TOWN OF BARRINGTON, NH
LAND USE DEPARTMENT
Vanessa Price, Town Planner

Meeting Minutes
Zoning Board of Adjustment (ZBA)
April 19, 2023, at 7:00 P.M.
(Approved at the May 17, 2023, meeting.)

1. CALL TO ORDER

T. Hardekopf called the meeting to order at 7:00 p.m.

2. PLEDGE OF ALLEGIANCE

3. ROLL CALL

Members Present: Tracy Hardekopf, Paul Thibodeau, Cheryl Huckins, Alexandra Simocko, Andre Laprade

Staff Present: Town Planner: Vanessa Price, Zoning Administrator: John Huckins

4. ACTION ITEMS

A. **233-20-NR-23-Var (Owners: Donna & Sean Clark)** Request by applicant for a Variance from Article 4, Dimensional Requirements, Table 2 for side setbacks to allow 2' setback to the center of array where 30' is required at 72 Ramsdell Lane on 5.05-acre site (Map 233, Lot 20) in the Neighborhood Regional Zoning District. BY: David Vogel/Levi Carr; White-Vogel Industrial, Inc; 27 Route 110, Alton, NH 03801.

T. Hardekopf gave a brief description of the application.

David Vogel is representing the owners.

T. Hardekopf asked David Vogel to read the five criteria for the Justification for a variance.

David Vogel read the Justification for Variance into the record.

JUSTIFICATION FOR VARIANCE

1. **Special Conditions exist such that literal enforcement of the Ordinance will result in unnecessary hardship to the applicant as defined under applicable law.**

Special conditions in this context refer to unique circumstances or characteristics of the property that make it difficult or impossible to adhere to the strict requirements of the

ordinance. In the case of installing a solar ground mount system without the required setback, these special conditions include the topography, the structure of the property, and the presence of trees casting shadows on the area.

Utilizing scientific algorithms to analyze the property, it has been determined that the proposed location for the solar ground mount system is the only viable spot that ensures maximum efficiency and energy production. Any alternative location would result in significantly reduced performance due to shadows from the trees, making the solar installation less effective in generating green energy.

If the variance is not granted, the applicant would face an unnecessary hardship as they would be unable to install a solar ground mount system on their property. This would mean that they could not benefit from the use of green energy, contribute to a reduction of their carbon footprint, or potentially save on energy costs. Furthermore, this situation would hinder the broader goals of promoting sustainable energy solutions and combating climate change.

By granting the variance, the applicant would be able to overcome these hardships and contribute to a greener, more sustainable future, while still maintaining the overall intent and purpose of the ordinance.

2. **Granting the variance would be consistent with the spirit of the Ordinance**

Granting the variance would be consistent with the spirit of the ordinance because the underlying purpose of the ordinance is to promote green energy and environmentally sustainable practices. In this particular case, the unique characteristics of the property make it challenging to comply with the strict requirements of the ordinance without compromising the effectiveness of the solar ground mount system.

The spirit of the ordinance is not to create unnecessary obstacles for property owners who wish to adopt green energy solutions but to ensure that these solutions are implemented in a way that is beneficial to the environment and the community. By taking into consideration the specific conditions of the property, it becomes clear that adhering to the ordinance in this instance would hinder the adoption of green energy and contradict the overall goals of the ordinance.

Granting the variance would allow the applicant to install the solar ground mount system in the most efficient and effective location on their property, thereby maximizing the benefits of green energy and contributing to a more sustainable future. This outcome would align with the spirit of the ordinance, as it would encourage the use of renewable energy sources and support the broader objectives of environmental conservation and climate change mitigation.

In conclusion, granting the variance in this case would be consistent with the spirit of the ordinance, as it would enable the property owner to adopt green energy solutions despite the unique challenges posed by the property's topography and tree coverage. This decision would ultimately support the overarching goals of the ordinance by promoting sustainable energy practices and fostering a more environmentally conscious community.

