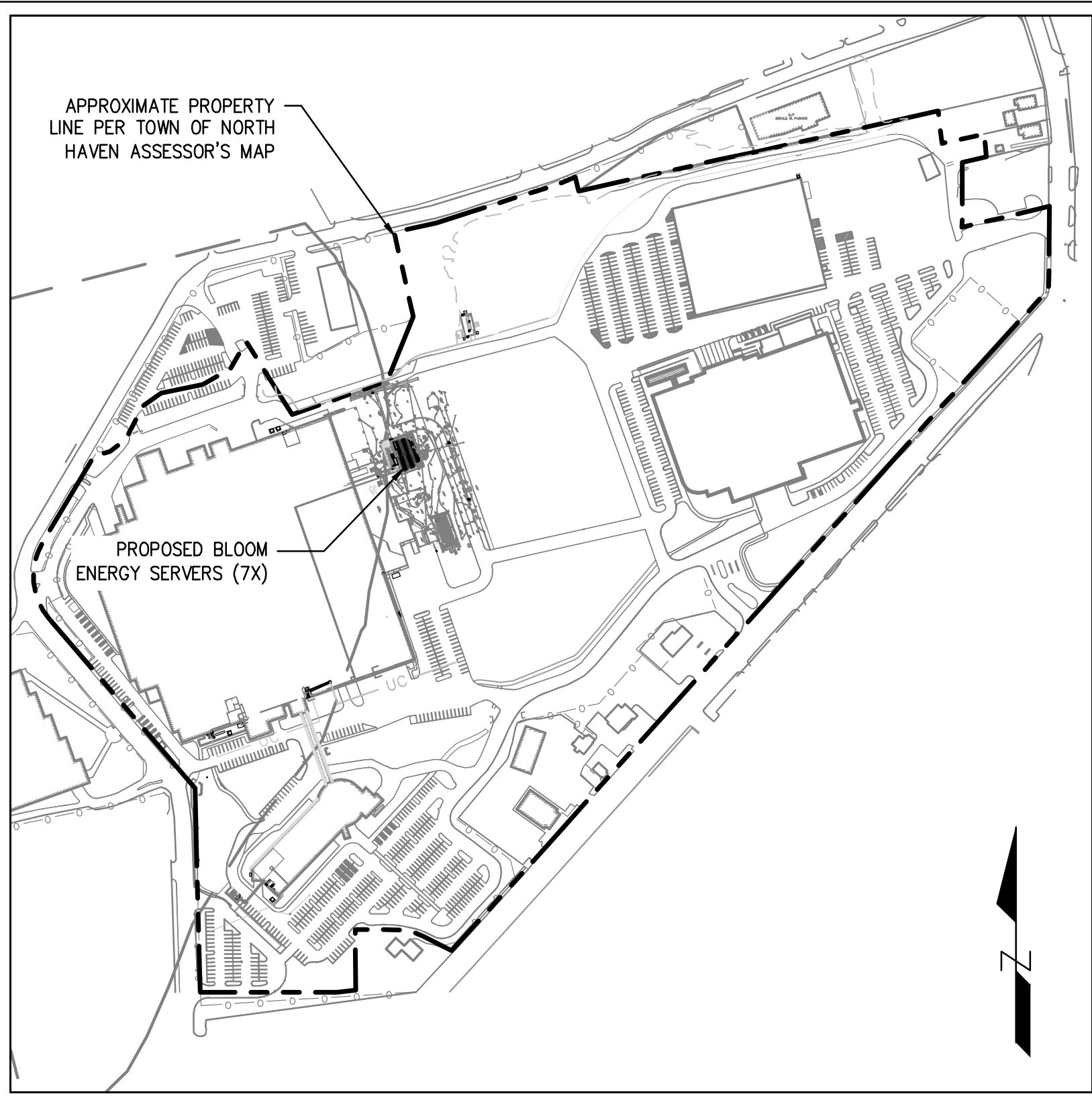


## Exhibit 2 Site Vicinity

Proposed Bloom Energy Facility  
 Medtronic, Inc.  
 195 McDermott Road  
 North Haven, Connecticut

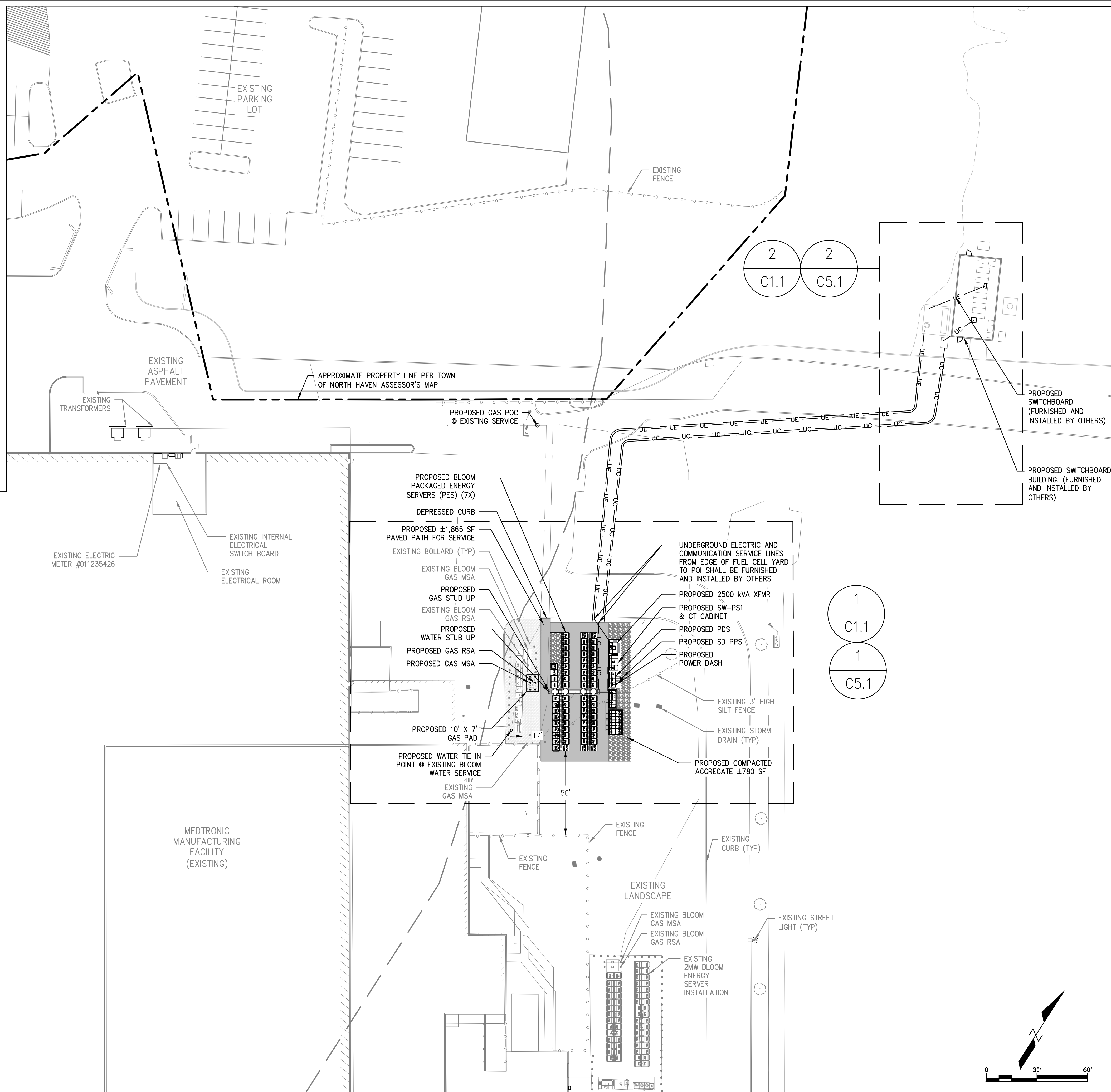


## Exhibit 3



**KEY PLAN**  
SCALE: NTS

1  
G1.1



**GENERAL SITE PLAN**  
SCALE: 1" = 30'

2  
G1.1

**PRELIMINARY  
PLANS FOR  
CSC REVIEW  
ONLY**

CUSTOMER SITE

MEDTRONIC, INC.  
195 MCDERMOTT ROAD  
NORTH HAVEN, CT 06473



**Medtronic**

RELEASE HISTORY

REV	ISSUE PURPOSE	DATE
-	INITIAL RELEASE	02/02/2023

DESIGNED BY ANTHONY VIGNOLO	REVIEWED BY SASHA SCARLAT
DRAWN BY SHIVANAND ANNIGERI	APPROVED BY CARSON TURNER

SHEET TITLE

GENERAL  
SITE PLAN

DRAWING NUMBER

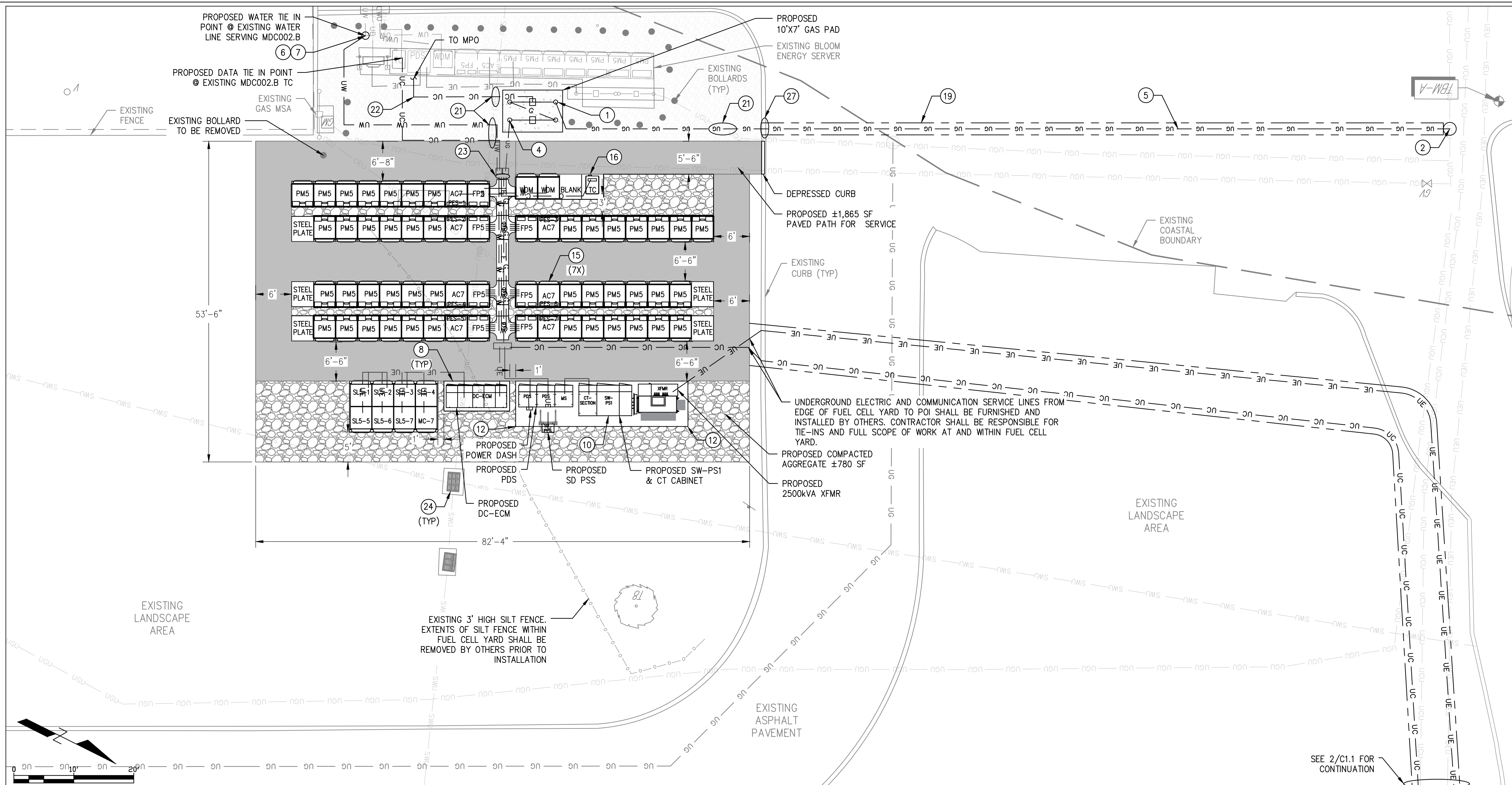
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BLOOM ENERGY DOCUMENT NUMBER

