

Exhibit O
Site Assessment Report

Kentucky State Board on Electric Generation and Transmission
Application for a Certificate to Construct a Merchant Generating Facility

SITE ASSESSMENT REPORT

Case No. 2020-00208

December 2020

NORTHERN BOBWHITE SOLAR LLC PROJECT
MARION COUNTY, KENTUCKY

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1.0 Description of Proposed Site

REQUIREMENT: per KRS 278.708 (3)(a); *A description of the proposed facility that shall include a proposed site development plan that describes:*

- 1. Surrounding land uses for residential, commercial, agricultural, and recreational purposes;*
- 2. The legal boundaries of the proposed site;*
- 3. Proposed access control to the site;*
- 4. The location of facility buildings, transmission lines, and other structures;*
- 5. Location and use of access ways, internal roads, and railways;*
- 6. Existing or proposed utilities to service the facility;*
- 7. Compliance with applicable setback requirements as provided under KRS 278.704(2), (3), (4), or (5); and*
- 8. Evaluation of the noise levels expected to be produced by the facility.*

COMPLIANCE: Northern Bobwhite Solar LLC (“Bobwhite”) is developing a solar facility (“the Project”). The proposed Project will be a 96 megawatt alternating current (“MWac”) photovoltaic (“PV”) electric generating facility. The proposed Project is to be located in unincorporated Marion County, KY, north of the City of Lebanon, KY and east of Highway 55 at approximate coordinates 37°36’56.80” N, -85°13’45.57” W. The Project will be situated on up to 1300 acres, which has historically been used for agriculture and farming. Project components will include PV solar panels and the associated ground-mounted racking structure, access roads, inverters, medium voltage transformers, buried electrical collection cabling, a step-up substation, a short 161-kilovolt (“kV”) transmission line, security fencing, laydown areas, and an operations and maintenance (“O&M”) building. The preliminary site development plan for the Project is located in **Appendix C**. Bobwhite will submit the final site plan to the Kentucky State Board on Electric Generation Siting (“the Board”) prior to construction.

Appendix C shows the following items that will not materially change during final design:

- Potential Project footprint (described in detail below, and depicted on the site plan)
- Project setbacks from property lines and roads
- Project setbacks from non-participating residential homes
- Distance from existing substation and Project step-up substation being less than 1 mile
- Minimum distance from central inverters and residential receptors

Any material changes to the Project characteristic of the above items would require approval from the Board. The preliminary plan shows the preliminary locations of the following equipment that will change during the detailed design process. Until detailed civil engineering and equipment manufacturing sourcing selections are made prior to construction, Bobwhite is not able to provide the exact location of these items. Changes to the location of these items will not require approval from the Board, as these modifications will not materially change the off-site visual or auditory perception of the facilities:

- Interior access roads
- Construction entrances
- Solar panel, racking, inverter, substation and transformer equipment areas (indicative locations for this equipment are shown on layout, but actual locations could change within the Project footprint)
- Gen-Tie Line footprint within the parcels identified in **Appendix C**
- Security fence (the security fence will enclose all Project equipment, but its location may change from the specific locations shown based on changes in the location of the equipment within the Project footprint)

1.1 Surrounding Land Uses

Per KRS 278.708(3)(a)(1); *Surrounding land uses for residential, commercial, agricultural, and recreational purposes.*

Surrounding land is primarily agricultural farmland with some residential properties. A detailed description of surrounding land uses is included in the Property Value Impact Study included in **Appendix A**.

1.2 Legal Boundaries

Per KRS 278.708(3)(a)(2); *The legal boundaries of the proposed site.*

The legal boundaries for the proposed site are provided in **Appendix B**.

1.3 Access Control

Per KRS 278.708(3)(a)(3); *Proposed access control to the site.*

Access to the site will be controlled through secure access points and the perimeter of the property will be enclosed by a security fence. **Appendix C** provides the Site Plan which shows the location of access points and control fences.

1.4 Site Plan

Per KRS 278.708(3)(a)(4); *The location of facility buildings, transmission lines, and other structures.*

Appendix C provides the Site Plan Overview showing the details of the proposed Project. Sheet 1 shows the proposed facility layout in its entirety including property boundaries, transmission lines, roads, site access points, laydown areas, etc. Sheets 2-5 are inset maps of Sheet 1 that provide a higher resolution site plan with more discernable features. Included are solar modules, inverters, wetlands, access points, parking areas, laydown areas, etc. **Appendix C** also includes vicinity and detail plans for the 161 kV transmission line included in the Project.

Buildings and Structures

The majority land use of the proposed site is for the installation of photovoltaic solar panels. Solar panels cover the majority of the site with the following constraints and setbacks (See **Appendix C** for proposed solar panel locations and setbacks);

- a) Field Delineated Wetland (50 ft setback)
- b) FEMA Flood Zone (25 ft setback)
- c) Transmission Line (69 kV and above) (100 ft setback)
- d) Pipeline Right of Way (50 ft from Pipeline)
- e) Road Right of Way (120 ft from centerline to solar installations)
- f) Non-Participating Property (50 ft to solar installation)
- g) Residence (200 ft setback to solar installation)
- h) Non-Participating Unoccupied Structure (100 ft setback to solar installation)

In addition to solar panels, inverters and medium voltage transformers are proposed to be installed throughout the site. Inverters will be delivered as pre-built, self-contained skids installed on gravel pads. A small maintenance building for O&M work may be constructed to store equipment and parts, the location of which will be determined during construction.

Gen-Tie Line

The 161-kV Marion County substation owned by Eastern Kentucky Power Cooperative (“EKPC”) is located near the south-west corner of the proposed site, outside of the Project boundary. The substation serves as a connection for multiple high voltage lines that run across the proposed site and will serve as the point of interconnection (“POI”) between the Project’s step-up substation and the regional transmission system.

EKPC and Bobwhite are designing the final configuration per the Interconnection Service Agreement in Exhibit J of the Application. EKPC’s equipment includes a 161-kilovolt (“kV”) isolation switch structure and associate switch, interconnection metering, fiber-optic connection and telecommunications equipment, circuit breaker and associate switches, and relay panel at the existing Marion County 161-kV substation to accept Bobwhite’s generator lead line/bus.

Bobwhite’s equipment includes a 161-kV attachment line between EKPC’s Marion County substation and the Project’s step-up substation (“Gen-Tie Line”). The step-up substation includes a 161-kV circuit breaker, 34.5-kV/161-kV generator step-up transformer, relay and protective equipment, supervisory control and data acquisition equipment, telecommunication equipment and metering equipment. The Gen-Tie Line will be approximately 700-1,000 feet in length. The exact length and position of the line will be determined by the final placement of the project substation and transmission line poles. Bobwhite currently assumes up to three poles will be placed along the transmission corridor. Poles will be made of wood or steel and approximately 70-100 feet in height.

1.5 Access/ Internal Roads

Per KRS 278.708(3)(a)(5); *Location and use of access ways, internal roads, and railways.*

Access to the facility is gained through nine controlled access points identified in **Appendix C**. Internal gravel roads will be constructed throughout the site and used to deliver construction materials and equipment from the laydown areas to other locations within the Project boundary. Preliminary internal roads are shown in **Appendix C**. Final internal road locations will be determined during detailed engineering. Once construction of the facility is complete and operational, internal roads will be used for routine maintenance of the facility and emergency access. Dust will be controlled by wetting roadways during dry conditions, heavy use, and other conditions requiring dust suppression. No railways will be used during the construction or operation of this facility (See **Appendix E**).

1.6 Utilities to Serve Facility

Per KRS 278.708(3)(a)(6); *Existing or proposed utilities to service the facility.*

The Project does not need electricity during normal daytime operations. During construction the Project will require electric service which will be either provided by Inter County Energy Cooperative, a Touchstone Energy Cooperative, or Kentucky Utilities depending on the location of the construction trailer. A small portion of the Project near the existing EKPC Marion County substation is located in the Kentucky Utilities service territory. When electricity is needed at night for the Project, it will be provided via the transmission level connection with potential billing through Inter County Energy Cooperative.

The Project will connect to EKPC's 161-kV Marion County substation via a 161-kV transmission line and a Project step-up substation. The Interconnection Service Agreement in Exhibit J and Interconnection Construction Service Agreement in Exhibit K of the Application describes the equipment, ownership and other responsibilities of Bobwhite, EKPC and PJM Interconnection, L.L.C.

1.7 Compliance with Setback Requirements

Per KRS 278.708(3)(a)(7); *Compliance with applicable setback requirements as provided under KRS 278.704(2), (3), (4), or (5).*

Marion County has not established setback requirements for the Project site. Additionally, the Project will not include exhaust stacks or wind turbines as part of the facility and, accordingly, there is no setback requirement from adjoining property boundaries. There is one residential neighborhood within 2,000 feet of the project boundary. Bobwhite will seek a deviation from this set back requirement pursuant to KRS 278.704(4).

1.8 Noise Impacts

Per KRS 278.708(3)(a)(8); *Evaluation of the noise levels expected to be produced by the facility.*

SMG, a division of ALL4, conducted a noise assessment to evaluate the noise levels expected to be produced during both the construction and operation of the proposed Project. The noise assessment is located in **Appendix D**.

2.0 Compatibility with Scenic Surrounding

REQUIREMENT: per KRS 278.708 (3)(b); *An evaluation of the compatibility of the facility with scenic surroundings*

COMPLIANCE:

By nature of their operation, solar farms are a passive use of the land that is in keeping with a rural/residential area. As shown in the Property Value Impact Analysis **Appendix A**, solar farms are comparable to larger greenhouses. Since solar panels are usually less than 15 feet high at their highest tilt, their visual impact is similar to that of a greenhouse and lower than that of a single-story residential dwelling. In comparison, if single-family housing were developed on this land, that development would have a much greater visual impact on the surrounding area given that a two-story home with attic could be three to four times as high as the proposed panels.

As with most large-scale solar facilities in the Southeast and Midwest, the Project will be located on property that is primarily zoned agriculture or agriculture-residential; only 5.26% of the adjoining land is zoned residential. As such, the land is currently used mostly for agricultural purposes, primarily grazing or hay production with some grain production scattered throughout.

As the Project is designed, the closest home will be at least 200 feet away and the average distance to homes on adjoining parcels is 1,192 feet. There is only one residential neighborhood within 2000 feet of any of the participating parcels.

The land under the Project is generally rolling to flat with some steeper areas along streams that will be avoided. Large portions of the site are in areas that will not be visible from any roadways or neighbors.

Wherever possible, the site will maintain natural vegetative screening. In those areas where the Project could be visible from a roadway or neighboring residence; Bobwhite will add a vegetative buffer to mitigate viewshed impacts. The visual impacts of the Project will be mitigated from neighboring homes and public roads in situations where solar panels and racking are located within 500 feet of a non-participating homeowner or within 300 feet of a public roadway, unless sufficient natural visual buffering already exists such as vegetation or natural topography. Where mitigation is warranted, a vegetative buffer will be planted with trees or shrubs as described in the Conceptual Visual Mitigation Planting Plan provided in **Appendix I**. The final location of any visual buffering will be determined by the ultimate Project layout and design while maintaining the previously described buffering distance and criteria. In addition, an indicative rendering of this proposed vegetative buffer is provided as **Appendix E**. An initial representative buffering plan was shared on the Bobwhite's website and with neighbors at the Bobwhite's community information meetings. Through the Project's use of setbacks and vegetative screening, the siting and operation of the Project is in harmony with its rural, agricultural surroundings.

Gen-Tie Line

As described above and shown in **Appendix C**, the Project's Gen-Tie Line is proposed to be located in the southwest corner of the Project connecting the Project's step-up substation with the EKPC Marion County substation. The Gen-Tie Line will be approximately 700 to 1000 feet in length. Bobwhite currently assumes up to three poles will be placed along the transmission corridor and that these poles will be made of wood or steel and approximately 70-100 feet in height.

The proposed Gen-Tie line will be located in the vicinity of existing transmission infrastructure including two 100-161 kV lines and one 345 kV transmission. Considering the existing transmission infrastructure already in the location and its limited scale, the Project's proposed Gen-Tie line is unlikely to materially alter the Project's scenic surroundings.

3.0 Property Value Impact Study

REQUIREMENT: per KRS 278.708 (3)(c); The potential changes in property values and land use resulting from the siting, construction, and operation of the proposed facility for property owners adjacent to the facility

COMPLIANCE:

Kirkland Appraisals, LLC conducted an independent study of the Project area. The Property Value Impact Study is provided in **Appendix A**.

4.0 Noise Impact Study

REQUIREMENT: per KRS 278.708 (3)(d); *Evaluation of anticipated peak and average noise levels associated with the facility's construction and operation at the property boundary.*

COMPLIANCE:

SMG a division of ALL4 conducted an evaluation of peak and average noise levels anticipated from equipment and traffic (truck deliveries), as well as expected noise emissions during operations, to determine anticipated noise impacts from the project. A detailed report is provided in **Appendix D**.

Noise generated from construction activities and solar panel installation as well as operational activities should have minimal impact on the nearest residential receptors. Impacts from construction noise will be intermittent, temporary and will diminish as construction activities progress and move further away from a given receptor. Once the project is operational, noise sources such as inverters, transformers and tracking system motors are not expected to be significant contributors to local noise levels.

5.0 Traffic Impact Study

REQUIREMENT: per KRS 278.708 (3)(e); *The impact of the facility's operation on road and rail traffic to and within the facility, including anticipated levels of fugitive dust created by the traffic and any anticipated degradation of roads and lands in the vicinity of the facility.*

COMPLIANCE:

The traffic assessment is provided in **Appendix E**. Traffic in the Project vicinity is expected to temporarily increase during the construction phase of the Project. The largest increase in traffic will occur in mornings and evenings when construction workers are arriving and departing from the site during Project construction. There will be an increase of Class 9 freight trucks in the Project vicinity as deliveries are made to the site. Most of the traffic will travel via, KY-55, KY-1195 and KY-1406 which are principal arterial and minor collector roads and designed to handle high levels of traffic. Local roads will experience the most significant changes in traffic volumes. Based on ADT data, the existing traffic on these roads is low and the increase in construction traffic will not cause any significant issues. Appropriate signage and traffic control will be implemented to increase driver safety and reduce the risk of accidents on all roads that will be used for construction traffic. Upon the completion of the construction phase of the Project, traffic levels will return to their pre-construction levels for the operational phase. Traffic for operation and maintenance of the facility will typically be less than a typical single-family home and will have little to no effect on traffic.