3. Granting the variance would not result in the diminution of surrounding property values.

Granting the variance would not result in the diminution of surrounding property values, and here's why:

1. Solar energy systems are widely recognized as desirable additions to properties, as they generate clean energy, reduce dependence on fossil fuels, and contribute to lower energy bills. This, in turn, can increase the value of the property with the solar installation.
2. Studies conducted across the country have shown that properties with solar energy systems tend to have higher resale values compared to those without. This indicates that solar installations are considered valuable assets by prospective buyers, making them a positive factor in the real estate market.
3. Solar ground mount systems, when installed properly and with consideration for aesthetics, can blend seamlessly into the landscape. This minimizes any potential negative visual impact on the surrounding properties, ensuring that the solar installation does not detract from the overall appearance of the neighborhood.
4. The use of solar energy is widely supported as an environmentally responsible choice that contributes to a more sustainable future. As more people become aware of the environmental benefits associated with solar energy, the perception

of solar installations as a valuable and desirable feature in a property is likely to continue to grow.

5. The installation of a solar ground mount system on one property does not impose any direct costs or inconveniences on neighboring properties. Consequently, there is no reasonable basis for the system to negatively affect the value of surrounding properties.

In summary, granting the variance for the solar ground mount system would not result in the diminution of surrounding property values. Instead, it is likely to increase the value of the property with the solar installation and have no adverse effects on the neighboring properties. Solar energy systems are increasingly viewed as valuable and environmentally responsible additions to properties, and their presence is unlikely to negatively impact the desirability of the area.

4. Granting the Variance would to substantial justice,

variance will indeed do substantial justice, as it supports the global movement towards green energy and a cleaner environment. By allowing the installation of the solar ground mount system, the decision will contribute to the reduction of greenhouse gas emissions and promote the use of sustainable energy sources.

Moreover, granting the variance will do justice to the property owners who have taken the initiative to invest in renewable energy. By installing a solar energy system, they will not only lower their carbon footprint but also save substantially on their electricity bills. This financial benefit serves as an incentive for more people to adopt green energy solutions and fosters a culture of environmental responsibility.

In conclusion, granting the variance aligns with the larger goals of environmental sustainability, cleaner energy production, and financial savings for property owners. By supporting these objectives, the decision to grant the variance will ultimately serve the cause of substantial justice.

5. Granting the variance would not be contrary to public interest.

Allowing the variance would align with the public interest, as it encourages the broader adoption of renewable energy solutions and contributes to the global effort to combat

climate change. By granting the variance for the solar ground mount system installation, the decision demonstrates a commitment to promoting environmentally responsible practices, which ultimately benefits everyone.

Furthermore, supporting green energy initiatives like solar power is in line with the public interest, as it fosters a culture of sustainability and helps reduce our dependence on fossil fuels. This, in turn, leads to cleaner air, reduced greenhouse gas emissions, and a healthier environment for current and future generations.

In addition, the financial savings that property owners can achieve through solar energy installations can stimulate economic growth and encourage further investment in green technologies. This creates a positive cycle of environmentally conscious decisions that ultimately serve the public interest.

In summary, granting the variance is in harmony with the public interest because it advances environmental sustainability, supports clean energy adoption, and fosters economic benefits. By approving the variance, the decision sends a strong message that prioritizing our planet's well-being and the responsible use of resources are values held in high regard.

After Mr. Vogel finished reading the five criteria for a variance, T. Hardekopf asked staff to read into record the zoning ordinance article that references solar.

V. Price read into record from the Town of Barrington's Zoning Ordinance Article 4 Dimensional Requirements for the Neighborhood Residential Zoning District, the zoning district that the applicant is in, the setbacks where 30 foot is required for sides and rear setback, with a 40 foot in the front, and referenced in the table item i: "(i) Setbacks apply to ground mounted Solar Collection Systems. Increases in the Minimum Yard Setbacks may be required as part of the Site Plan Review or building permit process in order to comply with Life Safety Code requirements. Additional buffers may also be required between residential and nonresidential uses in the VD, RC, and TC districts as specified in Article 4, as well as other sections of this Ordinance."