DOC-1015218

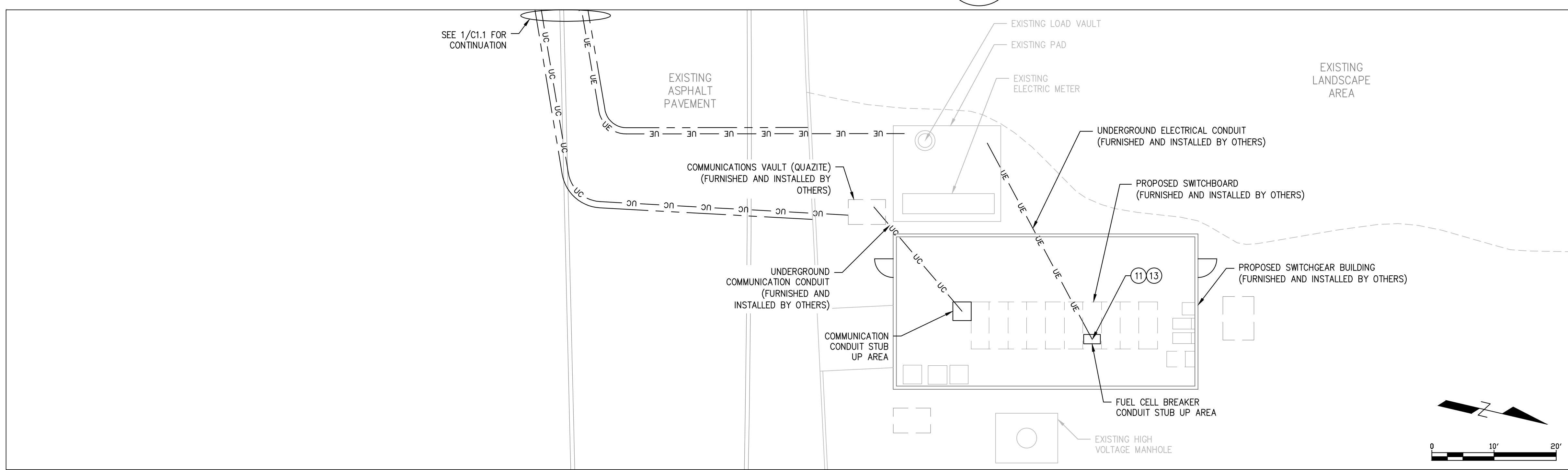
THIS DRAWING IS 24" X 36" AT FULL SIZE

SITE ID: MDC002.B2 SHEET 03 OF 09



UTILITY SITE PLAN  
SCALE: 1" = 10'

1  
C1.1



UTILITY SITE PLAN  
SCALE: 1" = 10'

2  
C1.1

GENERAL NOTES

- CLEAN AND PRIME ALL WALL MOUNTED PIPING AND CONDUIT. PIPING AND CONDUIT SHALL BE PAINTED WITH EXTERIOR GRADE PAINT TO MATCH EXISTING.
- CONDUITS AND PIPES MOUNTED TO BUILDING WALL SHALL BE SUPPORTED AS PER LOCAL CODE, RUN AT HEIGHT ABOVE DOORWAYS, AND STAND OFF WALL TO AVOID EXISTING CONDUITS AND PIPES.
- SEE BLOOM ENERGY PRODUCT INSTALLATION DRAWINGS FOR UTILITY CONNECTIONS TO ANCILLARY EQUIPMENT AND ENERGY SERVER.
- PRIOR TO LANDING THE PACKAGED ENERGY SERVER, CONTRACTOR SHALL CONFIRM EXISTING GRADING IN INSTALL AREA IS MAXIMUM 2% SLOPE ACROSS THE ENERGY SERVER INSTALLATION AREA AND MAXIMUM 5% SLOPE WITHIN THE SERVICE AREA. THE CONTRACTOR SHALL INSTALL SHIM PLATES IF AND WHERE NECESSARY. CONTRACTOR SHALL FIELD VERIFY IF SHIM PLATES ARE REQUIRED AND PROVIDE DIRECTIVE TO THE ENGINEER OF RECORD ACCORDINGLY WHERE THERE ARE GAPS BETWEEN THE EXISTING ASPHALT AND BOTTOM OF STEEL SKID. SEE PACKAGED ENERGY SERVER SKID SHIM DETAIL FOR ADDITIONAL INFORMATION.

REFERENCE SHEET NOTES

- UTILITY SHALL FURNISH AND INSTALL GAS METER & REGULATOR ASSEMBLY WITH SHUT-OFF VALVE. CONTRACTOR SHALL FURNISH AND INSTALL PAD DETAILS AND PAD REINFORCEMENT, INCLUDING SHOP DRAWING DETAILS, PAD SIZE, REBAR LAYOUT, IF REQUIRED BY THE UTILITY COMPANY. THE CONTRACTOR SHALL COORDINATE ALL CONNECTIONS WITH GAS UTILITY.
- UTILITY SHALL FURNISH AND INSTALL UNDERGROUND GAS SERVICE TAP. UTILITY SHALL PERFORM THE ENTIRE INSTALLATION FROM POINT OF CONNECTION TO THE PROPOSED GAS METER. CONTRACTOR SHALL COORDINATE GAS PIPE SIZING AND INSTALLATION REQUIREMENT WITH UTILITY.
- FURNISH AND INSTALL PRIVATE GAS REGULATOR SET ASSEMBLY FOR BLOOM ENERGY SEVER WITH SHUT-OFF VALVE. REFER TO GAS RISER DETAIL FOR ADDITIONAL REQUIREMENTS.
- FURNISH AND INSTALL GAS PIPE. REFER TO GAS RISER DETAIL FOR ADDITIONAL REQUIREMENTS.
- TAP EXISTING WATER LINE AT NEAREST ACCESSIBLE LOCATION IN BUILDING AS SHOWN WITH A LOCAL SHUT-OFF VALVE. IF INSTALLING A LOCAL BACKFLOW PREVENTION DEVICE PLEASE ENSURE THAT A CHECKVALVE IS ALSO INSTALLED. REFER TO DOMESTIC WATER CONNECTION DETAIL FOR ADDITIONAL REQUIREMENTS.
- FURNISH AND INSTALL WATER PIPE. REFER TO WATER RISER DETAIL FOR ADDITIONAL REQUIREMENTS.
- CONTRACTOR SHALL REPLACE EXISTING STORM DRAIN PIPE UNDER SYSTEM WITH DUCTILE IRON PIPE AND MATCH EXISTING SIZE EXTENDING A MINIMUM 4' BEYOND SYSTEM.
- EXISTING UTILITY ELECTRIC METER. REFER TO ELECTRICAL SINGLE LINE DIAGRAM FOR ADDITIONAL REQUIREMENTS.
- BLOOM ENERGY SHALL FURNISH AND CONTRACTOR SHALL INSTALL DISCONNECT SWITCH. MOUNT DISCONNECT SWITCH TO THE WALL PER MANUFACTURER AND UTILITY SPECIFICATIONS.
- ELECTRICAL FEEDERS SHALL BE TERMINATED BY OTHERS. REFER TO ELECTRICAL SINGLE LINE DIAGRAM FOR ADDITIONAL INFORMATION.
- CONTRACTOR SHALL FURNISH AND INSTALL TWO GROUNDING RODS PLACED A MINIMUM OF 6' APART. REFER TO ELECTRICAL SINGLE LINE DIAGRAM FOR ADDITIONAL REQUIREMENTS.
- ELECTRICAL FEEDERS SHALL BE FURNISHED AND INSTALLED BY OTHERS. REFER TO ELECTRICAL SINGLE LINE DIAGRAM FOR ADDITIONAL INFORMATION.
- BLOOM ENERGY SERVER. REFER TO BLOOM STANDARD INSTALLATION DRAWING SET FOR ADDITIONAL ENERGY SERVER DETAILS.
- FACTORY WIRE ENERGY SERVER EMERGENCY POWER-OFF SWITCH (EPO).
- CONTRACTOR SHALL SAWCUT TRENCH FOR UNDERGROUND UTILITIES IN THIS LOCATION AND HAND DIG TRENCHES WHERE THEY CROSS EXISTING UTILITIES. REFER TO UNDERGROUND/TRENCH CONDUIT AND PIPING DETAIL FOR ADDITIONAL REQUIREMENTS.
- PROTECT EXISTING UNDERGROUND UTILITY LINES FROM DAMAGE WHEN CROSSING WITH NEW UNDERGROUND UTILITIES. CONTRACTOR SHALL BE RESPONSIBLE FOR REPAIR OR REPLACEMENT OF ANY DAMAGED LINES.
- CONTRACTOR FURNISH AND INSTALL CONDUIT AND CONDUCTOR FROM PROPOSED UTILITY GAS MSA TO CUSTOMER MPOE FOR UTILITY BILLING. REFER TO BLOOM ENERGY PRODUCT INSTALLATION DRAWINGS FOR CONNECTION REQUIREMENTS.
- CONTRACTOR SHALL TRANSITION ALL ABOVEGROUND LINES TO UNDERGROUND TOWARD ANCILLARY EQUIPMENT. ABOVE GROUND UTILITIES SHALL BE PROTECTED AS NECESSARY, THEN ROUTED UNDERGROUND TO EQUIPMENT STUB-UP LOCATIONS PER MECHANICAL DETAIL.
- FURNISH AND INSTALL "DANDY SACK" OR APPROVED EQUAL WITH OUTFLOW PORTS AT STORM DRAIN INLET. REFER TO EROSION CONTROL DETAIL FOR ADDITIONAL REQUIREMENTS.
- CONTRACTOR SHALL UNDER-CUT EXISTING CURB FOR TRENCHING UTILITY LINES AND BACKFILL WITH CONCRETE SLURRY. IF CURB IS DAMAGED, REPAIR TO MATCH EXISTING.
- CONTRACTOR SHALL REMOVE AND REPLACE CONCRETE SIDEWALK TO THE NEAREST JOINT AS REQUIRED TO COMPLETE THE WORK. REFER TO CONCRETE SIDEWALK DETAIL FOR ADDITIONAL REQUIREMENTS.