Bobwhite does not anticipate significant degradation to the local roads. However, a road condition survey will be conducted to provide current road conditions prior to the start of construction. After construction is complete, Bobwhite will assess the same area and mitigate as necessary.

6.0 Mitigation Measures

REQUIREMENT: per KRS 278.708(4); *The site assessment report shall also suggest any mitigating measures to be implemented by the applicant to minimize or avoid adverse effects identified in the site assessment report;* and per KRS 278.708(6); *The applicant shall be given the opportunity to present evidence to the board regarding any mitigation measures. As a condition of approval for an application to obtain a construction certificate, the board may require the implementation of any mitigation measures that the board deems appropriate.*

COMPLIANCE:

While Marion County does not have zoning in the county, Bobwhite has kept the County Judge Executive aware of the development and designs. The Project is designed with the following minimum setbacks for solar generating equipment: 50 feet from the boundary of any non-participating properties and 100 feet from roadways. Additionally, the Project inverters will be placed at least 300 feet from any residence. Project construction activities will only occur between the hours of 7:00 AM and 10:00 PM. The Noise Assessment prepared by SMG for Bobwhite demonstrated that mitigation for noise impacts beyond these measures is not required. A copy of the Noise Assessment is included as **Appendix D**.

Wherever possible, the site will maintain natural vegetative screening; however, where the Project could be visible from a roadway or neighboring residence, the Project will add a vegetative buffer to mitigate viewshed impacts. Bobwhite will install vegetative buffering where natural screening is not present if solar panels or inverters are sited within 500 feet of a residence within direct line of site, or if solar panels or inverters are located within 300 feet of a public roadway within direct line of site. The Conceptual Visual Mitigation Planting Plan in Appendix I provides additional details on the Applicant's approach to viewshed mitigation.

The Project site is near a small municipal airport, to the north. Bobwhite will follow Federal Aviation Administration (FAA) guidelines for determining glare issues for ingress and egress from the airport. Based on other solar developments near larger airports, Bobwhite does not anticipate any mitigation with respect to glare.

Terracon completed Phase I Environmental Site Assessments for the parcels that comprise the facility. The Assessments are provided in **Appendix F**. This assessment provides a baseline for returning property to its current condition after decommissioning.

Bobwhite engaged Terracon to complete a wetland survey and delineation of the Project site. Identified wetlands and jurisdictional waters will be avoided during construction and operation to the extent practicable. Note the total acreage assessed may not equal the total acreage of the Project. The assessment covered areas outside the preliminary site layout. As an example, a parcel that contained only easements may have been assessed across the entire parcel and not just the easement. If necessary, it is

anticipated that the Project would utilize applicable USACE Nationwide Permits. Any required USACE permits or DOW permits will be obtained prior to commencement of construction. The report is provided in **Appendix G**.

A threatened and endangered species report is provided in **Appendix H**. The presence of potential habitat for the Indiana and Northern long-eared bats requires that any tree clearing would need to be performed seasonally or additional investigations and consultation with regulatory agencies may be necessary. Bobwhite will take this into consideration when determining any tree clearing and coordinate as necessary with the regulatory agencies.

7.0 Bibliography

LG&E and KU Transmission Planning. 2020. AE1-143 Affected System Study. Study and Preliminary Report by Aneden Consulting Inc. July 21, 2020.

Appendix A
Property Value Impact



Kirkland Appraisals, LLC

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December 3, 2020

Ms. Kara Price
Geenex
7804-C Fairview Road, #257
Charlotte, NC 28226

RE: Northern Bobwhite Solar Impact Study, Lebanon, Marion County, KY

Ms. Price,

At your request, I have considered the impact of a solar farm proposed to be constructed on approximately 1,281 acres out of a parent tract assemblage of 1,539.91 acres on Simmstown Road, Lebanon, Kentucky. Specifically, I have been asked to give my professional opinion on whether the proposed solar farm will have any impact on adjoining property value and whether “the location and character of the use, if developed according to the plan as submitted and approved, will be in harmony with the area in which it is to be located.”

To form an opinion on these issues, I have researched and visited existing and proposed solar farms in Kentucky as well as other states, researched articles through the Appraisal Institute and other studies, and discussed the likely impact with other real estate professionals. I have not been asked to assign any value to any specific property.

This letter is a limited report of a real property appraisal consulting assignment and subject to the limiting conditions attached to this letter. My client is Geenex represented to me by Kara Price. My findings support the Kentucky Siting Board Application. The effective date of this consultation is December 3, 2020.

While based in NC, I am also a Kentucky State Certified General Appraiser #5522.

Conclusion

The matched pair analysis shows no impact in home values due to abutting or adjoining a solar farm as well as no impact to abutting or adjacent vacant residential or agricultural land. The criteria that typically correlates with downward adjustments on property values such as noise, odor, and traffic all indicate that a solar farm is a compatible use for rural/residential transition areas and that it would function in a harmonious manner with this area.

Very similar solar farms in very similar areas have been found by hundreds of towns and counties not to have a substantial injury to abutting or adjoining properties, and many of those findings of no impact have been upheld by appellate courts. Similar solar farms have been approved adjoining agricultural uses, schools, churches, and residential developments.

Based on the data and analysis in this report, it is my professional opinion that the solar farm proposed at the subject property will have no impact on the value of adjoining or abutting property and that the proposed use is in harmony with the area in which it is located. I note that some of the positive implications of a solar farm that have been expressed by people living next to solar farms include protection from future development of residential developments or other more

intrusive uses, reduced dust, odor and chemicals from former farming operations, protection from light pollution at night, it's quiet, and there is minimal traffic.

If you have any further questions please call me any time.

Sincerely,



Richard C. Kirkland, Jr., MAI
Kentucky Certified General Appraiser #5522

Standards and Methodology

I conducted this analysis using the standards and practices established by the Appraisal Institute and that conform to the Uniform Standards of Professional Appraisal Practice. The analyses and methodologies contained in this report are accepted by all major lending institutions, and they are used in Kentucky and across the country as the industry standard by certified appraisers conducting appraisals, market analyses, or impact studies and are considered adequate to form an opinion of the impact of a land use on neighboring properties. These standards and practices have also been accepted by the courts at the trial and appellate levels and by federal courts throughout the country as adequate to reach conclusions about the likely impact a use will have on adjoining or abutting properties.

The aforementioned standards compare property uses in the same market and generally within the same calendar year so that fluctuating markets do not alter study results. Although these standards do not require a linear study that examines adjoining property values before and after a new use (e.g. a solar farm) is developed, some of these studies do in fact employ this type of analysis. Comparative studies, as used in this report, are considered an industry standard.

Determining what is an External Obsolescence

An external obsolescence is a use of property that, because of its characteristics, might have a negative impact on the value of adjacent or nearby properties because of identifiable impacts. Determining whether a use would be considered an external obsolescence requires a study that isolates that use, eliminates any other causing factors, and then studies the sales of nearby versus distant comparable properties. The presence of one or a combination of key factors does not mean the use will be an external obsolescence, but a combination of these factors tend to be present when market data reflects that a use is an external obsolescence.

External obsolescence is evaluated by appraisers based on several factors. These factors include but are not limited to:

- 1) Traffic. Solar Farms are not traffic generators.
- 2) Odor. Solar farms do not produce odor.
- 3) Noise. Solar farms generate no noise concerns and are silent at night.
- 4) Environmental. Solar farms do not produce toxic or hazardous waste. Grass is maintained underneath the panels so there is minimal impervious surface area.
- 5) Other factors. I have observed and studied many solar farms and have never observed any characteristic about such facilities that prevents or impedes neighbor from fully using their homes or farms or businesses for the use intended.

Proposed Use Description

The proposed solar farm is proposed to be constructed on approximately 1,281 acres out of a parent tract assemblage of 1,539.91 acres on Simmstown Road, Lebanon, Kentucky.

Adjoining Properties

Adjoining Properties

I have considered adjoining uses and included a map to identify each parcel's location. The closest home will be at least 200 feet away and the average distance to adjoining homes is 1,162 feet. Matched pairs that I have researched show no impact for distances as close as 105 feet.

The breakdown of those uses by acreage and number of parcels is summarized below.

Adjoining Use Breakdown

	Acreage	Parcels
Residential	5.26%	46.55%
Agricultural	37.99%	24.14%
Agri/Res	56.43%	27.59%
Substation	0.32%	1.72%
Total	100.00%	100.00%





Surrounding Uses

#	MAP ID	Owner	GIS Data		Adjoin	Adjoin	Distance (ft)
			Acres	Present Use	Acres	Parcels	Home/Panel
1		Unknown	0.00	Unknown	0.00%	0.00%	N/A
2		Unknown	0.00	Unknown	0.00%	0.00%	N/A
3	077-003	Hays	117.00	Agri/Res	3.77%	1.72%	2,450
4	077-003-01	Glasscock	11.02	Residential	0.36%	1.72%	N/A
5	077-001-08	Hamilton	48.73	Agri/Res	1.57%	1.72%	1,410
6	077-001	Lawson	64.23	Agricultural	2.07%	1.72%	N/A
7	077-015	Wright	104.00	Agri/Res	3.36%	1.72%	2,305
8	070-024	Johnson	125.00	Agri/Res	4.03%	1.72%	2,545
9	070-033	Clark	110.00	Agri/Res	3.55%	1.72%	2,550
10	070-023	Harmon	34.00	Agri/Res	1.10%	1.72%	2,470
11	070-017-06	Robinson	35.99	Agricultural	1.16%	1.72%	N/A
12	070-017-01	Tracey	12.76	Residential	0.41%	1.72%	330
13	070-035	Cambell	50.24	Agri/Res	1.62%	1.72%	250
14	070-007-02	Abell	8.79	Residential	0.28%	1.72%	395
15	070-007	Clark	93.43	Agri/Res	3.01%	1.72%	1,600
16	070-001	Grubbs	119.70	Agricultural	3.86%	1.72%	N/A

#	MAP ID	Owner	GIS Data		Adjoin	Adjoin	Distance (ft)
			Acres	Present Use	Acres	Parcels	Home/Panel
17	070-003-03	Sabdusky	40.98	Agricultural	1.32%	1.72%	N/A
18	070-004	Kutter	121.96	Agri/Res	3.93%	1.72%	1,455
19	070-030A	Hunt	2.00	Residential	0.06%	1.72%	530
20	070-018-01	Pittman	6.06	Residential	0.20%	1.72%	625
21	070-018	Leake	16.74	Residential	0.54%	1.72%	N/A
22	070-018-08	Leake	5.42	Residential	0.17%	1.72%	665
23	070-018-02	Ballinger	10.06	Residential	0.32%	1.72%	510
24	070-034	Leake	5.00	Residential	0.16%	1.72%	465
25	070-011	Hardin	42.00	Agricultural	1.36%	1.72%	N/A
26	070-015	Hardin	46.60	Agricultural	1.50%	1.72%	N/A
27	070-010-01	Mattingly	5.49	Residential	0.18%	1.72%	345
28	070-010-03	Tucker	1.34	Residential	0.04%	1.72%	875
29	070-010-04	Cook	2.60	Residential	0.08%	1.72%	775
30	070-008-14	Gootee	1.15	Residential	0.04%	1.72%	1,035
31	063-005	Routin	61.29	Agri/Res	1.98%	1.72%	655
32	063-006	Mattingly	163.35	Agricultural	5.27%	1.72%	N/A
33	070-002-01	Marion Co	37.00	Agricultural	1.19%	1.72%	N/A
34	070-001	Grubbs	119.70	Agricultural	3.86%	1.72%	N/A
35	063-008	Parkers	122.37	Agricultural	3.95%	1.72%	N/A
36	063-008-01	Brown	2.90	Residential	0.09%	1.72%	255
37	063-022	MLM Rentals	0.50	Residential	0.02%	1.72%	200
38	063-011-02	Robbins	4.50	Residential	0.15%	1.72%	955
39	063-008-03	Dedman	2.50	Residential	0.08%	1.72%	1,155
40	063-008-02-02	Deering	3.10	Residential	0.10%	1.72%	1,500
41	063-010	Tatum	309.00	Agri/Res	9.97%	1.72%	2,845
42	070-012	Bradshaw	36.01	Agri/Res	1.16%	1.72%	510
43	070-013	Montgomery	147.75	Agricultural	4.77%	1.72%	N/A
44	071-001A	Bradshaw	7.81	Residential	0.25%	1.72%	1,615
45	064-002-01	Bradshaw	6.92	Residential	0.22%	1.72%	N/A
46	064-002-06	Mimicael	6.00	Residential	0.19%	1.72%	270
47	064-003-02	Mullins	10.04	Residential	0.32%	1.72%	745
48	064-003	Bradshaw	110.78	Agri/Res	3.57%	1.72%	815
49	054-001	Goodwin	118.76	Agricultural	3.83%	1.72%	N/A
50	064-001-01	Begley	8.65	Residential	0.28%	1.72%	605
51	064-006A-01	Murphy	1.76	Residential	0.06%	1.72%	565
52	064-041	Murphy	1.50	Residential	0.05%	1.72%	310
53	062-042B	Cook	17.70	Residential	0.57%	1.72%	N/A
54	063-016	Unknown	10.05	Substation	0.32%	1.72%	N/A
55	055-052	Mattlingly	78.20	Agricultural	2.52%	1.72%	N/A
56	063-015-02	Farmer	0.71	Residential	0.02%	1.72%	1,625
57	055-006	Gootee	147.00	Agri/Res	4.74%	1.72%	2,975
58	063-015-01	Clark	40.84	Agricultural	1.32%	1.72%	N/A
59	063-014	Averitt	107.70	Agri/Res	3.47%	1.72%	2,635
60	063-002-02	Beams Abell	172.79	Agri/Res	5.57%	1.72%	1,480
Total			3099.469		100.00%	100.00%	1,162

I. Summary of Solar Projects in Kentucky

I have researched the solar projects in Kentucky. I identified the solar farms through the Solar Energy Industries Association (SEIA) Major Projects List and then excluded the roof mounted facilities. This leaves only six solar farms in Kentucky for analysis at this time.