T. Hardekopf addressed a question to J. Huckins about the application how it came before the Zoning Administrator that it may not be required in the area?

J. Huckins addressed her comment that the applicant thought the solar could be similar to a shed. Whereas, if you put a shed under 200 square feet you could be in the set back and if you put this on solar on the roof of the shed, then the sheds are allowed. He referenced the zoning ordinance that if you read the definition of solar with the roof mount solar assets on any structure that's permitted. So those are permitted structures (sheds). The applicant could do three sheds with a solar array on each sed, it's not clear in the solar ZO.

T. Hardekopf addressed Mr. Vogel about the site conditions and layout of the tree line.

Mr. Vogel said he could look at Google earth to show the conditions.

V. Price pulled up the site on google Earth to show the Board and the audience the satellite image of the property at 72 Ramsdell Lane.

Mr. Vogel wanted to pull up the engineering report of the site in case the Board needed questions answered.

J. Huckins addressed the board stating that solar was recently added to the Town's Zoning Ordinance a few years ago.

C. Huckins asked Mr. Vogel if there were any neighbor concerns and if the owners talked with their adjacent neighbors.

Mr. Vogel stated that he believed the owners spoke to their neighbors.

T. Hardekopf addressed the Board by asking if there were any questions, comments or concerns.

A. Simocko asked Mr. Vogel a question for clarification because you use some language like only viable spot that ensures maximum efficiency and energy production.
Is it your representation here tonight that this is the only location on the property where a system would be viable?

Mr. Vogel answered that it's the the absolute best location. But he wanted to state not to have a misrepresentation it could be placed elsewhere but it's the best location based off the engineering modeling process.

T. Hardekopf addressed that A. Laprade had a question.

A. Laprade asked about the side of the trees, the size of the the panel set. The size of each of the panels so he could visualize it.

Mr. Vogel answered each of the three arrays was originally designed to be under 200 square feet. He clarified each one will be under 200 square feet, and under 600 square feet total.

T. Hardekopf addressed the Board by asking if there were any questions, comments or concerns from the board.

P. Thibodeau asked Mr. Vogel about the overall map that was submitted in the application, get out of the shadow of trees on top of your solar array and to the South.

Mr. Vogel answered that there shows some shadow, but they are going to trim the trees for maximum efficiency, but there's always going to be a little bit of shadow.

T. Hardekopf addressed Mr. Vogel stating that you'll lose about a third of your efficiency at some point during the day based on the picture that was sent to us.

Mr. Vogel answered they will do their best to trim the trees and make sure to get as close to 100% efficiency as we can.

P. Thibodeau addressed Mr. Vogel that the angle of the sun facing your solar panels gets 100% efficiency. He stated that you don't want any shade on any of those panels. These are the types of panels I believe were the weakest panel then reflects the performance of all the panels.

Mr. Vogel answered they are using the IQ 8 plus micro inverters. He explained that if one panel is getting saved, the other panels are going to operate at full efficiency. Mr. Vogel states that they purposely use these types of inverters in situations like this. If one panel is getting shade, the others will work in 100% efficiency.

P. Thibodeau wanted to ask about the trees. In order to get optimum exposure on these panels, those trees are going to have to come down if they're right in front of those solar panels?

Mr. Vogel stated he wouldn't disagree with that statement.

P. Thibodeau question why wouldn't you put it behind the structure where you tell between you want from the in the backyard, and get the same sun exposure? He also stated that he understands it would be the closest run to for the electricity to the house, and underground to get from the panel work powered.

Mr. Vogel stated based on a site visit, but also based on the trees and went to trees situated, they felt this is the best place to get optimal amount. The sun running a power line doing a trench, you know another 20 or 30 feet is relatively an easy construction project that's not very difficult.