EXISTING UTILITY NOTE:  
THE LOCATION OF EXISTING UTILITIES IS SHOWN FOR THE CONTRACTOR'S REFERENCE. EXACT LOCATION, DEPTH, AND SIZE OF ALL EXISTING UTILITIES IS NOT KNOWN. CONTRACTOR SHALL ASSUME RESPONSIBILITY FOR ALL EXISTING UTILITIES NOT SHOWN ON THESE DRAWINGS. CONTRACTOR TO FIELD VERIFY LOCATION OF EXISTING UNDERGROUND UTILITIES AND PROTECT THE EXISTING UNDERGROUND LINES FROM DAMAGE WHEN CROSSING WITH NEW UNDERGROUND UTILITIES. THE CONTRACTOR SHALL BE RESPONSIBLE FOR REPAIR OR REPLACEMENT OF ANY DAMAGED LINES. THE CONTRACTOR SHALL NOTIFY THE ENGINEER IMMEDIATELY IF ANY FIELD CONDITIONS ENCOUNTERED DIFFER FROM THOSE REPRESENTED HEREON. SUCH CONDITIONS COULD RENDER THE DESIGNS HERON INAPPROPRIATE AND MAY REQUIRE ADJUSTMENTS TO AVOID CONFLICTS.



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t: (408) 543-1500

PRELIMINARY  
PLANS FOR  
CSC REVIEW  
ONLY

CUSTOMER SITE  
MEDTRONIC, INC.  
195 MCDERMOTT ROAD  
NORTH HAVEN, CT 06473



RELEASE HISTORY		
REV	ISSUE PURPOSE	DATE
-	INITIAL RELEASE	06/26/2023

DESIGNED BY ANTHONY VIGNOLO	REVIEWED BY SASHA SCARLAT
DRAWN BY SHIVANAND ANNIGERI	APPROVED BY CARSON TURNER

SHEET TITLE  
UTILITY  
SITE PLAN

DRAWING NUMBER  
C1.1

BLOOM ENERGY DOCUMENT NUMBER  
DOC-1015218

THIS DRAWING IS 24" X 36" AT FULL SIZE  
SITE ID: MDC002.B2 SHEET 04 OF 09

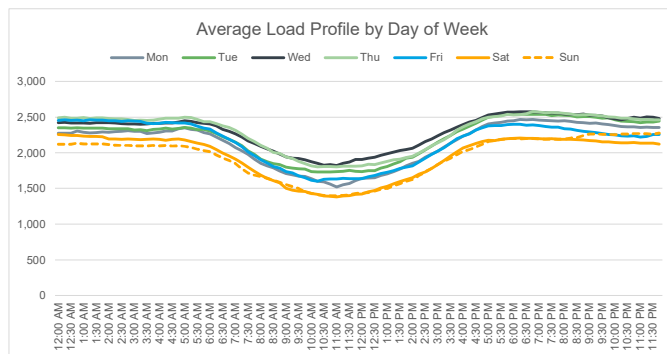
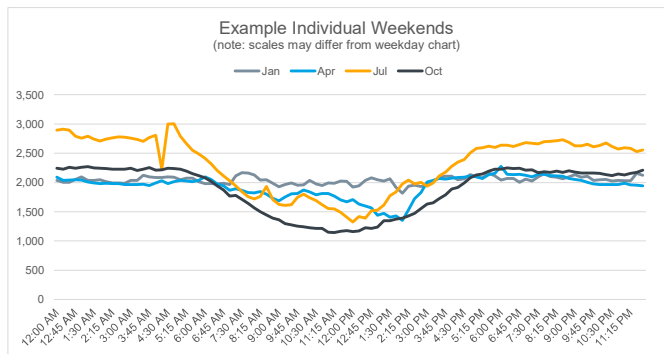
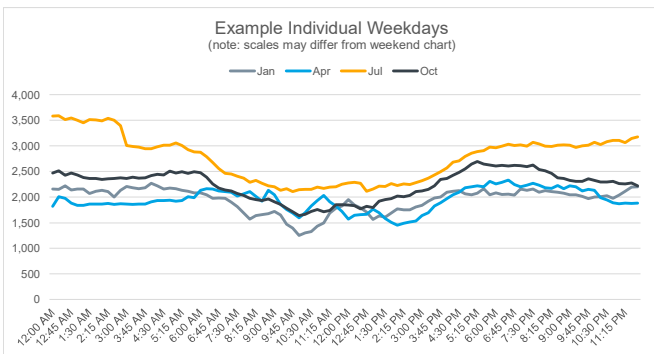
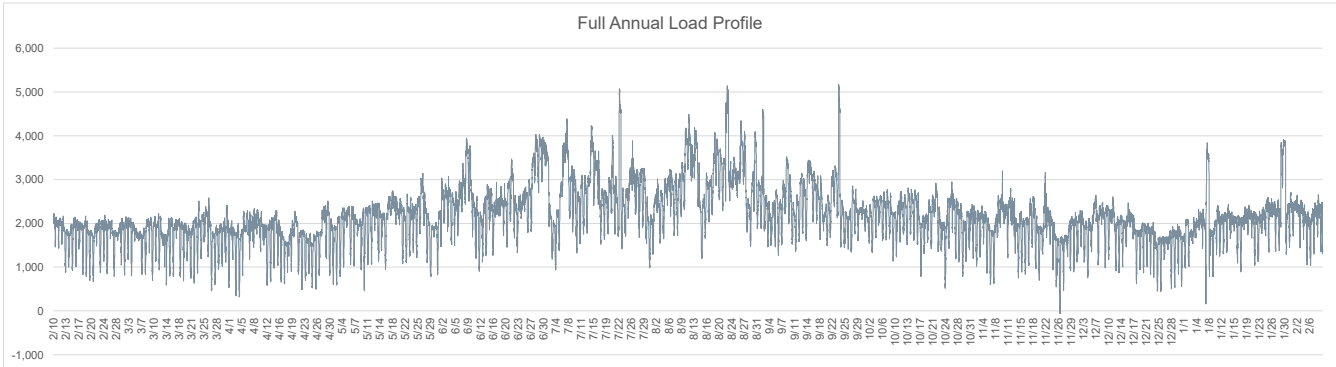
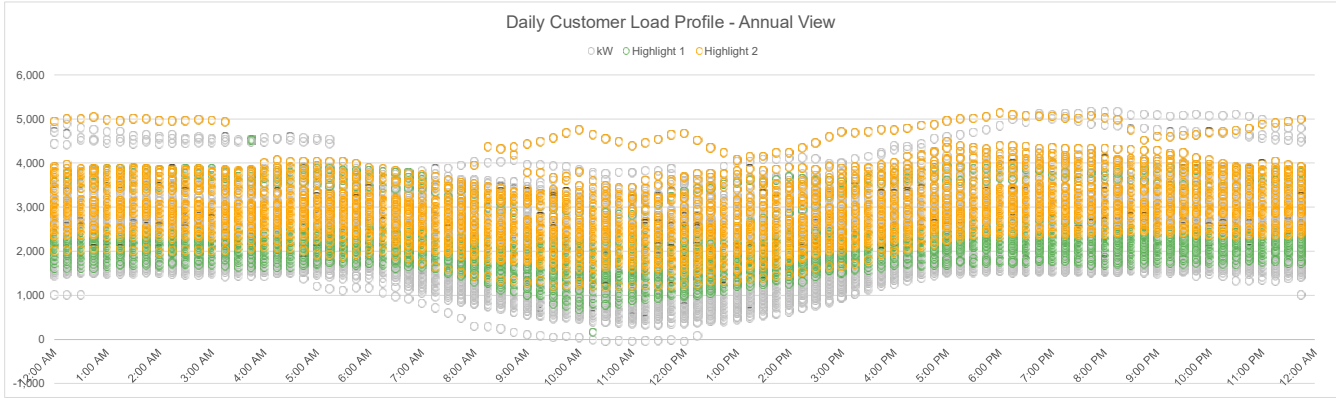
## Exhibit 4

SITE DETAILS	
Utility Tariff	CT - UI GST-S
Customer Name	Medtronic
Site Name or Address	Acct: 1000001859866
Utility Account Number	
Meter Number	
<b>NOTES</b>	
[Notes here]	

SIZING SUMMARY	
Total Days of Complete, Non-Zero Data	365
Annual Load Factor	41%
Total Customer Usage	18,769,124 kWh
Average 15-Min kW	2,143 kW
Average Peak Demand	3,582 kW
<b>Absolute Minimum kW (non-zero)</b>	<b>-51 kW</b>
<b>Estimated Average Baseload</b>	<b>2,050 kW</b>
<b>Proposed System Size</b>	<b>2,000 kW</b>
<b>Estimated Resulting Net Metering</b>	<b>6.83%</b>

Medtronic - Acct: 1000001859866 (Acct : Meter ) - New Sizing Tool

MONTH	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Highlight Color (0/1/2)	1	0	0	0	0	0	0	2	0	0	0	0



## Energy Server 5.5

Always On, Clean Energy  
Using Patented Solid Oxide  
Fuel Cell Technology



The Energy Server 5 provides combustion-free electric power with these benefits



### Clean

Our systems produce near zero criteria pollutants (NOx, SOx, and particulate matter) and far fewer carbon emissions than legacy technologies.



### Reliable

Bloom Energy Servers are designed around a modular architecture of simple repeating elements. This enables us to generate power 24 x 7 x 365 and can be configured to eliminate the need for traditional backup power equipment.



### Resilient

Our system operates at very high availability due to its fault-tolerant design and use of the robust natural gas pipeline system. Bloom Energy Servers have survived extreme weather events and other incidences and have continued providing power to our customers.



### Simple Installation and Maintenance

Our Energy Servers are 'plug and play' and have been designed in compliance with a variety of safety standards. Bloom Energy manages all aspects of installation, operation and maintenance of the systems.

## Energy Server 5.5

## Technical Highlights (E55-2750US0501S-NASK10-0)

### Outputs

Nameplate power output (net AC)	275kW
Load output (net AC)	275kW
Electrical connection	480V, 3-phase, 60Hz

### Inputs

Fuels	Natural gas
Input fuel pressure	12-18 psig (15 psig nominal)12-18 psig (15 psig nominal)Natural gas
Water	None during normal operation

### Efficiency

Cumulative electrical efficiency (LHV net AC) <sup>1</sup>	65-53%
Heat rate (HHV)	5,811-7,127 Btu/kWh

### Emissions<sup>2</sup>

NOx	0.0017 lbs/MWh
SOx	Negligible
CO	0.034 lbs/MWh
VOCs	0.0159 lbs/MWh
CO <sub>2</sub> @ stated efficiency	679-833 lbs/MWh on natural gas; carbon neutral on directed biogas

### Physical Attributes and Environment

Weight	12 tons
Dimensions (variable layouts)	14'4" x 8'8" x 7'0" or 28'8" x 4'4" x 6'9"
Temperature range	-20° to 45° C
Humidity	0%-100%
Seismic vibration	IBC site class D
Location	Outdoor
Noise	<70 dBA @ 6 feet

### Codes and Standards

Complies with Rule 21 interconnection and IEEE1547 standards

Exempt from CA Air District permitting; meets stringent CARB 2007 emissions standards

An Energy Server is a Stationary Fuel Cell Power System. It is Listed by Underwriters Laboratories, Inc. (UL) as a 'Stationary Fuel Cell Power System' to ANSI/CSA FC1-2014 under UL Category IRGZ and UL File Number MH45102.