One of these six solar farms has limited analysis potential: E.W. Brown near Harrodsburg in Mercer County. The E. W. Brown 10 MW solar farm was built in 2014 and adjoins three coal-fired units. Given that research studies that I have read regarding fossil fuel power plants including “The Effect of Power Plants on Local Housing Values and Rents” by Lucas W. Davis and published May 2010, it would not be appropriate to use any data from this solar farm due to the influence of the coal fired power plant that could have an impact on up to a one-mile radius. I note that the closest home to a solar panel at this site is 565 feet and the average distance is 1,026 feet. The homes are primarily clustered at the Herrington Lake frontage. Recent sales in this area range from \$164,000 to \$212,000 for these waterfront homes. Again, no usable data can be derived from this solar farm due to the adjoining coal fired plant.

Furthermore, the Cooperative solar farm in Shelby County is a 0.5 MW facility on 35 acres built in 2020 that is proposed to eventually be 4 MW. This project is too new and there have been no home sales adjoining this facility. I also cannot determine how close the nearby homes are to the adjoining solar panels as the aerial imagery does not yet show these panels.

I have provided a summary of projects below and additional detailed information on the projects on the following pages. I specifically note the similarity in most of the sites in Kentucky as compared to most of the states that I have searched before in terms of mix of adjoining uses, topography, and distances to adjoining homes.

The number of solar farms currently in Kentucky is low compared to a number of other states and NC in particular. I have looked at solar farms in Kentucky for sales activity, but the small number of sites coupled with the relatively short period of time these solar farms have been in place has not provided as many examples of sales adjoining a solar farm as I am able to pull from other places. I have therefore also considered sales in other states, but I have shown in the summary how the demographics around the solar farms in other locations relate to the demographics around the proposed solar farm to show that generally similar locations are being considered. The similarity of the sites in terms of adjoining uses and surrounding demographics makes it reasonable to compare the lack of significant impacts in other areas would translate into a similar lack of significant impact at the subject site.

Parcel #	State	County	City	Name	Output (MW)	Total Acres	Used Acres	Avg. Dist to home	Closest Home	Adjoining Use by Acre			
										Res	Agri	Agri/Res	Com
610	KY	Warren	Bowling Green	Bowling Green	2	17.36	17.36	720	720	1%	64%	0%	36%
611	KY	Clarky	Winchester	Cooperative Solar I	8.5	181.47	63	2,110	2,040	0%	96%	3%	0%
612	KY	Kenton	Walton	Walton 2	2	58.03	58.03	891	120	21%	0%	60%	19%
613	KY	Grant	Crittenden	Crittenden	2.7	181.7	34.1	1,035	345	22%	27%	51%	0%
659	KY	Shelby	Simpsonville	Cooperative Shelby	4	35	35			6%	11%	32%	52%
660	KY	Mercer	Harrodsburg	E.W. Brown	10	50	50	1,026	565	3%	44%	29%	25%
Total Number of Solar Farms					6								
Average					4.87	87.3	42.9	1156	758	9%	40%	29%	22%
Median					3.35	54.0	42.5	1026	565	4%	36%	30%	22%
High					10.00	181.7	63.0	2110	2040	22%	96%	60%	52%
Low					2.00	17.4	17.4	720	120	0%	0%	0%	0%

610: Bowling Green Solar, Bowling Green, KY



This project was built in 2011 and located on 17.36 acres for a 2 MW project on Scotty's Way with the adjoining uses being primarily industrial. The closest dwelling is 720 feet from the nearest panel.

Adjoining Use Breakdown

	Acreage	Parcels
Residential	0.58%	10.00%
Agricultural	63.89%	30.00%
Industrial	35.53%	60.00%
Total	100.00%	100.00%

611: Cooperative Solar I, Winchester, KY



This project was built in 2017 on 63 acres of a 181.47-acre parent tract for an 8.5 MW project with the closest home at 2,040 feet from the closest solar panel.

Adjoining Use Breakdown

	Acreage	Parcels
Residential	0.15%	11.11%
Agricultural	96.46%	77.78%
Agri/Res	3.38%	11.11%
Total	100.00%	100.00%

612: Walton 2 Solar, Walton, KY



This project was built in 2017 on 58.03 acres for a 2 MW project with the closest home 120 feet from the closest panel.

Adjoining Use Breakdown

	Acreage	Parcels
Residential	20.84%	47.06%
Agri/Res	59.92%	17.65%
Commercial	19.25%	35.29%
Total	100.00%	100.00%

613: Crittenden Solar, Crittenden, KY



This project was built in late 2017 on 34.10 acres out of a 181.70-acre tract for a 2.7 MW project where the closest home is 345 feet from the closest panel.

Adjoining Use Breakdown

	Acreage	Parcels
Residential	1.65%	32.08%
Agricultural	73.39%	39.62%
Agri/Res	23.05%	11.32%
Commercial	0.64%	9.43%
Industrial	0.19%	3.77%
Airport	0.93%	1.89%
Substation	0.15%	1.89%
Total	100.00%	100.00%

659: Cooperative Shelby Solar, Simpsonville, KY



This project was built in 2020 on 35 acres for a 0.5 MW project that is approved for expansion up to 4 MW.

Adjoining Use Breakdown

	Acreage	Parcels
Residential	6.04%	44.44%
Agricultural	10.64%	11.11%
Agri/Res	31.69%	33.33%
Institutional	51.62%	11.11%
Total	100.00%	100.00%

660: E.W. Brown Solar, Harrodsburg, KY



This project was built in 2016 on 50 acres for a 10 MW project. This solar facility adjoins three coal-fired units, which makes analysis of these nearby home sales problematic as it is impossible to extract the impact of the coal plant on the nearby homes especially given the lake frontage of the homes shown.

Adjoining Use Breakdown

	Acreage	Parcels
Residential	2.77%	77.27%
Agricultural	43.92%	9.09%
Agri/Res	28.56%	9.09%
Industrial	24.75%	4.55%
Total	100.00%	100.00%

II. Market Analysis of the Impact on Value from Solar Farms

I have researched hundreds of solar farms in numerous states to determine the impact of these facilities on the value of adjoining property. This research has primarily been in North Carolina, but I have also conducted market impact analyses in Virginia, South Carolina, Tennessee, Texas, Oregon, Mississippi, Maryland, New York, California, Missouri, Florida, Montana, Georgia, Kentucky, and New Jersey.

Wherever I have looked at solar farms, I have derived a breakdown of the adjoining uses to show what adjoining uses are typical for solar farms and what uses would likely be considered consistent with a solar farm use similar to the breakdown that I've shown for the subject property on the previous page. A summary showing the results of compiling that data over hundreds of solar farms is shown later in the Scope of Research section of this report.

I also consider whether the properties adjoining a solar farm in one location have characteristics similar to the properties abutting or adjoining the proposed site so that I can make an assessment of market impact on each proposed site. Notably, in most cases solar farms are placed in areas very similar to the site in question, which is surrounded by low density residential and agricultural uses. In my over 650 studies, I have found a striking repetition of that same typical adjoining use mix in over 90% of the solar farms I have looked at. Matched pair results in multiple states are strikingly similar, and all indicate that solar farms – which generate very little traffic, and do not generate noise, dust or have other harmful effects – do not negatively impact the value of adjoining or abutting properties.

I have previously been asked by the Kentucky Siting Board about how the 37 solar farms and the 84 matched pair sets were chosen. This is the total of all the usable home and land sales adjoining the 650+ solar farms that I have looked at over the last 9 years. Most of the solar farms that I have looked at are only a few years old and have not been in place long enough for home or land sales to occur next to them for me to analyze. There is nothing unusual about this given the relatively rural locations of most of the solar farms where home and land sales occur much less frequently and the number of adjoining homes is relatively small.

Essentially, I go back through the solar farms that I have looked at roughly once a year to see if there are any new sales. If there is a sale I have to be sure it is not an inhouse sale or to a related family member. A great many of the rural sales that I find are from one family member to another, which makes analysis impossible given that these are not “arm’s length” transactions. There are also numerous examples of sales that are “arm’s length” but are still not usable due to other factors such as adjoining significant negative factors such as a coal fired plant or at a landfill or prison. I have looked at homes that require a driveway crossing a railroad spur, homes in close proximity to large industrial uses, as well as homes adjoining large state parks, or homes that are over 100 years old with multiple renovations. Such sales are not usable as they have multiple factors impacting the value that are tangled together. You can’t isolate the impact of the coal fired plant, the industrial building, or the railroad unless you are comparing that sale to a similar property with similar impacts. Matched pair analysis requires that you isolate properties that only have one differential to test for, which is why the type of sales noted above is not appropriate for analysis.

So once I go through all of the sales and eliminate the family transactions and those sales with multiple differentials, I am left with 84 matched pairs to analyze. The only other sales that I have eliminated from the analysis are home sales under \$100,000, which there haven’t been many such examples, but at that price range it is difficult to identify any impacts through matched pair analysis. As can be seen from a later question, I have not cherry picked the data to include just the sales that support one direction in value, but I have included all of them both positive and negative with a preponderance of the evidence supporting no impact to mild positive impacts.

A. *Kentucky Data*

1. Matched Pair – Crittenden Solar, Crittenden, KY



This solar farm was built in December 2017 on a 181.70-acre tract but utilizing only 34.10 acres. This is a 2.7 MW facility with residential subdivisions to the north and south.

I have identified five home sales to the north of this solar farm on Claiborne Drive and one home sale to the south on Eagle Ridge Drive since the completion of this solar farm. The home sale on Eagle Drive is for a \$75,000 home and all of the homes along that street are similar in size and price range. According to local broker Steve Glacken with Cutler Real Estate these are the lowest price range/style home in the market. I have not analyzed that sale as it would unlikely provide significant data to other homes in the area.

Mr. Glacken is currently selling lots at the west end of Claiborne for new home construction. He indicated that the solar farm near the entrance of the development has been a complete non-factor and none of the home sales are showing any concern over the solar farm. Most of the homes are in the \$250,000 to \$280,000 price range on lots being marketed for \$28,000 to \$29,000.

The first home considered is a bit of an anomaly for this subdivision in that it is the only manufactured home that was allowed in the community. It sold on January 3, 2019. I compared that sale to three other manufactured home sales in the area making minor adjustments as shown on the next page to account for the differences. After all other factors are considered the adjustments show a -1% to +13% impact due to the adjacency of the solar farm. The best indicator is 1250 Cason, which shows a 3% impact. A 3% impact is within the normal static of real estate transactions and therefore not considered indicative of a positive impact on the property, but it strongly supports an indication of no negative impact.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	250 Claiborne	0.96	1/3/2019	\$120,000	2000	2,016	\$59.52	3/2	Drive	Manuf	
	Not	1250 Cason	1.40	4/18/2018	\$95,000	1994	1,500	\$63.33	3/2	2-Det	Manuf	Carport
	Not	410 Reeves	1.02	11/27/2018	\$80,000	2000	1,456	\$54.95	3/2	Drive	Manuf	
	Not	315 N Fork	1.09	5/4/2019	\$107,000	1992	1,792	\$59.71	3/2	Drive	Manuf	

Adjustments

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
Adjoins	250 Claiborne								\$120,000			373
Not	1250 Cason	\$2,081		\$2,850	\$26,144		-\$5,000	-\$5,000	\$116,075	3%		
Not	410 Reeves	\$249		\$0	\$24,615				\$104,865	13%		
Not	315 N Fork	-\$1,091		\$4,280	\$10,700				\$120,889	-1%		
											5%	

I also looked at three other home sales on this street as shown below. These are stick-built homes and show a higher price range.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	300 Claiborne	1.08	9/20/2018	\$212,720	2003	1,568	\$135.66	3/3	2-Car	Ranch	Brick
	Not	460 Claiborne	0.31	1/3/2019	\$229,000	2007	1,446	\$158.37	3/2	2-Car	Ranch	Brick
	Not	2160 Sherman	1.46	6/1/2019	\$265,000	2005	1,735	\$152.74	3/3	2-Car	Ranch	Brick
	Not	215 Lexington	1.00	7/27/2018	\$231,200	2000	1,590	\$145.41	5/4	2-Car	Ranch	Brick

Adjustments

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
Adjoins	300 Claiborne								\$213,000			488
Not	460 Claiborne	-\$2,026		-\$4,580	\$15,457	\$5,000			\$242,850	-14%		
Not	2160 Sherman	-\$5,672		-\$2,650	-\$20,406				\$236,272	-11%		
Not	215 Lexington	\$1,072		\$3,468	-\$2,559	-\$5,000			\$228,180	-7%		
											-11%	

This set of matched pairs shows a minor negative impact for this property. I was unable to confirm the sales price or conditions of this sale. The best indication of value is based on 215 Lexington, which required the least adjusting and supports a -7% impact.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	350 Claiborne	1.00	7/20/2018	\$245,000	2002	1,688	\$145.14	3/3	2-Car	Ranch	Brick
	Not	460 Claiborne	0.31	1/3/2019	\$229,000	2007	1,446	\$158.37	3/2	2-Car	Ranch	Brick
	Not	2160 Sherman	1.46	6/1/2019	\$265,000	2005	1,735	\$152.74	3/3	2-Car	R/FBsmt	Brick
	Not	215 Lexington	1.00	7/27/2018	\$231,200	2000	1,590	\$145.41	5/4	2-Car	Ranch	Brick