The board briefly deliberated on the tree line and the property line location.

Mr. Vogel stated based on his team results this is the best location.

T. Hardekopf addressed Mr. Vogel stating that the Vice-Chair question is that under a hardship, which is 1/5 of the requirements of the variance. She stated that there must be a substantial economic difference between the tree cut and the backyard, and running that trenching, then there would be to this optimal spot that he discussed. She addressed Mr. Vogel in explaining he needs to assess by looking at your plan, is there in fact there would be a much more significant hardship if it was a tree cut in the back of that five-acre parcel.

Mr. Vogel stated in the back the sun doesn't hit the panels the way we want them to hit the panels. The location placement is more than aesthetics and running a trench for 30 feet. They conduct a shadow report and it shows shadow hits at a specific spot, that's the spot we need to be, and that'll be absolute best spot.

The board briefly deliberated and discussed on the tree line.

P. Thibodeau stated that they own so much land and and they are looking for southern exposure and true north to set these, not magnetically. He explained to Mr. Vogel that if the back of the property was opened up in the back it's possible to meet all the setbacks, and could place the array anywhere on the five-acre site.

Mr. Vogel answered there are trees there (in the back). He stated originally, they weren't planning on that. He thought they might have to trim some trees, but from a scientific standpoint, this is the place where the sun's going to give us the best bang for our buck without huge construction costs. Mr. Vogel explained that he would have to take in consideration that taking down trees is expensive.

J. Huckins stated that he has had applicants come in where they had to take trees down in order to put solar on it. It didn't set right in order to get optimal exposure.

P. Thibodeau stated you can't have any trees on the southwest side for those panels to get optimal exposure. So those trees in the front that are casting shadow will come down. You can't trim all. He asked Mr. Vogel "What's the total elevation of the of the system, the total height of the back of the system?"

Mr. Vogel answered the total elevation is going to be under six feet, it depends on the tilt. He stated this is going to be at a 15-degree tilt. He stated he has an engineering report if the board wishes to take a look.

P. Thibodeau additionally asked how high off the ground where the first solar array. He stated he thought you would have to keep that so far off the ground for snow conditions.

Mr. Vogel answered yes.

C. Huckins asked if the land runs up?

J. Huckins answered that it's not steep, but the land does go up in elevation.

P. Thibodeau stated that's why these are 15-degree. In other words, they they're using the pitch of the slope.

J. Huckins answered yes.

T. Hardekopf gave the example if we can use the room as a visualization, this is what about 30 feet across. 28 feet of that is what you're asking for in the variance for the placement of the solar possibly 2 feet from the property. She stated that I would have a lot more concern if there were no trees in the neighbors were looking directly at these. I know that that is not what I would want to see when I look out the side of my home. T. Hardekopf addressed Mr. Vogel about his statement, he is testifying that the neighbors no have objection to this.

T. Hardekopf addressed the Board by asking if there were any questions, comments or concerns from the board.

C. Huckins commented about the aesthetics with regards to the fact that you can put a shed right on your property line, and you can't determine what the shed looks like. These (solar arrays) are better looking than that, and that they're the wave of the future and need to get used to these.

T. Hardekopf opened public comment.

T. Hardekopf closed public comment.

P. Thibodeau wanted to reiterate his concerns reiterate my concerns that these panels can go behind the house without getting into setbacks and work just as efficiently as they're going to have to cut those trees. You're going to see them from the road. He stated this set back is not questioned from the road, but they need that set back the question from the sideline. The neighbors are going to be looking at the angle and underneath this solar array. They're going to be staring at that and they may say that's fine, but they're not going to stay in their house forever. He stated (Mr. Vogel) has not proven a hardship because there's he's got 5 acres, there's a ton of space behind the house.