### Additional Notes

Access to a secure website to monitor system performance & environmental benefits

Remotely managed and monitored by Bloom Energy

Capable of emergency stop based on input from the site

<sup>1</sup> 65% LHV efficiency verified by ASME PTC 50 Fuel Cell Power Systems Performance Test

<sup>2</sup> NOx and CO measured per CARB Method 100, VOCs measured as hexane by SCAQMD Method 25.3

### About Bloom Energy

Bloom Energy's mission is to make reliable, clean energy affordable for everyone in the world. The company's product, the Bloom Energy Server, delivers highly reliable and resilient, Always On electric power that is clean and sustainable. Bloom's customers include twenty-five of the Fortune 100 companies and leaders in cloud services and data centers, healthcare, retail, financial services, utilities and many other industries.

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Using Patented Solid Oxide  
Fuel Cell Technology



The Energy Server 5 provides combustion-free electric power with these benefits



### Clean

Our systems produce near zero criteria pollutants (NOx, SOx, and particulate matter) and far fewer carbon emissions than legacy technologies.



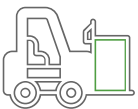
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Our Energy Servers are 'plug and play' and have been designed in compliance with a variety of safety standards. Bloom Energy manages all aspects of installation, operation and maintenance of the systems.

## Energy Server 5.5

## Technical Highlights (ES5-3000US0601S-NASK10-0)

## Outputs

Nameplate power output (net AC)	300kW
Load output (net AC)	300kW
Electrical connection	480V, 3-phase, 60Hz

## Inputs

Fuels	Natural gas
Input fuel pressure	12-18 psig (15 psig nominal)
Water	None during normal operation

## Efficiency

Cumulative electrical efficiency (LHV net AC) <sup>1</sup>	65-53%
Heat rate (HHV)	5,811-7,127 Btu/kWh

Emissions<sup>2</sup>

NOx	0.0017 lbs/MWh
SOx	Negligible
CO	0.012 lbs/MWh
VOCs	0.01 lbs/MWh
CO <sub>2</sub> @ stated efficiency	679-833 lbs/MWh on natural gas; carbon neutral on directed biogas

## Physical Attributes and Environment

Weight	15.9 tons
Dimensions (L x W x H)	17'11" x 8'8" x 7'0" or 32'3" x 4'4" x 6'9"
Temperature range	-20° to 45° C
Humidity	0%-100%
Seismic vibration	IBC site class D
Location	Outdoor
Noise	<70 dBA @ 6 feet

## Codes and Standards

Complies with Rule 21 interconnection and IEEE1547 standards

Exempt from CA Air District permitting; meets stringent CARB 2007 emissions standards

An Energy Server is a Stationary Fuel Cell Power System. It is Listed by Underwriters Laboratories, Inc. (UL) as a 'Stationary Fuel Cell Power System' to ANSI/CSA FC1-2014 under UL Category IRGZ and UL File Number MH45102.

## Additional Notes

Access to a secure website to monitor system performance & environmental benefits

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<sup>1</sup> 65% LHV efficiency verified by ASME PTC 50 Fuel Cell Power Systems Performance Test

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Fuel Cell Technology



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## Energy Server 5.5

## Technical Highlights (E55-3250US0601S-NASK10-0)

### Outputs

Nameplate power output (net AC)	325kW
Load output (net AC)	325kW
Electrical connection	480V, 3-phase, 60Hz

### Inputs

Fuels	Natural gas
Input fuel pressure	12-18 psig (15 psig nominal)12-18 psig (15 psig nominal)Natural gas
Water	None during normal operation

### Efficiency

Cumulative electrical efficiency (LHV net AC) <sup>1</sup>	65-53%
Heat rate (HHV)	5,811-7,127 Btu/kWh

### Emissions<sup>2</sup>

NOx	0.0017 lbs/MWh
SOx	Negligible
CO	0.034 lbs/MWh
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CO <sub>2</sub> @ stated efficiency	679-833 lbs/MWh on natural gas; carbon neutral on directed biogas

### Physical Attributes and Environment

Weight	14.1 tons
Dimensions (variable layouts)	17'11" x 8'8" x 7'0" or 32'3" x 4'4" x 6'9"
Temperature range	-20° to 45° C
Humidity	0%-100%
Seismic vibration	IBC site class D
Location	Outdoor
Noise	<70 dBA @ 6 feet

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Looking north to location of proposed fuel cell installation



Looking east to location of proposed installation

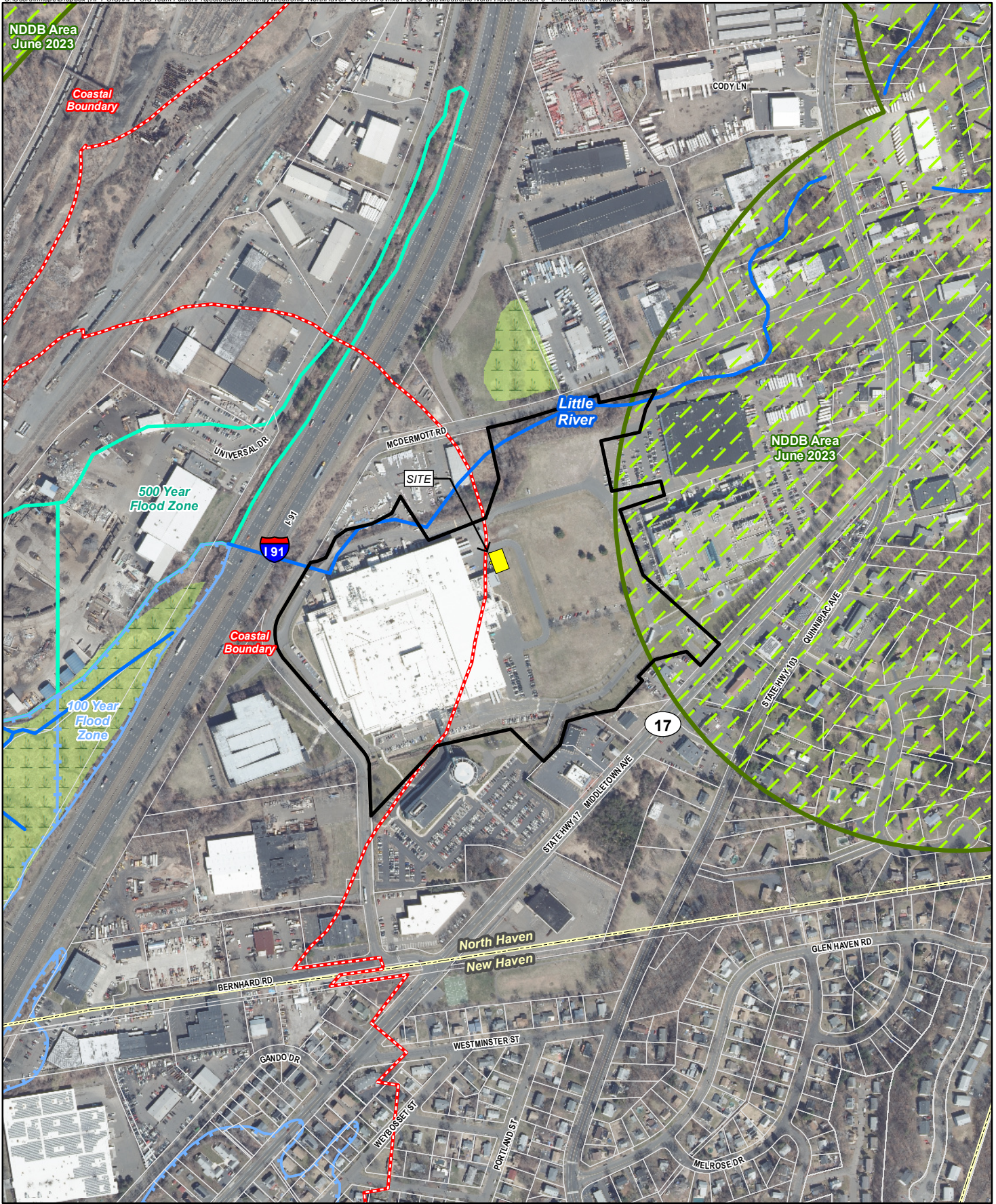


Looking toward location of proposed installation

## Exhibit 5

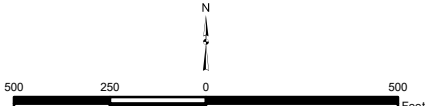


NDDB Area  
June 2023



- Legend**
- Property
  - Site
  - CTDEEP Watercourse
  - CTDEEP Natural Diversity Database (updated June 2023)
  - CTDEEP Critical Habitat (Oct 2019)
  - CTDEEP Wetlands
  - FEMA 100-Year Flood Zone
  - FEMA 500-Year Flood Zone
  - Floodway
  - CTDEEP Coastal Boundary
  - Approximate Assessor Parcel Boundary
  - Municipal Boundary

**Map Notes:**  
 Not All Legend Items May Be Located Within Map Extent  
 Base Map Source: CTECO 2019 Aerial Photograph  
 Map Scale: 1 inch = 500 feet  
 Map Date: July 2023



**Exhibit 5  
 Environmental Resources**  
 Proposed Bloom Energy Facility  
 Medtronic, Inc.  
 195 McDermott Road  
 North Haven, Connecticut



## Exhibit 6



*Fire Prevention and Emergency Planning –  
Grid Parallel*

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Bloom Energy Corporation, 1299 Orleans Drive, Sunnyvale, CA 94089 USA

## Table of Contents

1. Fire Prevention and Emergency Planning Overview
2. Fuel Cell Installation Safety Features
3. Emergency Notification Procedures
4. Fire and Smoke Procedures
5. Medical Emergency Procedures
6. Materials Release Procedures
7. Natural Disasters and Severe Weather
  - 7.1 Earthquake
  - 7.2 Flood
8. Utility Outage
9. Good Housekeeping and Maintenance
  - 9.1 Good Housekeeping
  - 9.2 Maintenance
10. Training

## 1. FIRE PREVENTION AND EMERGENCY PLANNING OVERVIEW

---

The following document is provided only as a guide to assist you in complying with national and local codes and requirements, as well as to provide other helpful information. It is not intended to supersede the requirements of any standard. You should review the standards for particular requirements that are applicable to your individual situation, and make adjustments to this program that are specific to your company. You will need to add information relevant to your facility in order to develop an effective, comprehensive program.

## 2. FUEL CELL SYSTEM INSTALLATION SAFETY FEATURES

---

The fuel cell system has redundant safety features and in-system checks to ensure that the system will not harm certified technicians or bystanders near the unit. While the actual fuel cells operate at high temperatures, these components do not move, and are contained within many layers of insulation. During normal operation, the unit is cool to the touch and operates quietly.

The fuel cell system is controlled electronically and has internal sensors that continuously measure system operation. If safety circuits detect a condition outside normal operating parameters, the fuel supply is stopped and individual system components are automatically shut down. A Bloom Energy Remote Monitoring and Control Center (RMCC) operator can also remotely initiate any emergency sequence. An Emergency Stop alarm condition initiates an automatic shutdown sequence that puts the fuel cell system into —safe modell and causes it to stop exporting power. If you have questions about any of these safety features, please contact Bloom Energy.

**If you have to shut down your fuel cell system right away**—for example, in case of a building fire or electrical hazard—three shutoff controls are installed at your facility external to the system. The locations of these three controls should be known to your facilities manager before operation, and should be noted on your facility diagram that you created with your Bloom Energy account manager. The three shutoffs are the **EPO button**, the **electrical disconnect**, and the **natural gas shutoff valve**.

- An **Emergency Power Off (EPO) Button** cuts all power to all systems and stops them from exporting power to your building. All natural gas flow is also stopped within the systems. (The EPO button is on the front/side of the EDM, if an EDM is installed.) Lift the protective cover and break the glass seal that covers the button with the attached hammer. After the glass seal is broken, the shutdown sequence will automatically begin.