Adjustments

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
Adjoins	350 Claiborne								\$245,000			720
Not	460 Claiborne	-\$3,223		-\$5,725	\$30,660	\$5,000			\$255,712	-4%		
Not	2160 Sherman	-\$7,057		-\$3,975	-\$5,743				\$248,225	-1%		
Not	215 Lexington	-\$136		\$2,312	\$11,400	-\$5,000			\$239,776	2%		
											-1%	

This set of matched pairs shows a no negative impact for this property. The range of adjusted impacts is -4% to +2%. The best indication is -1%, which as described above is within the typical market static and supports no impact on adjoining property value.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	370 Claiborne	1.06	8/22/2019	\$273,000	2005	1,570	\$173.89	4/3	2-Car	2-Story	Brick
	Not	2160 Sherman	1.46	6/1/2019	\$265,000	2005	1,735	\$152.74	3/3	2-Car	R/FBsmt	Brick
	Not	2290 Dry	1.53	5/2/2019	\$239,400	1988	1,400	\$171.00	3/2.5	2-Car	R/FBsmt	Brick
	Not	125 Lexington	1.20	4/17/2018	\$240,000	2001	1,569	\$152.96	3/3	2-Car	Split	Brick

Adjustments											Avg	
Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
Adjoins	370 Claiborne								\$273,000			930
Not	2160 Sherman	\$1,831		\$0	-\$20,161				\$246,670	10%		
Not	2290 Dry	\$2,260		\$20,349	\$23,256	\$2,500			\$287,765	-5%		
Not	125 Lexington	\$9,951		\$4,800					\$254,751	7%		
											4%	

This set of matched pairs shows a general positive impact for this property. The range of adjusted impacts is -5% to +10%. The best indication is +7%. I typically consider measurements of +/-5% to be within the typical variation in real estate transactions. This indication is higher than that and suggests a positive relationship.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
Adjoins	330 Claiborne	1.00	12/10/2019	\$282,500	2003	1,768	\$159.79	3/3	2-Car	Ranch	Brick/pool
Not	895 Osborne	1.70	9/16/2019	\$249,900	2002	1,705	\$146.57	3/2	2-Car	Ranch	Brick/pool
Not	2160 Sherman	1.46	6/1/2019	\$265,000	2005	1,735	\$152.74	3/3	2-Car	R/FBSmt	Brick
Not	215 Lexington	1.00	7/27/2018	\$231,200	2000	1,590	\$145.41	5/4	2-Car	Ranch	Brick

											Avg	
Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
Adjoins	330 Claiborne								\$282,500			665
Not	895 Osborne	\$1,790		\$1,250	\$7,387	\$5,000		\$0	\$265,327	6%		
Not	2160 Sherman	\$4,288		-\$2,650	\$4,032			\$20,000	\$290,670	-3%		
Not	215 Lexington	\$9,761		\$3,468	\$20,706	-\$5,000		\$20,000	\$280,135	1%		
											1%	

This set of matched pairs shows a general positive impact for this property. The range of adjusted impacts is -3% to +6%. The best indication is +6%. I typically consider measurements of +/-5% to be within the typical variation in real estate transactions. This indication is higher than that and suggests a positive relationship.

The five matched pairs considered in this analysis includes two that show no impact on value, one that shows a negative impact on value, and two that show a positive impact. The negative indication supported by one matched pair is -7% and the positive impacts are +6% and +7%. The two neutral indications show impacts of -1% and +3%. The average indicated impact is +0% when all five of these indicators are blended.

Furthermore, the comments of the local broker strongly support the data that shows no negative impact on value due to the proximity to the solar farm. This is further supported by the national data that is shown on the following pages.

B. National Data

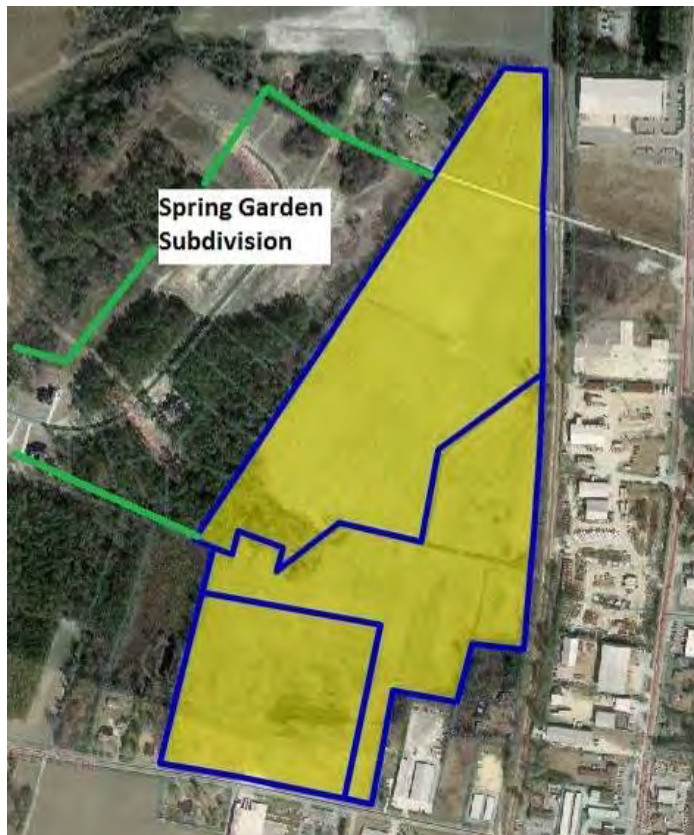
1. Matched Pair – AM Best Solar Farm, Goldsboro, NC

This solar farm adjoins Spring Garden Subdivision which had new homes and lots available for new construction during the approval and construction of the solar farm. The recent home sales have ranged from \$200,000 to \$250,000. This subdivision sold out the last homes in late 2014. The solar farm is clearly visible particularly along the north end of this street where there is only a thin line of trees separating the solar farm from the single-family homes.






Homes backing up to the solar farm are selling at the same price for the same floor plan as the homes that do not back up to the solar farm in this subdivision. According to the builder, the solar farm has been a complete non-factor. Not only do the sales show no difference in the price paid for the various homes adjoining the solar farm versus not adjoining the solar farm, but there are actually more recent sales along the solar farm than not. There is no impact on the sellout rate, or time to sell for the homes adjoining the solar farm.

I spoke with a number of owners who adjoin the solar farm and none of them expressed any concern over the solar farm impacting their property value.

The data presented on the following page shows multiple homes that have sold in 2013 and 2014 adjoining the solar farm at prices similar to those not along the solar farm. These series of sales indicate that the solar farm has no impact on the adjoining residential use.



The homes that were marketed at Spring Garden are shown below.

	<p>Americana SqFt: 3,194 Bed / Bath: 3 / 3.5</p>	<p>Price: \$237,900 View Now »</p>		<p>Washington SqFt: 3,292 Bed / Bath: 4 / 3.5</p>	<p>Price: \$244,900 View Now »</p>
	<p>Presidential SqFt: 3,400 Bed / Bath: 5 / 3.5</p>	<p>Price: \$247,900 View Now »</p>		<p>Kennedy SqFt: 3,494 Bed / Bath: 5 / 3</p>	<p>Price: \$249,900 View Now »</p>
	<p>Virginia SqFt: 3,449 Bed / Bath: 5 / 3</p>	<p>Price: \$259,900 View Now »</p>			

Matched Pairs

As of Date: 9/3/2014

Adjoining Sales After Solar Farm Completed

TAX ID	Owner	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	Style
3600195570	Helm	0.76	Sep-13	\$250,000	2013	3,292	\$75.94	2 Story
3600195361	Leak	1.49	Sep-13	\$260,000	2013	3,652	\$71.19	2 Story
3600199891	McBrayer	2.24	Jul-14	\$250,000	2014	3,292	\$75.94	2 Story
3600198632	Foresman	1.13	Aug-14	\$253,000	2014	3,400	\$74.41	2 Story
3600196656	Hinson	0.75	Dec-13	\$255,000	2013	3,453	\$73.85	2 Story
	Average	1.27		\$253,600	2013.4	3,418	\$74.27	
	Median	1.13		\$253,000	2013	3,400	\$74.41	

Adjoining Sales After Solar Farm Announced

TAX ID	Owner	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	Style
0	Feddersen	1.56	Feb-13	\$247,000	2012	3,427	\$72.07	Ranch
0	Gentry	1.42	Apr-13	\$245,000	2013	3,400	\$72.06	2 Story
	Average	1.49		\$246,000	2012.5	3,414	\$72.07	
	Median	1.49		\$246,000	2012.5	3,414	\$72.07	

Adjoining Sales Before Solar Farm Announced

TAX ID	Owner	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	Style
3600183905	Carter	1.57	Dec-12	\$240,000	2012	3,347	\$71.71	1.5 Story
3600193097	Kelly	1.61	Sep-12	\$198,000	2012	2,532	\$78.20	2 Story
3600194189	Hadwan	1.55	Nov-12	\$240,000	2012	3,433	\$69.91	1.5 Story
	Average	1.59		\$219,000	2012	2,940	\$74.95	
	Median	1.59		\$219,000	2012	2,940	\$74.95	

Nearby Sales After Solar Farm Completed

TAX ID	Owner	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	Style
3600193710	Barnes	1.12	Oct-13	\$248,000	2013	3,400	\$72.94	2 Story
3601105180	Nackley	0.95	Dec-13	\$253,000	2013	3,400	\$74.41	2 Story
3600192528	Mattheis	1.12	Oct-13	\$238,000	2013	3,194	\$74.51	2 Story
3600198928	Beckman	0.93	Mar-14	\$250,000	2014	3,292	\$75.94	2 Story
3600196965	Hough	0.81	Jun-14	\$224,000	2014	2,434	\$92.03	2 Story
3600193914	Preskitt	0.67	Jun-14	\$242,000	2014	2,825	\$85.66	2 Story
3600194813	Bordner	0.91	Apr-14	\$258,000	2014	3,511	\$73.48	2 Story
3601104147	Shaffer	0.73	Apr-14	\$255,000	2014	3,453	\$73.85	2 Story
	Average	0.91		\$246,000	2013.625	3,189	\$77.85	
	Median	0.92		\$249,000	2014	3,346	\$74.46	

Nearby Sales Before Solar Farm Announced

TAX ID	Owner	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	Style
3600191437	Thomas	1.12	Sep-12	\$225,000	2012	3,276	\$68.68	2 Story
3600087968	Lilley	1.15	Jan-13	\$238,000	2012	3,421	\$69.57	1.5 Story
3600087654	Burke	1.26	Sep-12	\$240,000	2012	3,543	\$67.74	2 Story
3600088796	Hobbs	0.73	Sep-12	\$228,000	2012	3,254	\$70.07	2 Story
	Average	1.07		\$232,750	2012	3,374	\$69.01	
	Median	1.14		\$233,000	2012	3,349	\$69.13	

Matched Pair Summary

	Adjoins Solar Farm		Nearby Solar Farm	
	Average	Median	Average	Median
Sales Price	\$253,600	\$253,000	\$246,000	\$249,000
Year Built	2013	2013	2014	2014
Size	3,418	3,400	3,189	3,346
Price/SF	\$74.27	\$74.41	\$77.85	\$74.46

Percentage Differences

Median Price	-2%
Median Size	-2%
Median Price/SF	0%

I note that 2308 Granville Drive sold again in November 2015 for \$267,500, or \$7,500 more than when it was purchased new from the builder two years earlier (Tax ID 3600195361, Owner: Leak). The neighborhood is clearly showing appreciation for homes adjoining the solar farm.

The Median Price is the best indicator to follow in any analysis as it avoids outlying samples that would otherwise skew the results. The median sizes and median prices are all consistent throughout the sales both before and after the solar farm whether you look at sites adjoining or nearby to the solar farm. The average for the homes nearby the solar farm shows a smaller building size and a higher price per square foot. This reflects a common occurrence in real estate where the price per square foot goes up as the size goes down. This is similar to the discount you see in any market where there is a discount for buying larger volumes. So when you buy a 2 liter coke you pay less per ounce than if you buy a 16 oz. coke. So even comparing averages the indication is for no impact, but I rely on the median rates as the most reliable indication for any such analysis.