A motion was made by A. Laprade and seconded by C. Huckins to approve the variance application. All of the five criteria have been met. There is a hardship in reference to the cost of moving the solar array to another location. It is in the spirit of the ordinance observed. It is substantial justice to the ordinance as it

exists. It does not diminish surrounding property values, the literal enforcement would result in unnecessary hardship to the applicant, it is within the spirit of the ordinance, it would not diminish surrounding property values, it would do substantial justice and that it is not contrary to public interest.

Vote: 4/1
Roll Call:
A. Laprade-Yay
A. Simocko-Yay
C. Huckins-Yay
P. Thibodeau-Nay
T. Hardekopf-Yay

5. REVIEW AND APPROVAL OF MINUTES
A motion was made by A. Simocko and seconded by C. Huckins to approve the minutes of the March 15, 2023, meeting, as amended to line 71. The motion passed unanimously.

Vote: 5/0

Roll Call:
A. Laprade-Yay
A. Simocko-Yay
C. Huckins-Yay
P. Thibodeau-Yay
T. Hardekopf-Yay

6. OTHER BUSINESS THAT MAY PROPERLY COME BEFORE THE BOARD

A. Town Planner Updates- Training Opportunities

V. Price discussed with the board two training opportunities:

(1) NH OPD Planning Lunches at Noon Monthly Webinar Series Webinar "Congratulations, you're a Board Member Now! What's Next?" is on April 20, 2023. This webinar is for new board members as well as seasoned members that are interested in a refresher course. Online option to tune in at a later time.
(2) NHMA Right to know Training for Board Members: TBD Evening date in May 2023.

V. Price addressed the Board that new information from the Office of Planning at the State released new informational packets. The first is the Federal and State Planning and Zoning Case Law for New Hampshire Local Officials and the ZBA Handbook for local officials updated 2022.

T. Hardekopf stated that one other piece of new business that came to her attention was at the Select Board meeting last night that the Conservation Commission is getting together and wanting to make a list of their recommendations of criteria that we would look at for conservation subdivisions. She continued to comment that the most important thing is that this board is beholden to a quasi-judicial response as outlined by state statutes and state requirements, as well as our zoning ordinances. T. Hardekopf

discussed the zoning board acknowledges the recommendation from the Conservation Commission, but not part of what we are tasked with when we are looking at each of our cases.

7. ADJOURN

A. Adjourn the Zoning Board of Adjustment (ZBA) Meeting. Next ZBA meeting date is May 17, 2023, at 7:00 P.M.

A motion was made by A. Laprade and seconded by C. Huckins to adjourn the meeting. The motion passed unanimously.

Vote: 5/0

Roll Call:
A. Laprade-Yay
A. Simocko-Yay
C. Huckins-Yay
P. Thibodeau-Yay
T. Hardekopf-Yay

Meeting adjourned at 7:41 PM.

**** Please note that all votes that are taken during this meeting shall be done by Roll Call vote. ****

Visitor Orientation to the Zoning Board of Adjustment Meeting

Welcome to this evening's Zoning Board of Adjustment meeting.
Copies of agendas and a sign-in sheet are available for visitors.

Meeting Access

In-Person	**Remote Meeting Participation**
Town Hall (New ¼ mile from Old Town Hall)	Video: **barrington.nh.gov/zbmeeting**
Main Meeting Room	Call in via computer +1 603-664-0240, 514518321#
4 Signature Drive Barrington, NH 03825	

Meeting Materials

Additional details regarding each agenda item and all supporting documentation can be found online at https://www.barrington.nh.gov/zoning-board-adjustment. Please contact the Land Use department with any questions via phone at (603) 664-5798 or email at planning@barrington.nh.gov. Files on the applications and items, above, including the full text of any proposed ordinances, regulations, or other initiatives are available for inspection in the Land Use Department Office, Monday through Thursday from 8:00 a.m. to 3:00 p.m.

Special Accommodations

The Town of Barrington requires 48 hours' notice if the meeting must be modified for your participation or if special communication aides are needed. Please submit requests to the Land Use Department office via phone at (603) 664-5798 or email at planning@barrington.nh.gov.