Figure 1: Emergency Power Off Button

- An **electrical disconnect** manually disconnects systems from the grid if needed. Pressing the EPO button should already stop any power transmission, but it does not hurt the systems to also open this disconnect if you believe it is needed. The location of this disconnect will vary, however it is typically located near the point of interconnection where the wires from the fuel cell installation meet the facility's electrical framework. This may be inside your facility's electrical room, or if the fuel cell installation is near the electrical room, it may be found within the switchgear that Bloom Energy installs. This location of this disconnect is shown on the Site Map (see below) and is labeled "(name of electrical utility) Lockable Visible Generator Disconnect Switch".



Figure 2: Electrical Disconnect

- A **manual natural gas valve** shuts down all natural gas to the system. If the valve operator is perpendicular to the pipe, the valve is shut. If it is parallel with the pipe, the valve is open.



Figure 3: Manual Natural Gas Valve

**Site map:**

- An overhead site map showing the location of all safety features will be posted throughout the fuel cell installation
- Electronic copies are available to you for use in your site planning

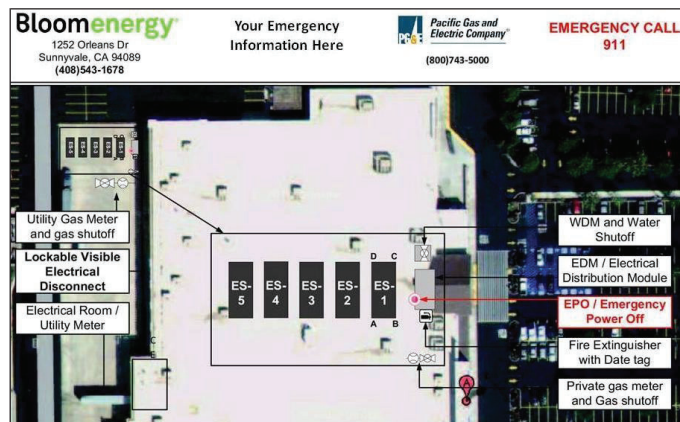


Figure 4: Sample Site Map

**Manual controls:**

- Clearly marked emergency stop button labeled —Fuel Cell Emergency Shut Down located at site
- Two manual fuel shutoff valves outside the system, and two isolation valves inside the system

**Fire hazard mitigation:**

- System is plumbed directly to utility-provided natural gas
- If system input gas pressure is compromised, a pressure switch triggers an emergency system shutdown and fuel input is isolated
- System does not use fuel compressors or pumps
- System has virtually no stored fuel (internal capacity is < 5 scf)



**Electrical hazard and mitigation:**

- System operates at 480V
- Signs inside the system warn of the risk of electric shock
- System has backfeed protection
- System inverter prevents grid backfeed during a power outage

**Mechanical hazard and mitigation:**

- Finger/hand guard protection is provided on all fans
- All moving parts are located behind secured doors

**Material hazard mitigation:**

- Desulfurizer bed (to remove fuel impurities) are fully enclosed
- Maintained and serviced by licensed vendors

### **3. EMERGENCY NOTIFICATION PROCEDURES**

---

**Life-Threatening Emergencies**

To report life-threatening emergencies, immediately call:

<b>Fire:</b>	<b>911</b>
<b>Ambulance:</b>	<b>911</b>
<b>Police:</b>	<b>911</b>

Conditions that require automatic emergency notification include:

- Unconscious Victim
- Seizure
- Major Trauma
- Chest Pains
- Difficulty Breathing
- Flames

**Non-Life-Threatening Emergencies**

For non-life-threatening emergencies, report the incident to the local safety control center.

When you report an emergency, give the following information:

- Exact nature of the emergency (describe as clearly and accurately as possible).
- Exact location (i.e., address, building, floor, area, department, etc.).
- Telephone number from which you are calling.
- Your full name.
- **Do not hang up**, as additional information may be needed.

To assist in any subsequent investigation or determination of corrective actions, it is recommended to record the following items as close to the incident time as possible:

- Summary of any violation

- Identification of responsible parties
- Identification of victims and witnesses
- Description of evidence
- Description of general conditions
- Description of any vehicles involved
- Narratives from witnesses
- Any photographs

## 4. FIRE OR SMOKE PROCEDURES

---

This section describes the procedures involving a fire or smoke. A major fire is one that requires the use of more than one fire extinguisher or takes more than one minute to extinguish.

If you discover a fire or smoke:

1. Activate the nearest fire alarm if not activated already.
2. Activate the fuel cell Emergency Stop if possible.
3. Shut off the fuel cell installation natural gas line if possible.
4. If the fire is small and does not pose an immediate risk to personal safety, you may attempt to extinguish it with a portable fire extinguisher **only if trained to do so**.
5. Avoid using water on electrical fires.
6. Report every fire, regardless of size, immediately. Smoke or the smell of smoke should be reported.
  - From a safe location dial **911**.
  - Report the incident to the local security safety center.

## 5. MEDICAL EMERGENCY PROCEDURES

---

This section describes the necessary procedures for injuries or illnesses that may occur under extreme conditions.

A serious injury can be life-threatening and will require immediate medical attention. Injuries can include head injuries, spine injuries, broken bones, heart attack, stroke, loss of consciousness, excessive bleeding, chemical exposure, etc.

A non-serious injury is not immediately life-threatening but may still require the attention of a medical doctor. These can include headaches, nausea, itching, cuts, burns, etc.

### Life-Threatening Medical Emergency

1. Remain calm.
2. Immediately dial 911.
3. Report the incident to local security safety center.
4. Do not move the victim unless it is absolutely necessary.
5. Call out for personnel trained in first aid and/or CPR which may include Building Evacuation or Emergency Response team members.

6. Ask someone to bring the area first aid kit and Automated External Defibrillator.
7. Assist if capable or asked to do so.

### **Non-Life-Threatening Medical Emergency**

1. Remain calm.
2. Report the incident to the local security safety center.
3. Do not move the victim unless it is absolutely necessary.
4. Call out for personnel trained in first aid.
5. Ask someone to bring the area first aid kit.
6. If the victim requires further medical attention, then direct them to the nearest approved medical clinic or hospital – Contact Security or Human Resources for assistance if needed.
7. The injured employee's supervisor/manager is responsible for ensuring injury forms are properly filled out. Complete the forms within 24 hours of incident and submit to the injury reporting system for follow-up. Follow company protocols.

## **6. MATERIALS RELEASE PROCEDURES**

---

The fuel cell system does not pose a hazard to health or environment. However, some internal materials when released, may pose a irritation risk to people and a possible risk of fire if not properly handled. This section was designed to address potential material release events:

In case of a material release that poses a direct threat to health, safety, or the environment:

1. Report the incident to local safety/security office.
2. If extremely life-threatening immediately dial **911** followed with a call to Security.
3. Contain the spill.
4. Evacuate the area or building if the material release is determined to be life-threatening.

In the event of an unknown indoor smell or odor, report the incident to authorities responsible for HAZMAT and spills.

## **7. NATURAL DISASTERS AND SEVERE WEATHER**

---

### **7.1 Earthquake**

This section provides information and procedures for earthquake emergencies.

The fuel cell system is designed to automatically shut off if the natural gas supply is compromised.

The natural gas supply line has an external, manual shut-off valve that should be activated if it is safe to do so. This valve will be labeled, "Notice – Fuel Cell Gas Shut

Off". The natural gas line will be labeled with the word "gas" on a yellow background with an arrow pointing in the direction of flow.

The nearby Emergency Stop can be activated to stop the flow of fuel and power to/from the fuel cell system.

A Bloom Energy Field Engineer will validate site safety and system operation during/after severe weather as necessary.

## 7.2 Flood

The fuel cell system support pad is designed to divert water flow. However, if flooding conditions exist, or threaten to exist due to heavy rainfall, creek bank overflows, or pipe breakage, then immediately report the incident to the local safety/security office.

Do not use the fuel cell power system if any part has been under water. If it is safe to reach the Emergency Power Off button for the site without entering the water, stop all systems until a Bloom Energy representative can assess the site.

Precautions to follow after a flood:

- Stay out of flooded areas. Flooded areas remain unsafe. Entering a flooded area places you at risk.
- Notify Bloom Energy. A Bloom Energy Field Engineer will validate site safety and system operation during/after severe weather as necessary

## 8. UTILITY OUTAGE

---

The fuel cell system is operated in "Grid-Parallel" mode. If utility provided power is lost for any reason, the fuel cell system will go "off-line". The fuel cell system will remain in stand-by mode until it automatically senses the utility grid has been restored. If utility gas is shut down, the fuel cell system will begin to shut down completely.

The Bloom Energy Remote Monitoring Control Centers monitor the fuel cells 24 hours per day and will be alerted to utility grid interruptions via its controls software. A Field Service Engineer will be dispatched to restart the fuel cell system if necessary. Customer personnel should NOT attempt to start up or operate the fuel cell system.

### Before a Planned Outage

- Notify the Bloom Energy Remote Monitoring Control Center at 1-408-543-1678 at least 24 hours before planned outage.
- Bloom Energy Remote Monitoring Engineers will reduce power generated by the fuel cell system and take the fuel cell off-line.
- Abrupt fuel cell system shutdowns may cause significant system damage.

### During a Utility Power Loss

- The fuel cell system will automatically go off-line.
- The Bloom Energy Remote Monitoring Control Centers will monitor the fuel cell system.
- Bloom Energy Field Service will be dispatched to start up the fuel cell system as necessary.
- If the fuel cell system has been automatically shut down and utility power is restored, there will be no impact to building power delivery: primary power will come from the utility rather than the fuel cells.

## 9. GOOD HOUSEKEEPING AND MAINTENANCE

---

### 9.1 Good Housekeeping

Although extremely unlikely, to minimize the risk of fire and any incidents, Facility Managers should take the following precautions around the fuel cell installation:

- What to do if you smell gas:
  - Do not try to light any appliance
  - Do not touch any electrical switch; do not use any phone in the area
  - Leave the area immediately
  - Immediately call your gas supplier. Follow the gas supplier's instructions.
  - If you cannot reach your gas supplier, call the fire department
- Notify Bloom Energy Remote Monitoring Control Center at 1-408-543-1678 of any condition that would impair the safety of the fuel cell installation so that mitigation measures could be determined and placed into effect.
- Prohibit smoking within the area of the fuel cell installation. Bloom Energy will furnish No Smoking signs for the area.
- Ensure only Bloom Energy Service Providers are permitted access inside the system.
- Keep the area around the fuel cell installation clear for ten feet in all directions, for safety and ease of maintenance.
- Keep the area around the fuel cell power system clear and free of combustible materials, gasoline, and other flammable vapors and liquids.
- Shut the system down and call Bloom Energy immediately if you suspect a fuel line rupture.
- **Never enclose an operating system** in a tarp, tent, shed, or other structure that would allow air to become trapped. This system runs on natural gas, and produces trace amounts of CO and CO<sub>2</sub>. The amounts of these gases are safe for normal outdoor operation but could gather in an enclosed place.
- Do not block or obstruct air openings on the fuel cell power system. This system requires air flow in order to operate.

- Do not use this fuel cell power system if any part has been under water. Immediately call qualified service personnel to inspect the fuel cell power system and to replace any functional part which has been under water.
- Please contact Bloom Energy at 408-543-1678 with as much advance notice as possible if you plan, detect, or suspect a prolonged Internet outage.
- The Bloom Energy Field Service team will periodically clean the equipment; do not spray with pressurized hoses.