I have also considered four more recent resales of homes in this community as shown on the following page. These comparable sales adjoin the solar farm at distances ranging from 315 to 400 feet. The matched pairs show a range from -9% to +6%. The range of the average difference is -2% to +1% with an average of 0% and a median of +0.5%. These comparable sales support a finding of no impact on property value.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
	Adjoins	103 Granville Pl	1.42	7/27/2018	\$265,000	2013	3,292	\$80.50	4/3.5	2-Car	2-Story		385
	Not	2219 Granville	1.15	1/8/2018	\$260,000	2012	3,292	\$78.98	4/3.5	2-Car	2-Story		
	Not	634 Friendly	0.96	7/31/2019	\$267,000	2018	3,053	\$87.45	4/4.5	2-Car	2-Story		
	Not	2403 Granville	0.69	4/23/2019	\$265,000	2014	2,816	\$94.11	5/3.5	2-Car	2-Story		
												Avg	
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	
	Adjoins	103 Granville Pl								\$265,000		-2%	
	Not	2219 Granville	\$4,382		\$1,300	\$0				\$265,682	0%		
	Not	634 Friendly	-\$8,303		-\$6,675	\$16,721	-\$10,000			\$258,744	2%		
	Not	2403 Granville	-\$6,029		-\$1,325	\$31,356				\$289,001	-9%		

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
	Adjoins	104 Erin	2.24	6/19/2017	\$280,000	2014	3,549	\$78.90	5/3.5	2-Car	2-Story		315
	Not	2219 Granville	1.15	1/8/2018	\$260,000	2012	3,292	\$78.98	4/3.5	2-Car	2-Story		
	Not	634 Friendly	0.96	7/31/2019	\$267,000	2018	3,053	\$87.45	4/4.5	2-Car	2-Story		
	Not	2403 Granville	0.69	4/23/2019	\$265,000	2014	2,816	\$94.11	5/3.5	2-Car	2-Story		
												Avg	
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	
	Adjoins	104 Erin								\$280,000		0%	
	Not	2219 Granville	-\$4,448		\$2,600	\$16,238				\$274,390	2%		
	Not	634 Friendly	-\$17,370		-\$5,340	\$34,702	-\$10,000			\$268,992	4%		
	Not	2403 Granville	-\$15,029		\$0	\$48,285				\$298,256	-7%		

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
	Adjoins	2312 Granville	0.75	5/1/2018	\$284,900	2013	3,453	\$82.51	5/3.5	2-Car	2-Story		400
	Not	2219 Granville	1.15	1/8/2018	\$260,000	2012	3,292	\$78.98	4/3.5	2-Car	2-Story		
	Not	634 Friendly	0.96	7/31/2019	\$267,000	2018	3,053	\$87.45	4/4.5	2-Car	2-Story		
	Not	2403 Granville	0.69	4/23/2019	\$265,000	2014	2,816	\$94.11	5/3.5	2-Car	2-Story		
												Avg	
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	
	Adjoins	2312 Granville								\$284,900		1%	
	Not	2219 Granville	\$2,476		\$1,300	\$10,173				\$273,948	4%		
	Not	634 Friendly	-\$10,260		-\$6,675	\$27,986	-\$10,000			\$268,051	6%		
	Not	2403 Granville	-\$7,972		-\$1,325	\$47,956				\$303,659	-7%		

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
	Adjoins	2310 Granville	0.76	5/14/2019	\$280,000	2013	3,292	\$85.05	5/3.5	2-Car	2-Story		400
	Not	2219 Granville	1.15	1/8/2018	\$260,000	2012	3,292	\$78.98	4/3.5	2-Car	2-Story		
	Not	634 Friendly	0.96	7/31/2019	\$267,000	2018	3,053	\$87.45	4/4.5	2-Car	2-Story		
	Not	2403 Granville	0.69	4/23/2019	\$265,000	2014	2,816	\$94.11	5/3.5	2-Car	2-Story		
												Avg	
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	
	Adjoins	2310 Granville								\$280,000		1%	
	Not	2219 Granville	\$10,758		\$1,300	\$0				\$272,058	3%		
	Not	634 Friendly	-\$1,755		-\$6,675	\$16,721	-\$10,000			\$265,291	5%		
	Not	2403 Granville	\$469		-\$1,325	\$31,356				\$295,500	-6%		

I have also considered the original sales prices in this subdivision relative to the recent resale values as shown in the chart below. This rate of appreciation is right at 2.5% over the last 6 years. Zillow indicates that the average home value within the 27530 zip code as of January 2014 was \$101,300 and as of January 2020 that average is \$118,100. This indicates an average increase in the market of 2.37%. I conclude that the appreciation of the homes adjoining the solar farm are not impacted by the presence of the solar farm based on this data.

Address	Initial Sale		Second Sale		Year Diff	Apprec.	% Apprec.		Apprec. %/Year
	Date	Price	Date	Price			Apprec.	Apprec.	
1 103 Granville Pl	4/1/2013	\$245,000	7/27/2018	\$265,000	5.32	\$20,000	8.16%	1.53%	
2 105 Erin	7/1/2014	\$250,000	6/19/2017	\$280,000	2.97	\$30,000	12.00%	4.04%	
3 2312 Granville	12/1/2013	\$255,000	5/1/2015	\$262,000	1.41	\$7,000	2.75%	1.94%	
4 2312 Granville	5/1/2015	\$262,000	5/1/2018	\$284,900	3.00	\$22,900	8.74%	2.91%	
5 2310 Granville	8/1/2013	\$250,000	5/14/2019	\$280,000	5.79	\$30,000	12.00%	2.07%	
6 2308 Granville	9/1/2013	\$260,000	11/12/2015	\$267,500	2.20	\$7,500	2.88%	1.31%	
7 2304 Granville	9/1/2012	\$198,000	6/1/2017	\$225,000	4.75	\$27,000	13.64%	2.87%	
8 102 Erin	8/1/2014	\$253,000	11/1/2016	\$270,000	2.25	\$17,000	6.72%	2.98%	
							Average	2.46%	
							Median	2.47%	

2. Matched Pair – White Cross Solar Farm, Chapel Hill, NC



A new solar farm was built at 2159 White Cross Road in Chapel Hill, Orange County in 2013. After construction, the owner of the underlying land sold the balance of the tract not encumbered by the solar farm in July 2013 for \$265,000 for 47.20 acres, or \$5,606 per acre. This land adjoins the solar farm to the south and was clear cut of timber around 10 years ago. I compared this purchase to a nearby transfer of 59.09 acres of timber land just south along White Cross Road that sold in November 2010 for \$361,000, or \$6,109 per acre. After purchase, this land was divided into three mini farm tracts of 12 to 20 acres each. These rates are very similar and the difference in price per acre is attributed to the timber value and not any impact of the solar farm.

Type	TAX ID	Owner	Acres	Date	Price	\$/Acre	Notes	Conf By
Adjoins Solar	9748336770	Haggerty	47.20	Jul-13	\$265,000	\$5,614	Clear cut	Betty Cross, broker
Not Near Solar	9747184527	Purcell	59.09	Nov-10	\$361,000	\$6,109	Wooded	Dickie Andrews, broker

The difference in price is attributed to the trees on the older sale.

No impact noted for the adjacency to a solar farm according to the broker.

I looked at a number of other nearby land sales without proximity to a solar farm for this matched pair, but this land sale required the least allowance for differences in size, utility and location.

Matched Pair Summary

	Adjoins Solar Farm		Nearby Solar Farm	
	Average	Median	Average	Median
Sales Price	\$5,614	\$5,614	\$6,109	\$6,109
Adjustment for Timber	\$500	\$500		
Adjusted	\$6,114	\$6,114	\$6,109	\$6,109
Tract Size	47.20	47.20	59.09	59.09

Percentage Differences

Median Price Per Acre	0%
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This matched pair again supports the conclusion that adjacency to a solar farm has no impact on adjoining residential/agricultural land.

3. Matched Pair – Wagstaff Farm, Roxboro, NC



This solar farm is located at the northeast corner of a 594-acre farm with approximately 30 acres of solar farm area. This solar farm was approved and constructed in 2013.

After approval, 18.82 acres were sold out of the parent tract to an adjoining owner to the south. This sale was at a similar price to nearby land to the east that sold in the same time from for the same price per acre as shown below.

Type	TAX ID	Owner	Acres	Present Use	Date Sold	Price	\$/AC
Adjoins Solar	0918-17-11-7960	Piedmont	18.82	Agricultural	8/19/2013	\$164,000	\$8,714
Not Near Solar	0918-00-75-9812 et al	Blackwell	14.88	Agricultural	12/27/2013	\$130,000	\$8,739

Matched Pair Summary

	Adjoins Solar Farm		Nearby Solar Farm	
	Average	Median	Average	Median
Sales Price	\$8,714	\$8,714	\$8,739	\$8,739
Tract Size	18.82	18.82	14.88	14.88

Percentage Differences

Median Price Per Acre 0%

This matched pair again supports the conclusion that adjacency to a solar farm has no impact on adjoining residential/agricultural land.

4. Matched Pair – Mulberry, Selmer, TN



This solar farm was built in 2014 on 208.89 acres with the closest home being 480 feet away.

This solar farm adjoins two subdivisions with Central Hills having a mix of existing and new construction homes. Lots in this development have been marketed for \$15,000 each with discounts offered for multiple lots being used for a single home site. I spoke with the agent with Rhonda Wheeler and Becky Hearnberger with United County Farm & Home Realty who noted that they have seen no impact on lot or home sales due to the solar farm in this community.

I have included a map below as well as data on recent sales activity on lots that adjoin the solar farm or are near the solar farm in this subdivision both before and after the announced plan for this solar farm facility. I note that using the same method I used to breakdown the adjoining uses at the subject property I show that the predominant adjoining uses are residential and agricultural, which is consistent with the location of most solar farms.

Adjoining Use Breakdown

	Acreage	Parcels
Commercial	3.40%	0.034
Residential	12.84%	79.31%
Agri/Res	10.39%	3.45%
Agricultural	73.37%	13.79%
Total	100.00%	100.00%

From the above map, I identified four recent sales of homes that occurred adjoining the solar farm both before and after the announcement of the solar farm. I have adjusted each of these for differences in size and age in order to compare these sales among themselves. As shown below after adjustment, the median value is \$130,776 and the sales prices are consistent with one outlier which is also the least comparable home considered. The close grouping and the similar price per point overall as well as the similar price per square foot both before and after the solar farm.

Matched Pairs

#	TAX ID	Owner	Date Sold	Sales Price	Acres	Built	GBA	\$/GBA	Style	Parking
6&7	0900 A 011.00	Henson	Jul-14	\$130,000	2.65	2007	1,511	\$86.04	1 Story	2 Garage
12	0900 A 003.00	Amerson	Aug-12	\$130,000	1.20	2011	1,586	\$81.97	1 Story	2 Garage
15	099C A 003.00	Smallwood	May-12	\$149,900	1.00	2002	1,596	\$93.92	1 Story	4 Garage
16	099C A 002.00	Hessing	Jun-15	\$130,000	1.00	1999	1,782	\$72.95	1 Story	2 Garage
		Average		\$134,975	1.46	2005	1,619	\$83.72		
		Median		\$130,000	1.10	2005	1,591	\$84.00		

#	TAX ID	Owner	Date Sold	Sales Price	Adjustments*					
					Acres	Built	GBA	Style	Parking	Total
6&7	0900 A 011.00	Henson	Jul-14	\$130,000	-\$7,500	\$2,600	\$6,453	\$0	\$0	\$131,553
12	0900 A 003.00	Amerson	Aug-12	\$130,000	\$0	\$0	\$0	\$0	\$0	\$130,000
15	099C A 003.00	Smallwood	May-12	\$149,900	\$0	\$6,746	-\$939	\$0	-\$15,000	\$140,706
16	099C A 002.00	Hessing	Jun-15	\$130,000	\$0	\$7,800	-\$14,299	\$0	\$0	\$123,501
		Average		\$134,975	-\$1,875	\$4,286	-\$2,196	\$0	-\$3,750	\$131,440
		Median		\$130,000	\$0	\$4,673	-\$470	\$0	\$0	\$130,776

* I adjusted all of the comparables to a base line 2011 Year Built and 1,586 s.f. based on Lot 12

I also considered a number of similar home sales nearby that were both before and after the solar farm was announced as shown below. These homes are generally newer in construction and include a number of larger homes but show a very similar price point per square foot.

Nearby Sales Before Solar Farm Announced

TAX ID	Owner	Date Sold	Sales Price	Acres	Built	GBA	\$/GBA	Style	Parking
099B A 019	Durrance	Sep-12	\$165,000	1.00	2012	2,079	\$79.37	1 Story	2 Garage
099B A 021	Berryman	Apr-12	\$212,000	2.73	2007	2,045	\$103.67	1 Story	2 Garage
0900 A 060	Nichols	Feb-13	\$165,000	1.03	2012	1,966	\$83.93	1 Story	2 Garage
	Average		\$180,667	1.59	2010	2,030	\$88.99		
	Median		\$165,000	1.03	2012	2,045	\$83.93		

Nearby Sales After Solar Farm Announced

TAX ID	Owner	Date Sold	Sales Price	Acres	Built	GBA	\$/GBA	Style	Parking
090N A 040	Carrithers	Mar-15	\$120,000	1.00	2010	1,626	\$73.80	1 Story	2 Garage
099C A 043	Cherry	Feb-15	\$148,900	2.34	2008	1,585	\$93.94	1 Story	2 Garage
	Average		\$134,450	1.67	2009	1,606	\$83.87		
	Median		\$134,450	1.67	2009	1,606	\$83.87		

I then adjusted these nearby sales using the same criteria as the adjoining sales to derive the following breakdown of adjusted values based on a 2011 year built 1,586 square foot home. The adjusted values are consistent with a median rate of \$128,665, which is actually lower than the values for the homes that back up to the solar farm.

Nearby Sales Adjusted				Adjustments*					
TAX ID	Owner	Date Sold	Sales Price	Acres	Built	GBA	Style	Parking	Total
099B A 019	Durrance	Sep-12	\$165,000	\$0	-\$825	-\$39,127	\$0	\$0	\$125,048
099B A 021	Berryman	Apr-12	\$212,000	-\$7,500	\$4,240	-\$47,583	\$0	\$0	\$161,157
090O A 060	Nichols	Feb-13	\$165,000	\$0	-\$825	-\$31,892	\$0	\$0	\$132,283
090N A 040	Carrithers	Mar-15	\$120,000	\$0	\$600	-\$2,952	\$0	\$0	\$117,648
099C A 043	Cherry	Feb-15	\$148,900	-\$7,500	\$2,234	\$94	\$0	\$0	\$143,727
	Average		\$165,500	-\$1,875	\$798	-\$30,389	\$0	\$0	\$134,034
	Median		\$165,000	\$0	-\$113	-\$35,510	\$0	\$0	\$128,665

* I adjusted all of the comparables to a base line 2011 Year Built and 1,586 s.f. based on Lot 12

If you consider just the 2015 nearby sales, the range is \$117,648 to \$143,727 with a median of \$130,688. If you consider the recent adjoining sales the range is \$123,501 to \$131,553 with a median of \$127,527.

This difference is less than 3% in the median and well below the standard deviation in the sales. The entire range of the adjoining sales prices is overlapped by the range from the nearby sales. These are consistent data sets and summarized below.

Matched Pair Summary

	Adjoins Solar Farm		Nearby After Solar Farm	
	Average	Median	Average	Median
Sales Price	\$134,975	\$130,000	\$134,450	\$134,450
Year Built	2005	2005	2009	2009
Size	1,619	1,591	1,606	1,606
Price/SF	\$83.72	\$84.00	\$83.87	\$83.87

Based on the data presented above, I find that the price per square foot for finished homes is not being impacted negatively by the announcement of the solar farm. The difference in pricing in homes in the neighborhood is accounted for by differences in size, building age, and lot size. The median price for a home after those factors are adjusted for are consistent throughout this subdivision and show no impact due to the proximity of the solar farm. This is consistent with the comments from the broker I spoke with for this subdivision as well.