## **9.2 Maintenance**

Your site has specific Field Service personnel assigned to it for both routine maintenance and troubleshooting. Your site project manager will introduce you to the designated Bloom Energy Field Service team assigned to your site prior to operation.

Bloom Energy Field Service personnel are trained in state Safety Law. They are trained in all the procedures required for the fuel cell installation, and their toolkit includes all the safety equipment required to work around the fuel components and high voltage in our system (480VAC).

Bloom Energy also requires its employees to follow all necessary safety precautions, including:

- Every time a Field Service technician arrives at a site for the first time and opens a service panel, the technician will use a leak detector to determine whether there is any gas buildup in the system and determine that it is safe to work on it.
- Whenever a Field Service technician is removing and replacing a component on a fuel or exhaust line, the technician must keep a CO detector nearby to make sure that no CO is present in the line even after the system has been shut down.

The Field Service team expects to conduct quarterly and yearly preventative maintenance for certain types of consumable or cleanable components such as replacement of air filters, water filters, and desulfurizer beds. Other maintenance will be performed as required. During such times, inspections for any hazards will be conducted including quarterly fire extinguisher inspection (if applicable).

## **10. TRAINING**

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Prior to system startup, a Bloom Energy representative will provide training on the fuel cell installation to include the location and operation of safety features as well as actions to take during emergencies. We desire this training to provide lasting value and are more than happy to work with you to customize the experience to suit your needs.

## Exhibit 7

February 28, 2023

**Bloom Energy**

4353 North 1<sup>st</sup> Street  
San Jose, California 95134

Attention: **Brandon Leaverton | Supply Chain Specialist – Construction**

Subject: **MDC002.B2 Medtronic Inc.; North Haven, Connecticut  
Property Line Noise Analysis  
Veneklasen Project No. 4631-044**

Dear Brandon:

Veneklasen Associates, Inc. (Veneklasen) was contracted to evaluate noise impact of proposed fuel cells for the subject project in North Haven, Connecticut. This report includes predicted noise levels at adjacent property lines and an evaluation of necessary mitigation, if warranted, to comply with the local noise ordinance in the surrounding community. This report documents our acoustical comments.

**Noise Criteria**

The Town of North Haven, Connecticut Code of ordinance Chapter 146 “Noise”, Section 146-4(B) provides property line noise limits for various property types. These are summarized below in Table 1.

**Table 1. Town of North Haven Noise Limits**

Zone in which Emitter is located	Zone in which Receptor is located			
	Industrial	Commercial	Residential/Day	Residential/Night
Residential and Limited Commercial	62 dBA	55 dBA	55 dBA	45 dBA
Commercial	62 dBA	62 dBA	55 dBA	45 dBA
Industrial	70 dBA	66 dBA	61 dBA	51 dBA

Additionally, Section 146-4(C) states the following:

*In those individual cases where the background noise levels caused by sources not subject to this chapter exceed the standards contained herein, a source shall be considered to cause excessive noise if the noise emitted by such source exceeds the background noise levels by five dBA, provided that no source subject to the provisions of this chapter shall emit noise in excess of 80 dBA at any time, and provided that this section does not decrease the permissible noise level standards of Subsection B of this section.*

Veneklasen assumes proposed fuel cells will run 24-hours per day. According to the Town of North Haven Zoning Map, all adjacent properties are zoned as commercial. In the following analysis, fuel cell noise levels are compared to the applicable limits described above.

**Existing Ambient Noise**

To determine the ambient noise levels at the site due to existing traffic sources, Veneklasen utilized the SoftNoise Predictor Version 2023.01 environmental noise modelling computer software. Traffic counts for the nearby roadways were provided by the Connecticut Department of Transportation (CTDOT). The primary noise source is vehicular traffic on Interstate 91 and Middletown Avenue.

The Predictor software utilizes the three-dimensional locations of roadways and sensitive receptors, shielding provided by terrain and existing structures, traffic count data, as well as other attributes of the roadway, to calculate average daytime and nighttime noise levels. Note that receptors east of Middletown Avenue will experience daytime



ambient levels less than 62 dBA and therefore not be subject to noise limit modification. Daytime ambient levels for receptors closer to Middletown Avenue and on McDermott Road are summarized below in Table 2. Modified ambient noise levels are also included.

**Table 2. Average Daytime Ambient Traffic Noise Levels**

Receptor Location	Calculated Daytime Average Level, dBA	Revised Noise Limit, dBA
171 McDermott Rd.	62	67
34 Middletown Ave.	47	62
40 Middletown Ave.	57	62
50 Middletown Ave.	57	62
60 Middletown Ave.	49	62

Note that daytime ambient levels at the 171 McDermott Rd location exactly meet the property line noise limit defined in Table 1 above and do not exceed this limit. Therefore, no allowances for existing ambient are applicable for this location.

**Property Line Noise Analysis**

Drawings dated December 5, 2022 indicate that proposed fuel cells will be installed in the east courtyard area of the existing property. Proposed fuel cells are shown in green in Figure 1 below. Additionally, the nearest receptors are annotated in blue.

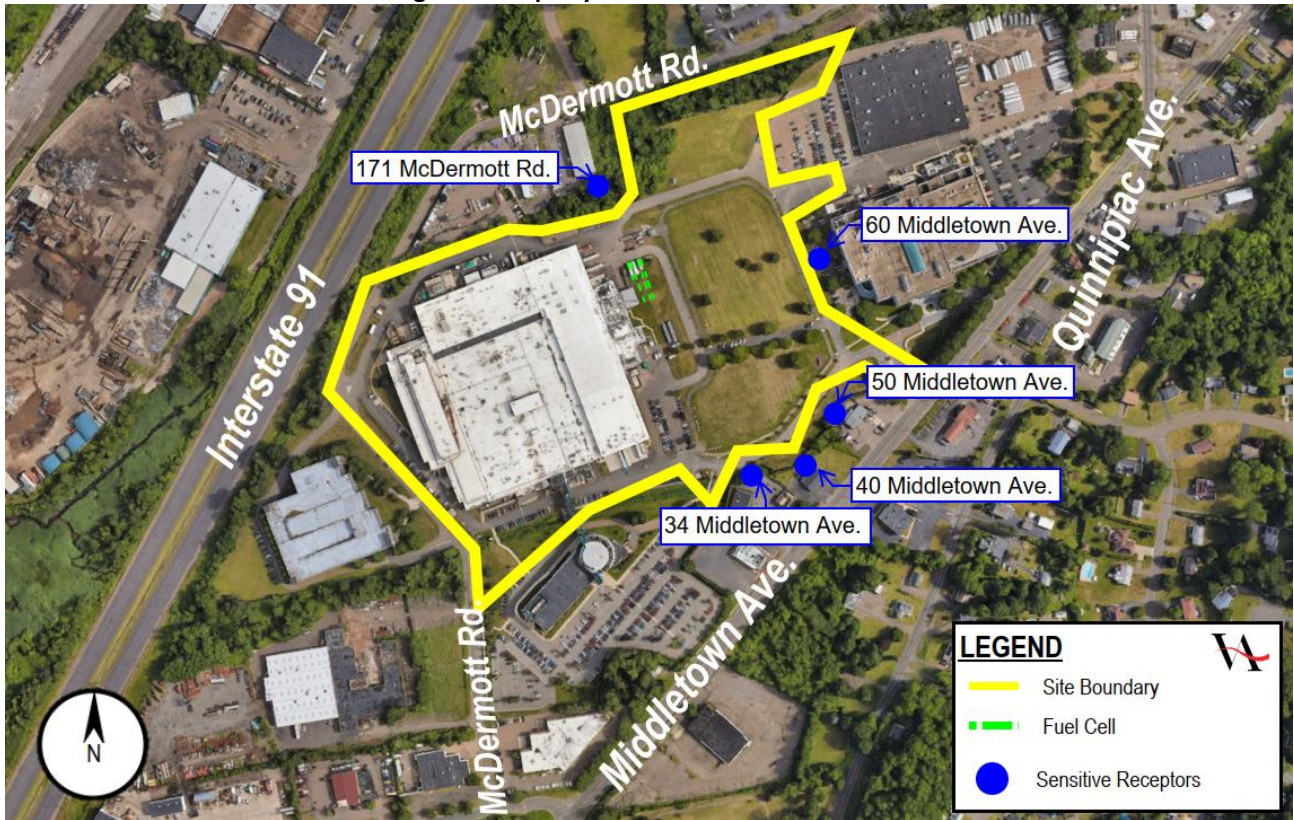
The current fuel cell installation method includes a foam dampening material that is installed at the doors and exhaust to the fuel cells. Measurement data of these units when compared to units without foam indicate that the foam compound reduces noise levels produced by the fuel cells by approximately 5 decibels. See Appendix A below for fuel cell sound power data and foam compound reduction data used in the following analysis.

The calculated fuel cell noise levels as compared with State noise level limits are presented in Table 3 below. Note that the reported distances between property lines and the fuel cells are taken from the closest face of the fuel cell nearest to the associated property line.

**Table 3. Fuel Cell Property Line Noise Levels: No Mitigation**

Sensitive Receptor	Distance from Fuel Cell, ft	Applicable Noise Limit, dBA	Calculated Fuel Cell Noise Level, dBA	Code Compliant?
171 McDermott Rd.	272	67	43	Yes
34 Middletown Ave.	630	62	39	Yes
40 Middletown Ave.	690	62	38	Yes
50 Middletown Ave.	656	62	38	Yes
60 Middletown Ave.	495	62	40	Yes

Figure 1. Property Line and Fuel Cell Locations



**Summary**

Veneklasen has reviewed the subject project proposed fuel cell property line noise levels as they pertain to the Town noise requirements. Adjacent properties are zoned as commercial land.

As currently designed, fuel cell noise levels comply with Town requirements. Therefore, no noise mitigation is required for the subject project.

If you have any questions, please do not hesitate to call.

Sincerely,  
**Veneklasen Associates, Inc.**



Kevin Patterson  
Senior Associate



John LoVerde, FASA  
Principal

### Appendix A – Sound Power Levels

Sound power data was taken from the Mei Wu Acoustics (MWA) Report titled “Bloom Energy – ES5 Linear Sound Power Measurement”, dated June 21, 2016. These reported levels were measured without the sound dampening foam described above.

**Table 4. Fuel Cell Measured Sound Power Levels**

Dampening Product Installed?	Measured Sound Power Level [dB] – 1/1 Octave Bands							
	63 Hz	125 Hz	250 Hz	500 Hz	1000 Hz	2000 Hz	4000 Hz	LwA
No	77.9	80.9	84.1	82.3	80.5	76.9	69.4	84.9
Yes	77.9	80.9	81.0	77.9	73.7	67.2	64.8	79.3

In a study conducted at an existing installation of the fuel cell systems, measurements were taken of the fuel cell banks with and without the dampening product. The Noise Reduction (NR) of the dampening product was calculated by taking the difference of these measured values at octave band frequencies. Note that no significant reduction was shown at the 63 Hz and 125 Hz bands. The modified sound levels for the fuel cells that were utilized in calculations shown in this report are shown in Table 4.

**Table 5. Measured Sound Dampening Foam Mitigation**

Condition	Measured Sound Pressure Level [dB] @10ft – 1/1 Octave Band				
	250 Hz	500 Hz	1000 Hz	2000 Hz	4000 Hz
No Foam	70.8	66.8	65.5	62.4	53.6
Foam	67.8	62.5	58.7	52.8	49.0
Difference (NR)	3.1	4.4	6.8	9.7	4.6

## Appendix B – Calculation Methods

Sound level attenuates over distance by a factor of -6 dB per doubling of distance. For example, if a sound source was measured to be 60 dBA at a distance of 10 feet, the measured sound level at 20 feet would be 54 dBA. Sound level reduction due to distance is calculated according to the following equation:

$$L_p = L_w + 10 \log_{10} Q - 20 \log_{10} d - 0.7$$

Where:

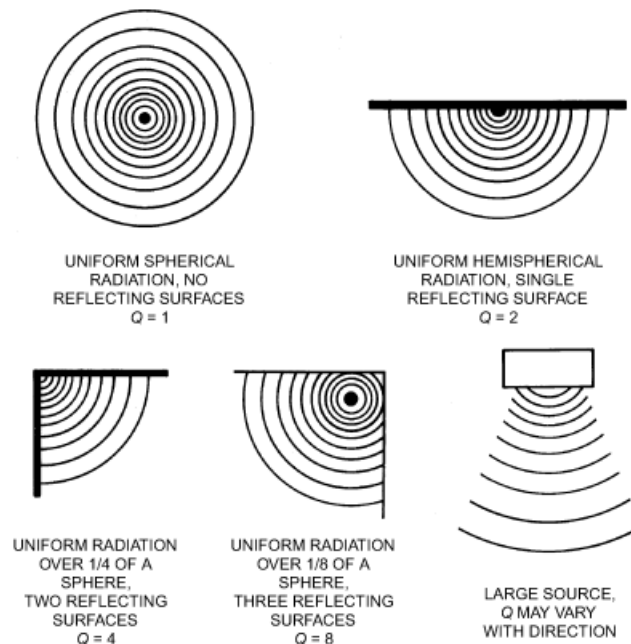
$d$  = The distance between the center of the fuel cell unit to the property line in feet.

$L_p$  = The sound pressure level at a distance  $d$  in decibels.

$L_w$  = The sound power level from the fuel cell. Sound power levels are reported above in Appendix A in decibels.

$Q$  = The directivity factor which dictates how sound radiates outward from the source. See Figure 2 below from the 2015 American Society of Heating, Refrigeration and Air-Conditioning Engineers (ASHRAE) Handbook, Chapter 48 describing  $Q$  factors and their associated sound radiation patterns.

**Figure 2. ASHRAE Handbook: Q Factor Sound Radiation Patterns**



**Fig. 30 Directivity Factors for Various Radiation Patterns**

In the equation above, the greater the distance away from the sound source ( $d$ ), the lower the sound level. This is intuitive and most people would consider this common knowledge.

In general, the more reflecting surfaces there are adjacent to a noise source, the more sound will bounce off these surfaces and radiate outward. In other words, larger  $Q$  factors will increase the noise level. For example, a fuel cell sitting on the ground, with nothing else around, would have a  $Q$  factor of 2 because the ground that the fuel cell is sitting on acts as a single reflecting surface. Another example would be a fuel cell sitting on the ground with a retaining wall on one side of it; this system would have a  $Q$  factor of 4 because both the ground and the retaining wall act as reflecting surfaces. A doubling of the  $Q$  factor increases the receiver noise level,  $L_p$ , by 3 dB.

## Exhibit 8

# What Powers You

VIA CERTIFICATE OF MAILING

July 26, 2023

RE: Application of Bloom Energy for the location and construction of a Bloom Energy Server fuel cell installation to provide 2,000 kilowatts of Customer-Side Distributed Resource at Medtronic, 195 McDermott Road, North Haven, Connecticut

Dear Ladies and Gentlemen:

Pursuant to Section §16-50j-40 of the Connecticut Siting Council's (the "Council") regulations, we are notifying you that Bloom Energy intends to file with the Council, on or about August 4, 2023, a petition to amend a previous declaratory ruling. The petition will request the Council's approval of the location and construction of an additional 2,000-kilowatt fuel cell installation and associated equipment at the Medtronic complex. The Facility will be located building identified as 195 McDermott Road, near two previously approved and operating Bloom fuel cells (the "Site").

The purpose of the proposed Facility is to continue replacing a portion of Medtronic's annual load with a renewable energy source<sup>1</sup> to improve reliability of electrical systems and equipment. Electricity generated by the Facility will be consumed primarily at the Site, and any excess electricity will be exported to the electric grid. The Facility will be fueled by natural gas.

Keeping the lines of communication open is an important part of our work in your community. If you have questions about this work, please contact the undersigned or the Council.

Respectfully,



Kristen Grillo  
Senior Permitting Specialist  
[Kristen.grillo@bloomenergy.com](mailto:Kristen.grillo@bloomenergy.com)

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<sup>1</sup>Connecticut General Statutes §16-1(a)(26)(A) identifies fuel cells as a "Class I renewable energy source".



Bloom Energy Corporation  
4353 North First Street, San Jose, CA 95134  
408 543 1500  
[www.bloomenergy.com](http://www.bloomenergy.com)

**ABUTTING PROPERTY OWNERS**

		subject parcel				
Property ID	Property Address	Owner Name	Mailing Address	Town	State	Zip
3/7	195 McDermott Road	United States Surgical Corp.	Tyco Healthcare Grp, Attn: Tax Dept., 15 Hampshire St.	Mansfield	MA	02048
6/36	171 McDermott Road	Cassisi Group LLC	171 McDermott Rd.	North Haven	CT	06473
6/6	78 Rebesch Drive	Andrew T. Dixon	1077 Bridgeport Ave., Ste-201	Shelton	CT	06484
6/8	100 McDermott Road	Ryder Truck Rental Inc. #0444	c/o Property Tax Dept. 3B, P O Box 025719	Miami	FL	33102-5719
6/35	57 McDermott Road	Everything Holdings LLC	251 Little Falls Dr.	Wilmington	DE	19807
6/29	86 Quinnipiac Avenue	United States Surgical Corp.	Tyco Healthcare Grp, Attn: Tax Dept., 15 Hampshire St.	Mansfield	MA	02048
6/26	60 Middletown Avenue	United States Surgical Corp.	Tyco Healthcare Grp, Attn: Tax Dept., 15 Hampshire St.	Mansfield	MA	02048
3/49	51 Middletown Avenue	Lightsout LLC	51 Middletown Ave.	North Haven	CT	06473
3/13	50 Middletown Avenue	50 Middletown Avenue Assoc LLC	2 Carolyn Ct.	North Haven	CT	06473
3/12	40 Middletown Avenue	Ngau Ngo & Tieng Taing	40 Middletown Ave.	North Haven	CT	06473
3/11	34 Middletown Avenue	Nicks Char-Pit Inc.	22 Middletown Ave.	North Haven	CT	06473
3/57	22 Middletown Avenue	22 Middletown Avenue Assoc LLC	11 St. John St. Unit A-4	North Haven	CT	06473
3/10	20 Middletown Avenue	United States Surgical Corp.	Tyco Healthcare Grp, Attn: Tax Dept., 15 Hampshire St.	Mansfield	MA	02048
3/5	222 McDermott Road	Haven West LLC	30 Bernhard Rd.	North Haven	CT	06473
3/6	200 McDermott Road	United States Surgical Corp.	Tyco Healthcare Grp, Attn: Tax Dept., 15 Hampshire St.	Mansfield	MA	02048
6/1	250 Universal Drive	Metal Management CT Inc.	234 Universal Dr.	North Haven	CT	06473

**OFFICIALS**

<b>Name</b>	<b>Title</b>	<b>Mailing Address</b>	<b>Town</b>	<b>State</b>	<b>Zip</b>
William Tong	Attorney General	165 Capitol Ave.	Hartford	CT	06106
Katie Dykes	Commissioner, Dept. of Energy and Environmental Protection	79 Elm St.	Hartford	CT	06106-5127
Marissa Gillett	Chairman, Public Utilities Regulatory Authority	10 Franklin Square	New Britain	CT	06051
Manisha Juthani, M.D.	Commissioner, Dept. of Public Health	410 Capitol Ave.	Hartford	CT	06134
Susan D. Merrow	Chair, Council on Environmental Quality	79 Elm St.	Hartford	CT	06106
Bryan P. Hurlburt	Commissioner, Dept. of Agriculture	450 Columbus Blvd., Suite 701	Hartford	CT	06103
Jeffrey R. Beckham	Secretary, Office of Policy and Management	450 Capitol Ave.	Hartford	CT	06106
Garrett Eucalitto	Commissioner, Dept. of Transportation	2800 Berlin Turnpike	Newington	CT	06111
Alexandra Daum	Commissioner, Dept. of Economic and Community Development	450 Columbus Blvd.	Hartford	CT	06103
Brenda Bergeron	Deputy Commissioner, Div. of Emergency Management and Homeland Security	1111 Country Club Rd.	Middletown	CT	06457
Bryan T. Cafferelli	Commissioner, Dept. of Consumer Protection	450 Columbus Blvd., Suite 901	Hartford	CT	06103
Michelle Gilman	Commissioner, Dept. of Administrative Services	450 Columbus Blvd.	Hartford	CT	06103
Danté Bartolomeo	Commissioner, Dept. of Labor	200 Folly Brook Blvd.	Wethersfield	CT	06109
Richard Blumenthal	Senator	706 Hart Senate Office Building	Washington	DC	20510
Chris Murphy	Senator	136 Hart Senate Office Building	Washington	DC	20510
Rosa L. DeLauro	U.S. Representative	2413 Rayburn House Office Building	Washington	DC	20515
Paul Cicarella	State Senator, 34th District	Legislative Office Building, Room 3402, 300 Capitol Ave.	Hartford	CT	06106
Dave W. Yaccarino	Representative, 87th District	Legislative Office Building, Room 4200, 300 Capitol Ave.	Hartford	CT	06106
	South Central Regional Council of Governments	127 Washington Ave., 4th Floor West	North Haven	CT	06473
Michael J. Freda	First Selectman, Town of North Haven	18 Church St.	North Haven	CT	06473
Alan A. Fredricksen	Land Use Administrator	18 Church St.	North Haven	CT	06473
Vern E. Carlson	Chairman, Planning & Zoning Commission	18 Church St.	North Haven	CT	06473




Frank H. Bumsted	Chairman, Inland Wetlands Commission	18 Church St.	North Haven	CT	06473
Sue Dannenhoffer	Chairperson, Conservation Commission	18 Church St.	North Haven	CT	06473
Justin Elicker	Mayor, City of New Haven	165 Church St.	New Haven	CT	06510
Laura Brown	Executive Director, City Plan	165 Church St., 5th Floor	New Haven	CT	06510
Leslie Radcliff	Chair, City Plan Commission*	165 Church St.	New Haven	CT	06510
Joseph A. Carfora	Mayor, Town of East Haven	250 Main St	East Haven	CT	06512
Joe Budrow	Zoning Enforcement Officer	250 Main St., Lower Level	East Haven	CT	06512
	Planning & Zoning Commission	250 Main St., Lower Level	East Haven	CT	06512
	Inland Wetland Commission	Public Services Building, 461 North High St.	East Haven	CT	06512