I have also run a number of direct matched comparisons on the sales adjoining this solar farm as shown below. These direct matched pairs include some of those shown above as well as additional more recent sales in this community. In each of these I have compared the one sale adjoining the solar farm to multiple similar homes nearby that do not adjoin a solar farm to look for any potential impact from the solar farm.

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
3	Adjoins	491 Dusty	6.86	10/28/2016	\$176,000	2009	1,801	\$97.72	3/2	2-Gar	Ranch	
	Not	820 Lake Trail	1.00	6/8/2018	\$168,000	2013	1,869	\$89.89	4/2	2-Gar	Ranch	
	Not	262 Country	1.00	1/17/2018	\$145,000	2000	1,860	\$77.96	3/2	2-Gar	Ranch	
	Not	35 April	1.15	8/16/2016	\$185,000	2016	1,980	\$93.43	3/2	2-Gar	Ranch	

Adjoining Sales Adjusted												
Parcel	Solar	Address	Acres	Time	Site	YB	GLA	Park	Other	Total	% Diff	Distance
3	Adjoins	491 Dusty								\$176,000		480
	Not	820 Lake Trail		-\$8,324	\$12,000	-\$3,360	-\$4,890			\$163,426	7%	
	Not	262 Country		-\$5,450	\$12,000	\$6,525	-\$3,680			\$154,396	12%	
	Not	35 April		\$1,138	\$12,000	-\$6,475	-\$13,380			\$178,283	-1%	
										Average	6%	

The best matched pair is 35 April Loop, which required the least adjustment and indicates a -1% increase in value due to the solar farm adjacency.

Adjoining Residential Sales After Solar Farm Built

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
12	Adjoins	57 Cooper	1.20	2/26/2019	\$163,000	2011	1,586	\$102.77	3/2	2-Gar	1.5 Story	Pool
	Not	191 Amelia	1.00	8/3/2018	\$132,000	2005	1,534	\$86.05	3/2	Drive	Ranch	
	Not	75 April	0.85	3/17/2017	\$134,000	2012	1,588	\$84.38	3/2	2-Crprt	Ranch	
	Not	345 Woodland	1.15	12/29/2016	\$131,000	2002	1,410	\$92.91	3/2	1-Gar	Ranch	

Adjoining Sales Adjusted												
Parcel	Solar	Address	Sales Price	Time	Site	YB	GLA	Park	Other	Total	% Diff	Distance
12	Adjoins	57 Cooper	\$163,000							\$163,000		685
	Not	191 Amelia	\$132,000	\$2,303		\$3,960	\$2,685	\$10,000	\$5,000	\$155,947	4%	
	Not	75 April	\$134,000	\$8,029	\$4,000	-\$670	-\$135	\$5,000	\$5,000	\$155,224	5%	
	Not	345 Woodland	\$131,000	\$8,710		\$5,895	\$9,811		\$5,000	\$160,416	2%	
										Average	4%	

The best matched pair is 191 Amelia, which was most similar in time frame of sale and indicates a +4% increase in value due to the solar farm adjacency.

Adjoining Residential Sales After Solar Farm Built

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
15	Adjoins	297 Country	1.00	9/30/2016	\$150,000	2002	1,596	\$93.98	3/2	4-Gar	Ranch	
	Not	185 Dusty	1.85	8/17/2015	\$126,040	2009	1,463	\$86.15	3/2	2-Gar	Ranch	
	Not	53 Glen	1.13	3/9/2017	\$126,000	1999	1,475	\$85.42	3/2	2-Gar	Ranch	Brick

Adjoining Sales Adjusted												
Parcel	Solar	Address	Sales Price	Time	Site	YB	GLA	Park	Other	Total	% Diff	Distance
15	Adjoins	297 Country	\$150,000							\$150,000		650
	Not	185 Dusty	\$126,040	\$4,355		-\$4,411	\$9,167	\$10,000		\$145,150	3%	
	Not	53 Glen	\$126,000	-\$1,699		\$1,890	\$8,269	\$10,000		\$144,460	4%	
										Average	3%	

The best matched pair is 53 Glen, which was most similar in time frame of sale and required less adjustment. It indicates a +4% increase in value due to the solar farm adjacency.

The average indicated impact from these three sets of matched pairs is +4%, which suggests a mild positive relationship due to adjacency to the solar farm.

I have also looked at several lot sales in this subdivision as shown below.

These are all lots within the same community and the highest prices paid are for lots one parcel off from the existing solar farm. These prices are fairly inconsistent, though they do suggest about a \$3,000 loss in the lots adjoining the solar farm. This is an atypical finding and additional details suggest there is more going on in these sales than the data crunching shows. First of all Parcel 4 was purchased by the owner of the adjoining home and therefore an atypical buyer seeking to expand a lot and the site is not being purchased for home development. Moreover, using the SiteToDoBusiness demographic tools, I found that the 1-mile radius around this development is expecting a total population increase over the next 5 years of 3 people. This lack of growing demand for lots is largely explained in that context. Furthermore, the fact that finished home sales as shown above are showing no sign of a negative impact on property value makes this data unreliable and inconsistent with the data shown in sales to an end user. I therefore place little weight on this outlier data.

Parcel	Solar	Address	Acres	Date Sold	Sales Price	4/18/2019	\$/AC	4/18/2019
						Adj for Time		Adj for Time
4	Adjoins	Shelter	2.05	10/25/2017	\$16,000	\$16,728	\$7,805	\$8,160
10	Adjoins	Carter	1.70	8/2/2018	\$14,000	\$14,306	\$8,235	\$8,415
11	Adjoins	Cooper	1.28	9/17/2018	\$12,000	\$12,215	\$9,375	\$9,543
	Not	75 Dusty	1.67	4/18/2019	\$20,000	\$20,000	\$11,976	\$11,976
	Not	Lake Trl	1.47	11/7/2018	\$13,000	\$13,177	\$8,844	\$8,964
	Not	Lake Trl	1.67	4/18/2019	\$20,000	\$20,000	\$11,976	\$11,976
		Adjoins	Per Acre	Not Adjoins	Per Acre	% DIF/Lot	% DIF/AC	
	Average	\$14,416	\$8,706	\$17,726	\$10,972	19%	21%	
	Median	\$14,306	\$8,415	\$20,000	\$11,976	28%	30%	
	High	\$16,728	\$9,543	\$20,000	\$11,976	16%	20%	
	Low	\$12,215	\$8,160	\$13,177	\$8,964	7%	9%	

6. Matched Pair – Leonard Road Solar Farm, Hughesville, MD



This solar farm mostly adjoins agricultural and residential uses to the west, south and east as shown above. The property also adjoins retail uses and a church. I looked at a 2016 sale of an adjoining home with a positive impact on value adjoining the solar farm of 2.90%. This is within typical market friction and supports an indication of no impact on property value.

I have shown this data below.

Leonardtown Road Solar Farm, Hughesville, MD

Nearby Residential Sale After Solar Farm Construction

Address	Solar Farm Acres	Date Sold	Sales Price*	Built	GBA	\$/GBA	Style	BR/BA	Bsmt	Park	Upgrades	Other
14595 Box Elder Ct	Adjoins	2/12/2016	\$291,000	1991	2,174	\$133.85	Colonial	5/2.5	No	2 Car Att	N/A	Deck
15313 Bassford Rd	Not	7/20/2016	\$329,800	1990	2,520	\$130.87	Colonial	3/2.5	Finished	2 Car Att	Custom	Scr Por/Patio

*\$9,000 concession deducted from sale price for Box Elder and \$10,200 deducted from Bassford

Adjoining Sales Adjusted

Address	Date Sold	Sales Price	Time	Adjustments				Total
				GLA	Bsmt	Upgrades	Other	
14595 Box Elder Ct	2/12/2016	\$291,000						\$291,000
15313 Bassford Rd	7/20/2016	\$329,800	-\$3,400	-\$13,840	-\$10,000	-\$15,000	-\$5,000	\$282,560

Difference Attributable to Location \$8,440
2.90%

This is within typical market friction and supports an indication of no impact on property value.

7. Matched Pair – Talbot County Community Center Solar Farm, Easton, MD



This solar farm mostly adjoins agricultural and residential uses but also the Community center and located across the street from a golf course which can be seen just to the east. I looked at a 2012 sale of a home 1,000 feet to the west of the solar farm with a slight positive impact on value nearby the solar farm.

I have shown this data below.

Talbot County Community Center, Easton, MD

Nearby Residential Sale After Solar Farm Construction

Address	Solar Farm	Acres	Date Sold	Sales Price*	Built	GBA	\$/GBA	Style	BR/BA	Park	Upgrades
10193 Hiners	Nearby	1.06	10/31/2012	\$136,092	1947	776	\$175.38	Bungalow	2/1	3 Car Det	N/A
10711 Hiners	Not	0.60	12/15/2012	\$135,000	1957	832	\$162.26	Bungalow	2/1	1 Car Det	Upd. Bath

*\$5,908 concessions deducted from 10193 Hiners sales price

Adjoining Sales Adjusted

Address	Date Sold	Sales Price	Age	Adjustments				Total	
				Acres	Park	Upgrades	Other		
10193 Hiners	10/31/2012	\$136,092						\$136,092	
10711 Hiners	12/15/2012	\$135,000		-\$6,750	\$4,000	\$6,000	-\$3,000	\$0	\$135,250

Difference Attributable to Location \$842

8. Matched Pair – Alamo II, San Antonio, Texas



This project is located at 8203 Binz-Engleman Road, Converse, Texas, on 98.37 acres with a 4.4 MW output. This project is located with small lot residential development on to the north west and south. There appears to be minimal landscaping along this project. The closest home to the north is 83 feet from the solar panels, while the homes to the west are 110 feet and the homes to the south are 175 feet away from the solar panels.

This solar farm strongly shows an acceptance of nearby residential development in close proximity to solar farms as this solar farm has minimal landscaping, close proximity, small adjoining lot sizes, and the development of homes on three sides of the solar farm.

Adjoining Use Breakdown

Acreage	Parcels
Residential	94.64%
Agricultural	5.36%
Total	100.00%

I have considered home sales in the three adjoining subdivisions to look at matched pair data. There are sales and resales of homes in Glenloch and Mustang Valley subdivisions to the south and west of this solar farm.

I have considered multiple matched pairs from these subdivisions to show typical appreciation and no impact on property value both before and after the solar farm was constructed in 2013. I have

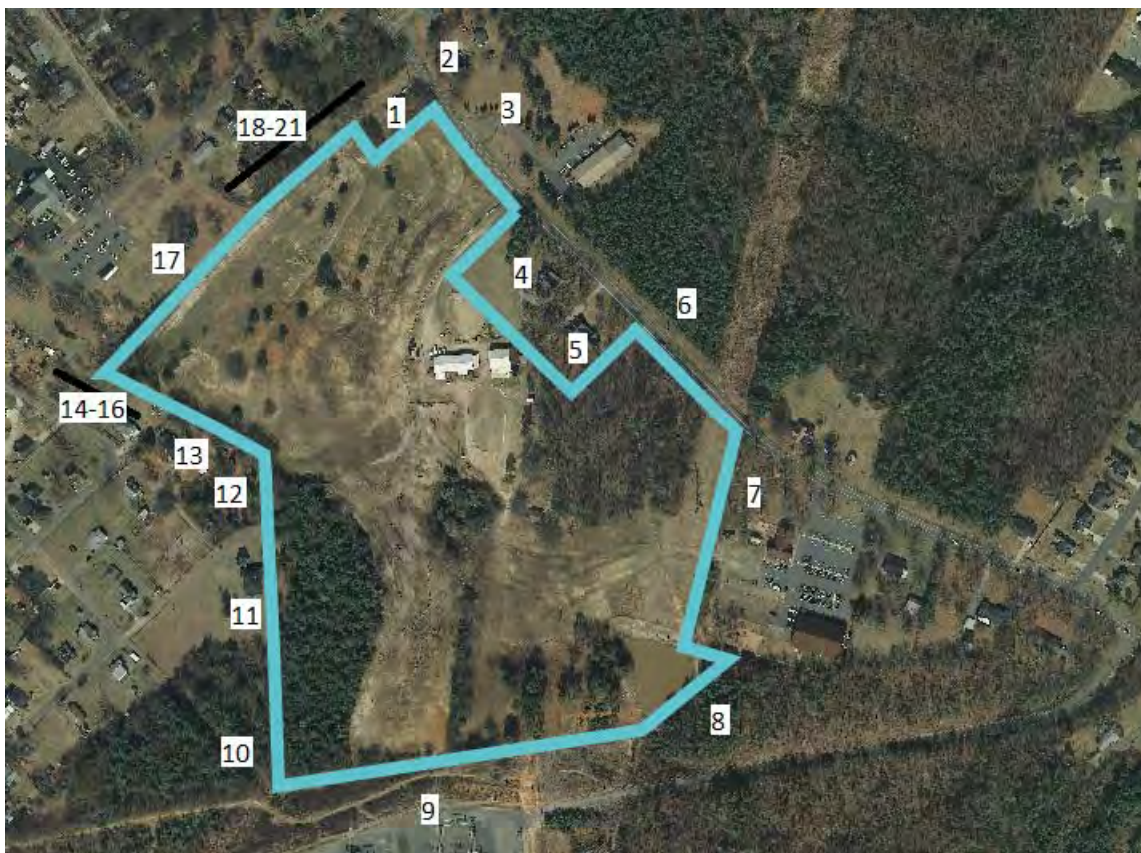
looked at a number of home sales and resales in the larger subdivisions, but I have focused on those directly adjoining/facing the solar farm in the examples shown below. These are sales and resales of the homes adjoining the solar farm both before and after the solar farm project in 2013.