\*City Plan Commission functions as Inland Wetlands agency




**Certificate of Mailing — Firm**

<p>Name and Address of Sender</p> <p>Kristen Grillo          c/o All-Points Technology Corp., P.C.          567 Vauxhall St. Ext., Suite 311          Waterford, CT 06385</p>	<p>TOTAL NO. of Pieces Listed by Sender</p> <p>43</p>	<p>TOTAL NO. of Pieces Received at Post Office™</p>	<p>Affix Stamp Here          Postmark with Date of Receipt.</p> <div style="text-align: center;">  <p>U.S. POSTAGE PAID              WESTERLY, RI              02891              JUL 26 23              AMOUNT  <b>\$24.51</b>              R2303S101358-11</p> </div>			
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<p>1.</p>	<p>Hon. William Tong          Attorney General          165 Capitol Ave.          Hartford, CT 06106</p>					
<p>2.</p>	<p>Katie Dykes, Commissioner          Department of Energy and Environmental Protection          79 Elm St.          Hartford, CT 06106-5127</p>					
<p>3.</p>	<p>Marissa Gillett, Chairman          Public Utilities Regulatory Authority          10 Franklin Square          New Britain, CT 06051</p>					
<p>4.</p>	<p>Dr. Manisha Juthani, Commissioner          Department of Public Health          410 Capitol Ave.          Hartford, CT 06134</p>					
<p>5.</p>	<p>Susan D. Morrow, Chair          Council on Environmental Quality          79 Elm St.          Hartford, CT 06106</p>					
<p>6.</p>	<p>Bryan P. Hurlburt, Commissioner          Department of Agriculture          450 Columbus Blvd., Suite 701          Hartford, CT 06103</p>					



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2.	Garrett Eucalitto, Commissioner Department of Transportation 2800 Berlin Tpke PO Box 317546 Newington, CT 06131-7546					
3.	Alexandra Daum, Commissioner Department of Economic and Community Development 450 Columbus Blvd. Hartford, CT 06103					
4.	Brenda Bergeron, Dep. Commissioner Division of Emergency Management and Homeland Security 1111 Country Club Rd. Middletown, CT					
5.	Bryan T. Cafferelli, Commissioner Department of Consumer Protection 450 Columbus Blvd., Suite 901 Hartford, CT 06103					
6.	Michelle Gilman, Commissioner Department of Administrative Services 450 Columbus Blvd Hartford, CT 06103					




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<p>1.</p>	<p>Dante Bartolomeo, Commissioner Department of Labor 200 Folly Brook Blvd. Wethersfield, CT 06109</p>					
<p>2.</p>	<p>Hon. Richard Blumenthal Senator 706 Hart Senate Office Building Washington, DC 20510</p>					
<p>3.</p>	<p>Hon. Chris Murphy Senator 136 Hart Senate Office Building Washington, DC 20510</p>					
<p>4.</p>	<p>Hon. Rosa L. DeLauro U.S. Representative 2413 Rayburn House Office Building Washington, DC 20515</p>					
<p>5.</p>	<p>Hon. Paul Cicarella State Senator, 34th District Legislative Office Building, Room 3402 300 Capitol Ave. Hartford, CT 06106-1591</p>					
<p>6.</p>	<p>Hon. Dave W. Yaccarino Representative, 87th District Legislative Office Building, Room 4200 300 Capitol Ave. Hartford, CT 06106-1591</p>					




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USPS® Tracking Number Firm-specific Identifier	<table border="1"> <thead> <tr> <th data-bbox="665 231 698 525">Address (Name, Street, City, State, and ZIP Code™)</th> <th data-bbox="665 525 698 735">Postage</th> <th data-bbox="665 735 698 945">Fee</th> <th data-bbox="665 945 698 1155">Special Handling</th> <th data-bbox="665 1155 698 1365">Parcel Airlift</th> </tr> </thead> <tbody> <tr> <td data-bbox="698 231 828 525">           1. South-Central Regional Council of Governments            127 Washington Ave., 4th Floor West            North Haven, CT 06473         </td> <td data-bbox="698 525 828 735"></td> <td data-bbox="698 735 828 945"></td> <td data-bbox="698 945 828 1155"></td> <td data-bbox="698 1155 828 1365"></td> </tr> <tr> <td data-bbox="828 231 958 525">           2. Michael J. Freda, First Selectman            Town of North Haven            18 Church St.            North Haven, CT 06473         </td> <td data-bbox="828 525 958 735"></td> <td data-bbox="828 735 958 945"></td> <td data-bbox="828 945 958 1155"></td> <td data-bbox="828 1155 958 1365"></td> </tr> <tr> <td data-bbox="958 231 1088 525">           3. Alan A. Fredricksen            Land Use Administrator            18 Church St.            North Haven, CT 06473         </td> <td data-bbox="958 525 1088 735"></td> <td data-bbox="958 735 1088 945"></td> <td data-bbox="958 945 1088 1155"></td> <td data-bbox="958 1155 1088 1365"></td> </tr> <tr> <td data-bbox="1088 231 1218 525">           4. Vern E. Carlson, Chairman            Planning &amp; Zoning Commission            18 Church St.            North Haven, CT 06473         </td> <td data-bbox="1088 525 1218 735"></td> <td data-bbox="1088 735 1218 945"></td> <td data-bbox="1088 945 1218 1155"></td> <td data-bbox="1088 1155 1218 1365"></td> </tr> <tr> <td data-bbox="1218 231 1347 525">           5. Frank H. Bumsted, Chairman            Inland Wetlands Commission            18 Church St.            North Haven, CT 06473         </td> <td data-bbox="1218 525 1347 735"></td> <td data-bbox="1218 735 1347 945"></td> <td data-bbox="1218 945 1347 1155"></td> <td data-bbox="1218 1155 1347 1365"></td> </tr> <tr> <td data-bbox="1347 231 1521 525">           6. Sue Dannenhoffer, Chairperson            Conservation Commission            18 Church St.            North Haven, CT 06473         </td> <td data-bbox="1347 525 1521 735"></td> <td data-bbox="1347 735 1521 945"></td> <td data-bbox="1347 945 1521 1155"></td> <td data-bbox="1347 1155 1521 1365"></td> </tr> </tbody> </table>							Address (Name, Street, City, State, and ZIP Code™)	Postage	Fee	Special Handling	Parcel Airlift	1. South-Central Regional Council of Governments 127 Washington Ave., 4th Floor West North Haven, CT 06473					2. Michael J. Freda, First Selectman Town of North Haven 18 Church St. North Haven, CT 06473					3. Alan A. Fredricksen Land Use Administrator 18 Church St. North Haven, CT 06473					4. Vern E. Carlson, Chairman Planning & Zoning Commission 18 Church St. North Haven, CT 06473					5. Frank H. Bumsted, Chairman Inland Wetlands Commission 18 Church St. North Haven, CT 06473					6. Sue Dannenhoffer, Chairperson Conservation Commission 18 Church St. North Haven, CT 06473				
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3. Alan A. Fredricksen Land Use Administrator 18 Church St. North Haven, CT 06473																																										
4. Vern E. Carlson, Chairman Planning & Zoning Commission 18 Church St. North Haven, CT 06473																																										
5. Frank H. Bumsted, Chairman Inland Wetlands Commission 18 Church St. North Haven, CT 06473																																										
6. Sue Dannenhoffer, Chairperson Conservation Commission 18 Church St. North Haven, CT 06473																																										



# Certificate of Mailing — Firm

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Kristen Grillo c/o All-Points Technology Corp., P.C. 567 Vauxhall St. Ext., Suite 311 Waterford, CT 06385	Postmaster, per (name of receiving employee)					
USPS® Tracking Number Firm-specific Identifier						
1.	Honorable Justin Elicker Mayor, City of New Haven 165 Church St. New Haven, CT 06510					
2.	Laura Brown Executive Director, City Plan 165 Church St., 5th Floor New Haven, CT 06510					
3.	Leslie Radcliff, Chair City Plan Commission 165 Church St. New Haven, CT 06510					
4.	Honorable Joseph A. Carfora Mayor, Town of East Haven 250 Main St. East Haven, CT 06542					
5.	Joe Budrew Zoning Enforcement Officer 250 Main St., Lower Level East Haven, CT 06512					
6.	Planning & Zoning Commission 250 Main St., Lower Level East Haven, CT 06542					



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<p>USPS® Tracking Number Firm-specific Identifier</p>							
<p>1. Inland Wetland Commission Public Services Building 461 North High St. East Haven, CT 06512</p>							
<p>2. United States Surgical Corp. Tyco Healthcare Grp., Attn: Tax Dept. 15 Hampshire St. Mansfield, MA 02048</p>							
<p>3. Cassisi Group LLC 171 McDermott Rd. North Haven, CT 06473</p>							
<p>4. Andrew T. Dixon 1077 Bridgeport Ave., Ste-201 Shelton, CT 06484</p>							
<p>5. Ryder Truck Rental Inc. #0444 c/o Property Tax Dept. 3B P O Box 025719 Miami, FL 33102-5719</p>							
<p>6. Everything Holdings LLC 251 Little Falls Dr. Wilmington, DE 19807</p>							

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 Waterford, CT 06385

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 (Name, Street, City, State, and ZIP Code™)

Postage

Fee

Special Handling

Parcel Airlift

1.	2.	3.	4.	5.	6.
Lightseut LLC 51 Middletown Ave. North Haven, CT 06473					
50 Middletown Avenue Assoc. LLC 2 Carolyn Ct. North Haven, CT 06473					
Ngau-Ngo & Tieng Teing 40 Middletown Ave. North Haven, CT 06473					



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 567 Vauxhall St. Ext., Suite 311  
 Waterford, CT 06385

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 (Name, Street, City, State, and ZIP Code™)

Postage

Fee

Special Handling

Parcel Airlift

1.

Nicks Char-Pit Inc.  
 22 Middletown Ave.  
 North Haven, CT 06473

2.

22 Middletown Avenue Assoc LLC  
 22 Middletown Ave.  
 North Haven, CT 06473

3.

Haven West LLC  
 30 Bernhard Rd.  
 North Haven, CT 06473

4.

Metal Management CT Inc.  
 234 Universal Dr.  
 North Haven, CT 06473

5.

6.

## Exhibit 9

**From:** [Jennifer Young Gaudet](#)  
**To:** ["fredricksen.alan@northhaven-ct.gov"](mailto:fredricksen.alan@northhaven-ct.gov)  
**Subject:** Bloom Energy - proposed additional fuel cell - Medtronic, 195 McDermott Rd.  
**Date:** Monday, July 17, 2023 3:57:00 PM  
**Attachments:** [image001.png](#)  
[MDC002.B2 Preliminary Plan July 2023.pdf](#)

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Dear Mr. Fredricksen:

I am writing on behalf of Bloom Energy in connection with a planned fuel cell installation at the Medtronic complex in North Haven. Attached are plans depicting the proposed installation, which will consist of energy servers and associated equipment and be fueled by natural gas. As shown, it will be located behind the building at 195 McDermott Road, north of an existing Bloom fuel cell facility. In connection with the fuel cell installation, Bloom understands that Medtronic is preparing to install a new switchboard building to the northeast of the proposed fuel cell.

As you may recall, this proposed installation will be the fourth Bloom fuel cell at the complex; previous installations were approved by the Connecticut Siting Council ("CSC") in 2017 and 2019 (Petitions 1278 and 1278a, respectively). Bloom will be submitting a request for the CSC to amend its previous rulings to approve the additional fuel cell. In preparation for the filing, we are seeking any comments you or other appropriate Town departments wish to offer on the proposed plans.

I am available to discuss the plans or answer any questions you may have. I can be reached by phone at 860 798-7454 or by email.

Thank you.

*Jennifer Young Gaudet*



**JENNIFER YOUNG GAUDET**

Program Manager

**D** | 860.581.4478 • **M** | 860.798.7454 • **W** |

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567 Vauxhall Street Extension – Suite 311, Waterford, CT 06385