The comparables shown below are compared to an earlier sale prior to the solar farm announcement or construction followed by a second sale after the solar farm. The first two have solar farms in the Backyard (B), while the other has the solar farm in the Side yard (S). All of these sales show appreciation that falls within the typical annual appreciation for homes in this area over this time period.

7703 Redstone Mnr (B)			7807 Redstone Mnr (B)			7734 Sundew Mist (S)		
	<u>Date</u>	<u>Price</u>		<u>Date</u>	<u>Price</u>		<u>Date</u>	<u>Price</u>
Sale	10/3/2012	\$149,980	Sale	5/11/2012	\$136,266	Sale	5/23/2012	\$117,140
Sale	3/24/2016	\$166,000	Sale	8/11/2014	\$147,000	Sale	11/18/2014	\$134,000
	<u>Time - YRS</u>	<u>% Incr.</u>		<u>Time - YRS</u>	<u>% Incr.</u>		<u>Time - YRS</u>	<u>% Incr.</u>
	3.47	10.7%		2.25	7.9%		2.49	14.4%
	<u>Per Year</u>	<u>3.1%</u>		<u>Per Year</u>	<u>3.5%</u>		<u>Per Year</u>	<u>5.8%</u>
Years	3.5	<u>10.8%</u>	Years	2.5	<u>8.7%</u>	Years	2	<u>11.6%</u>

I therefore conclude that this set of matched pairs shows no impact on property value and that homes in the area are showing typical appreciation consistent with other homes not in the vicinity of solar farms.

9. Matched Pair – Neal Hawkins Solar, Gastonia, NC



This project is located on the south side of Neal Hawkins Road just outside of Gastonia. The property identified above as Parcel 4 was listed for sale while this solar farm project was going through the approval process. The property was put under contract during the permitting process with the permit being approved while the due diligence period was still ongoing. After the permit was approved the property closed with no concerns from the buyer. I spoke with Jennifer Bouvier, the broker listing the property and she indicated that the solar farm had no impact at all on the sales price. She considered some nearby sales to set the price and the closing price was very similar to the asking price within the typical range for the market. The buyer was aware that the solar farm was coming and they had no concerns.

This two-story brick dwelling was sold on March 20, 2017 for \$270,000 for a 3,437 square foot dwelling built in 1934 in average condition on 1.42 acres. The property has four bedrooms and two bathrooms.

A more recent aerial photo is shown on the following page to illustrate the proximity of panels to homes.



10. Matched Pair – Summit/Ranchlands Solar, Moyock, NC



This project is located at 1374 Caritoke Highway, Moyock, NC. This is an 80 MW facility on a parent tract of 2,034 acres. Parcels Number 48 and 53 as shown in the map above were sold in 2016. The project was under construction during the time period of the first of the matched pair sales and the permit was approved well prior to that in 2015.

I looked at multiple sales of adjoining and nearby homes and compared each to multiple comparables to show a range of impacts from -10% up to +11% with an average of +2% and a median of +3%. These ranges are well within typical real estate variation and supports an indication of no impact on property value.

Adjoining Residential Sales After Solar Farm Approved													
Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
48	Adjoins	129 Pinto	4.29	4/15/2016	\$170,000	1985	1,559	\$109.04	3/2	Drive	MFG		1,060
	Not	102 Timber	1.30	4/1/2016	\$175,500	2009	1,352	\$129.81	3/2	Drive	MFG		
	Not	120 Ranchland	0.99	10/1/2014	\$170,000	2002	1,501	\$113.26	3/2	Drive	MFG		
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	
	Adjoins	129 Pinto								\$170,000		-3%	
	Not	102 Timber	\$276	\$10,000	-\$29,484	\$18,809				\$175,101	-3%		
	Not	120 Ranchland	\$10,735	\$10,000	-\$20,230	\$4,598				\$175,103	-3%		

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
53	Adjoins	105 Pinto	4.99	12/16/2016	\$206,000	1978	1,484	\$138.81	3/2	Det Gar	Ranch		2,020
	Not	111 Spur	1.15	2/1/2016	\$193,000	1985	2,013	\$95.88	4/2	Gar	Ranch		
	Not	103 Marshall	1.07	3/29/2017	\$196,000	2003	1,620	\$120.99	3/2	Drive	Ranch		
	Not	127 Ranchland	0.99	6/9/2015	\$219,900	1988	1,910	\$115.13	3/2	Gar/3Gar	Ranch		
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	
	Adjoins	105 Pinto								\$206,000		11%	
	Not	111 Spur	\$6,918	\$10,000	-\$6,755	-\$25,359				\$177,803	14%		
	Not	103 Marshall	-\$2,268	\$10,000	-\$24,500	-\$8,227		\$5,000		\$176,005	15%		
	Not	127 Ranchland	\$13,738	\$10,000	-\$10,995	-\$24,523		-\$10,000		\$198,120	4%		

Adjoining Residential Sales After Solar Farm Built

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
15	Adjoins	318 Green View	0.44	9/15/2019	\$357,000	2005	3,460	\$103.18	4/4	2-Car	1.5 Brick		570
	Not	195 St Andrews	0.55	6/17/2018	\$314,000	2002	3,561	\$88.18	5/3	2-Car	2.0 Brick		
	Not	336 Green View	0.64	1/13/2019	\$365,000	2006	3,790	\$96.31	6/4	3-Car	2.0 Brick		
	Not	275 Green View	0.36	8/15/2019	\$312,000	2003	3,100	\$100.65	5/3	2-Car	2.0 Brick		
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	
	Adjoins	318 Green View								\$357,000		4%	
	Not	195 St Andrews	\$12,040		\$4,710	-\$7,125	\$10,000			\$333,625	7%		
	Not	336 Green View	\$7,536		-\$1,825	-\$25,425			-\$5,000	\$340,286	5%		
	Not	275 Green View	\$815		\$3,120	\$28,986	\$10,000			\$354,921	1%		

Adjoining Residential Sales After Solar Farm Built

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
29	Adjoins	164 Ranchland	1.01	4/30/2019	\$169,000	1999	2,052	\$82.36	4/2	Gar	MFG		440
	Not	150 Pinto	0.94	3/27/2018	\$168,000	2017	1,920	\$87.50	4/2	Drive	MFG		
	Not	105 Longhorn	1.90	10/10/2017	\$184,500	2002	1,944	\$94.91	3/2	Drive	MFG		
	Not	112 Pinto	1.00	7/27/2018	\$180,000	2002	1,836	\$98.04	3/2	Drive	MFG	Fenced	
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	
	Adjoins	164 Ranchland								\$169,000		-10%	
	Not	150 Pinto	\$5,649		-\$21,168	\$8,085			\$5,000	\$165,566	2%		
	Not	105 Longhorn	\$8,816	-\$10,000	-\$3,875	\$7,175			\$5,000	\$191,616	-13%		
	Not	112 Pinto	\$4,202		-\$3,780	\$14,824			\$5,000	\$200,245	-18%		

Adjoining Residential Sales After Solar Farm Built

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
	Adjoins	358 Oxford	10.03	9/16/2019	\$478,000	2008	2,726	\$175.35	3/3	2 Gar	Ranch		635
	Not	276 Summit	10.01	12/20/2017	\$355,000	2006	1,985	\$178.84	3/2	2 Gar	Ranch		
	Not	176 Providence	6.19	5/6/2019	\$425,000	1990	2,549	\$166.73	3/3	4 Gar	Ranch	Brick	
	Not	1601 B Caratoke	12.20	9/26/2019	\$440,000	2016	3,100	\$141.94	4/3.5	5 Gar	Ranch	Pool	
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	
	Adjoins	358 Oxford								\$478,000		5%	
	Not	276 Summit	\$18,996		\$3,550	\$106,017	\$10,000			\$493,564	-3%		
	Not	176 Providence	\$4,763		\$38,250	\$23,609		-\$10,000	-\$25,000	\$456,623	4%		
	Not	1601 B Caratoke	-\$371	\$50,000	-\$17,600	-\$42,467	-\$5,000	-\$10,000		\$414,562	13%		

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
	Nearby	343 Oxford	10.01	3/9/2017	\$490,000	2016	3,753	\$130.56	3/3	2 Gar	1.5 Story	Pool	970
	Not	287 Oxford	10.01	9/4/2017	\$600,000	2013	4,341	\$138.22	5/4.5	8-Gar	1.5 Story	Pool	
	Not	301 Oxford	10.00	4/23/2018	\$434,000	2013	3,393	\$127.91	5/3	2 Gar	1.5 Story		
	Not	218 Oxford	10.01	4/4/2017	\$525,000	2006	4,215	\$124.56	4/3	4 Gar	1.5 Story	VG Barn	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	343 Oxford								\$490,000		3%
Not	287 Oxford	-\$9,051		\$9,000	-\$65,017	-\$15,000	-\$25,000		\$494,932	-1%	
Not	301 Oxford	-\$14,995	-\$10,000	\$6,510	\$36,838				\$452,353	8%	
Not	218 Oxford	-\$1,150		\$26,250	-\$46,036		-\$10,000	-\$10,000	\$484,064	1%	



11. Matched Pair – White Cross II, Chapel Hill, NC



This project is located in rural Orange County on White Cross Road with a 2.8 MW facility. This project is a few parcels south of White Cross Solar Farm that was developed by a different company. An adjoining home sold after construction as presented below.

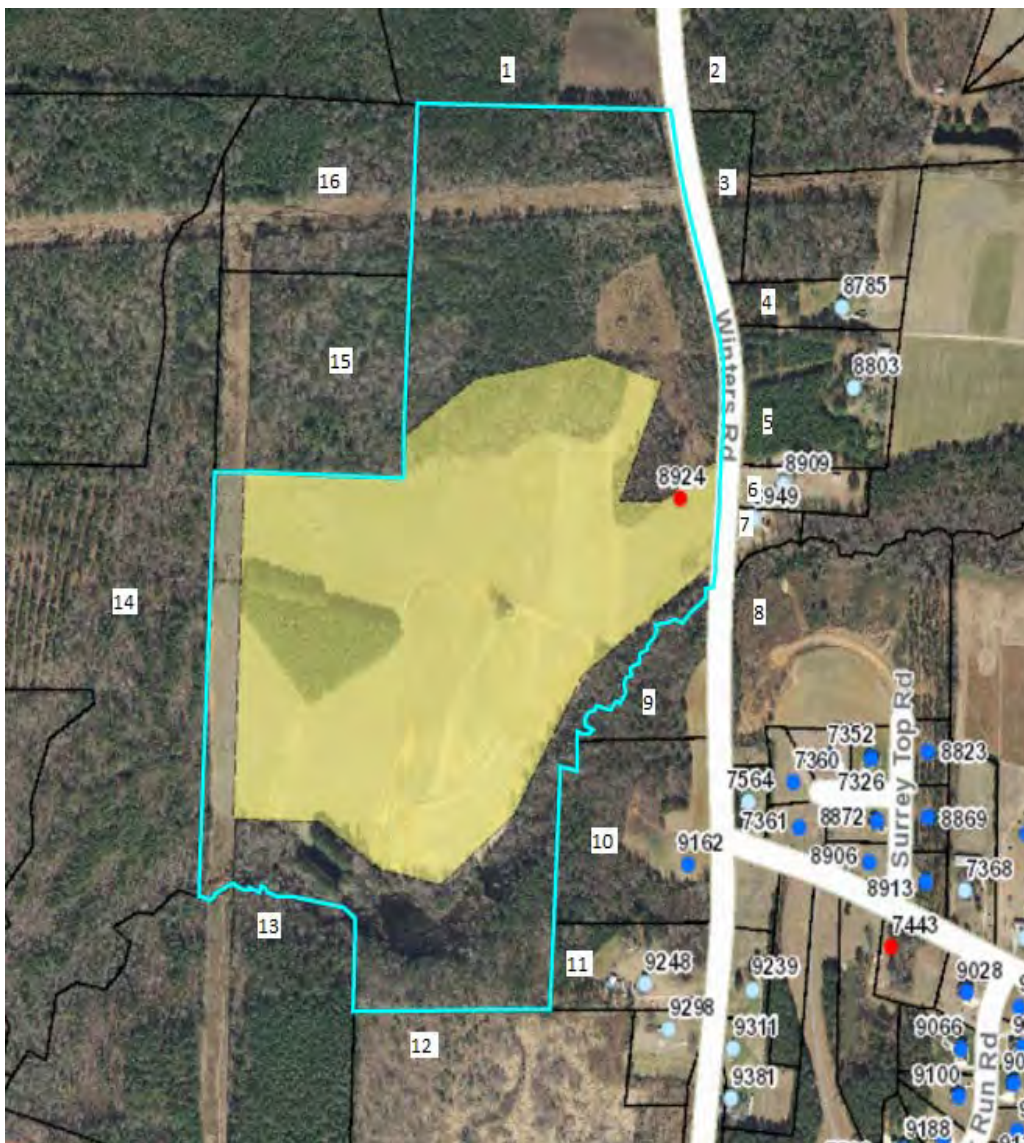
Adjoining Residential Sales After Solar Farm Completed

Solar	TAX ID/Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style
Adjoins	97482114578	11.78	2/29/2016	\$340,000	1994	1,601	\$212.37	3/3	Garage	Ranch
Not	4200B Old Greensbor	12.64	12/28/2015	\$380,000	2000	2,075	\$183.13	3/2.5	Garage	Ranch

Adjoining Residential Sales After Solar Farm Adjoining Sales Adjusted

Solar	TAX ID/Address	Sales Price	Time	Acres	YB	GLA	BR/BA	Park	Total	% Diff
Adjoins	97482114578	\$340,000							\$340,000	
Not	4200B Old Greensbor	\$380,000	\$3,800	\$0	-\$15,960	-\$43,402	\$5,000	\$0	\$329,438	3%

12. Matched Pair – Tracy Solar, Bailey, NC



This project is located in rural Nash County on Winters Road with a 5 MW facility that was built in 2016. A local builder acquired parcels 9 and 10 following construction as shown below at rates comparable to other tracts in the area. They then built a custom home for an owner and sold that at a price similar to other nearby homes as shown in the matched pair data below.

Adjoining Land Sales After Solar Farm Completed

#	Solar Farm	TAX ID	Grantor	Grantee	Address	Acres	Date Sold	Sales Price	\$/AC	Other
9 & 10	Adjoins	316003 & 316004	Cozart	Kingsmill	9162 Winters	13.22	7/21/2016	\$70,000	\$5,295	
	Not	6056	Billingsly		427 Young	41	10/21/2016	\$164,000	\$4,000	
	Not	33211	Fulcher	Weikel	10533 Cone	23.46	7/18/2017	\$137,000	\$5,840	Doublewide, structures
	Not	106807	Perry	Gardner	Claude Lewis	11.22	8/10/2017	\$79,000	\$7,041	Gravel drive for sub, cleared
	Not	3437	Vaughan	N/A	11354 Old Lewis Sch	18.73	Listing	\$79,900	\$4,266	Small cemetery, wooded

Adjoining Sales Adjusted

Time	Acres	Location	Other	Adj \$/Ac	% Diff
				\$5,295	
\$0	\$400	\$0	\$0	\$4,400	17%
-\$292	\$292	\$0	-\$500	\$5,340	-1%
-\$352	\$0	\$0	-\$1,000	\$5,689	-7%
-\$213	\$0	\$0	\$213	\$4,266	19%
Average					7%

Adjoining Residential Sales After Solar Farm Completed

#	Solar Farm	n	Address	Acres	Date Sold	Sales Price	Built	GLA	\$/GLA	BR/BA	Style	Other
9 & 10	Adjoins	s	9162 Winters	13.22	1/5/2017	\$255,000	2016	1,616	\$157.80	3/2	Ranch	1296 sf wrkshp
	Not	w	7352 Red Fox	0.93	6/30/2016	\$176,000	2010	1,529	\$115.11	3/2	2-story	

Adjoining Sales Adjusted

Time	Acres	YB	GLA	Style	Other	Total	% Diff
						\$255,000	
\$0	\$44,000	\$7,392	\$5,007	\$5,000	\$15,000	\$252,399	1%

The comparables for the land show either a significant positive relationship or a mild negative relationship to having and adjoining solar farm, but when averaged together they show no negative impact. The wild divergence is due to the difficulty in comping out this tract of land and the wide variety of comparables used. The two comparables that show mild negative influences include a property that was partly developed as a residential subdivision and the other included a doublewide with some value and accessory agricultural structures. The tax assessed value on the improvements were valued at \$60,000. So both of those comparables have some limitations for comparison. The two that show significant enhancement due to adjacency includes a property with a cemetery located in the middle and the other is a tract almost twice as large. Still that larger tract after adjustment provides the best matched pair as it required the least adjustment. I therefore conclude that there is no negative impact due to adjacency to the solar farm shown by this matched pair.

The dwelling that was built on the site was a build-to-suit and was compared to a nearby homesale of a property on a smaller parcel of land. I adjusted for that differenced based on a \$25,000 value for a 1-acre home site versus the \$70,000 purchase price of the larger subject tract. The other adjustments are typical and show no impact due to the adjacency to the solar farm.

The closest solar panel to the home is 780 feet away.

I note that the representative for Kingsmill Homes indicated that the solar farm was never a concern in purchasing the land or selling the home. He also indicated that they had built a number of nearby homes across the street and it had never come up as an issue.



13. Matched Pair – Manatee Solar Farm, Parrish, FL



This solar farm is located near Seminole Trail, Parrish, FL. The solar farm has a 74.50 MW output and is located on a 1,180.38 acre tract and was built in 2016. The tract is owned by Florida Power & Light Company.

I have considered the recent sale of 13670 Highland Road, Wimauma, Florida. This one-story, block home is located just north of the solar farm and separated from the solar farm by a railroad corridor. This home is a 3 BR, 3 BA 1,512 s.f. home with a carport and workshop. The property includes new custom cabinets, granite counter tops, brand new stainless steel appliances, updated bathrooms and new carpet in the bedrooms. The home is sitting on 5 acres. The home was built in 1997.

I have compared this sale to several nearby homesales as part of this matched pair analysis as shown below.

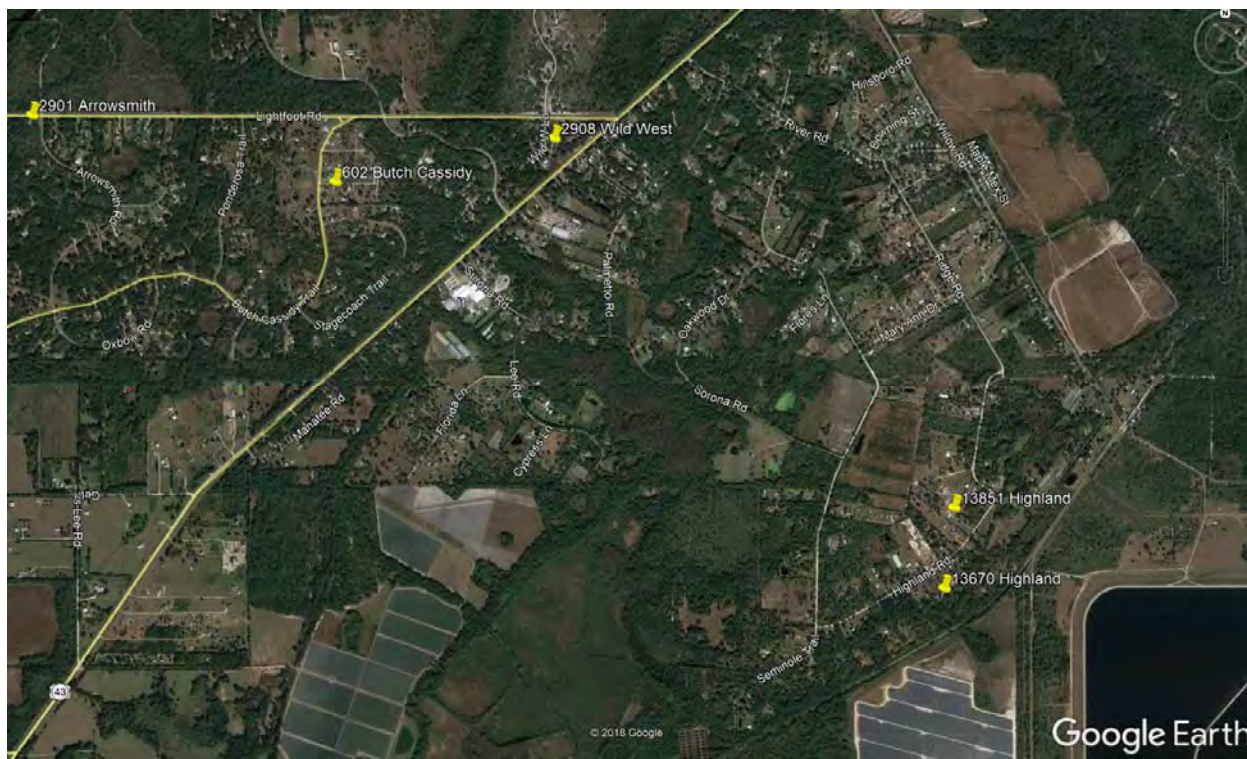
Solar	TAX ID/Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Note
Adjoins	13670 Highland	5.00	8/21/2017	\$255,000	1997	1,512	\$168.65	3/3	Carport/Wrkshp	Ranch	Renov.
Not	2901 Arrowsmith	1.91	1/31/2018	\$225,000	1979	1,636	\$137.53	3/2	2 Garage/Wrkshp	Ranch	
Not	602 Butch Cassidy	1.00	5/5/2017	\$220,000	2001	1,560	\$141.03	3/2	N/A	Ranch	Renov.
Not	2908 Wild West	1.23	7/12/2017	\$254,000	2003	1,554	\$163.45	3/2	2 Garage/Wrkshp	Ranch	Renov.
Not	13851 Highland	5.00	9/13/2017	\$240,000	1978	1,636	\$146.70	4/2	3 Garage	Ranch	Renov.

Solar	TAX ID/Address	Adjoining Sales Adjusted						Note	Total	% Diff
		Time	Acres	YB	GLA	BR/BA	Park			
Adjoins	13670 Highland							\$255,000		
Not	2901 Arrowsmith	\$2,250	\$10,000	\$28,350	-\$8,527	\$5,000	-\$10,000	\$10,000	\$262,073	-3%
Not	602 Butch Cassidy	-\$2,200	\$10,000	-\$6,160	-\$3,385	\$5,000	\$2,000		\$225,255	12%
Not	2908 Wild West	\$0	\$10,000	-\$10,668	-\$3,432	\$5,000	-\$10,000		\$244,900	4%
Not	13851 Highland	\$0	\$0	\$31,920	-\$9,095	\$3,000	-\$10,000		\$255,825	0%
Average										3%

The sales prices of the comparables before adjustments range from \$220,000 to \$254,000. After adjustments they range from \$225,255 to \$262,073. The comparables range from no impact to a strong positive impact. The comparables showing -3% and +4% impact on value are considered within a typical range of value and therefore not indicative of any impact on property value.

This set of matched pair data falls in line with the data seen in other states. The closest solar panel to the home at 13670 Highland is 1,180 feet. There is a wooded buffer between these two properties.

I have included a map showing the relative location of these properties below.



14. Matched Pair – McBride Place Solar Farm, Midland, NC

This project is located on Mount Pleasant Road, Midland, North Carolina. The property is on 627 acres on an assemblage of 974.59 acres. The solar farm was approved in early 2017 for a 74.9 MW facility.

I have considered the sale of 4380 Joyner Road which adjoins the proposed solar farm near the northwest section. This property was appraised in April of 2017 for a value of \$317,000 with no

consideration of any impact due to the solar farm in that figure. The property sold in November 2018 for \$325,000 with the buyer fully aware of the proposed solar farm.

I have considered the following matched pairs to the subject property.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
Adjoins	4380 Joyner	12.00	11/22/2017	\$325,000	1979	1,598	\$203.38	3/2	2xGar	Ranch	Outldg
Not	3870 Elkwood	5.50	8/24/2016	\$250,000	1986	1,551	\$161.19	3/2.5	Det 2xGar	Craft	
Not	8121 Lower Rocky	18.00	2/8/2017	\$355,000	1977	1,274	\$278.65	2/2	2xCarppt	Ranch	Eq. Fac.
Not	13531 Cabarrus	7.89	5/20/2016	\$267,750	1981	2,300	\$116.41	3/2	2xGar	Ranch	

Adjoining Sales Adjusted

Time	Acres	YB	Condition	GLA	BR/BA	Park	Other	Total	% Diff
								\$325,000	
\$7,500	\$52,000	-\$12,250	\$10,000	\$2,273	-\$2,000	\$2,500	\$7,500	\$317,523	2%
\$7,100	-\$48,000	\$4,970		\$23,156	\$0	\$3,000	-\$15,000	\$330,226	-2%
\$8,033	\$33,000	-\$3,749	\$20,000	-\$35,832	\$0	\$0	\$7,500	\$296,702	9%
								Average	3%

The home at 4380 Joyner Road is 275 feet from the closest solar panel.

I also considered the recent sale of a lot at 5800 Kristi Lane that is on the east side of the proposed solar farm. This 4.22-acre lot sold in December 2017 for \$94,000. A home was built on this lot in 2019 with the closest point from home to panel at 689 feet. The home site is heavily wooded and their remains a wooded buffer between the solar panels and the home. I spoke with the broker, Margaret Dabbs, who indicated that the solar farm was considered a positive by both buyer and seller as it insures no subdivision will be happening in that area. Buyers in this market are looking for privacy and seclusion.

The breakdown of recent lot sales on Kristi are shown below with the lowest price paid for the lot with no solar farm exposure, though that lot has exposure to Mt Pleasant Road South. Still the older lot sales have exposure to the solar farm and sold for higher prices than the front lot and adjusting for time would only increase that difference.

Adjoining Lot Sales After Solar Farm Built

Parcel	Solar	Address	Acres	Date Sold	Sales Price	\$/AC	\$/Lot
	Adjoins	5811 Kristi	3.74	5/1/2018	\$100,000	\$26,738	\$100,000
	Adjoins	5800 Kristi	4.22	12/1/2017	\$94,000	\$22,275	\$94,000
	Not	5822 Kristi	3.43	2/24/2020	\$90,000	\$26,239	\$90,000

The lot at 5811 Kristi Lane sold in May 2018 for \$100,000 for a 3.74-acre lot. The home that was built later in 2018 is 505 feet to the closest panel. This home then sold to a homeowner for \$530,000 in April 2020. I have compared this home sale to other properties in the area as shown below.

Adjoining Residential Sales After Solar Farm Built

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
Adjoins	5811 Kristi	3.74	3/31/2020	\$530,000	2018	3,858	\$137.38	5/3.5	2 Gar	2-story	Cement Ext
Not	3915 Tania	1.68	12/9/2019	\$495,000	2007	3,919	\$126.31	3/3.5	2 Gar	2-story	3Det Gar
Not	6782 Manatee	1.33	3/8/2020	\$460,000	1998	3,776	\$121.82	4/2/2h	2 Gar	2-story	Water
Not	314 Old Hickory	1.24	9/20/2019	\$492,500	2017	3,903	\$126.18	6/4.5	2 Gar	2-story	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	5811 Kristi								\$530,000		5%
Not	3915 Tania	\$6,285		\$27,225	-\$3,852		-\$20,000		\$504,657	5%	
Not	6782 Manatee	\$1,189		\$46,000	\$4,995	\$5,000			\$517,183	2%	
Not	314 Old Hickory	\$10,680		\$2,463	-\$2,839	-\$10,000			\$492,803	7%	

After adjusting the comparables, I found that the average adjusted value shows a slight increase in value for the subject property adjoining a solar farm. As in the other cases, this is a mild positive and within the typical range of real estate transactions. I therefore conclude that these matched pairs show no impact on value.

15. Matched Pair – Yamhill II, Amity, OR



This solar farm has a 1.2 MW output and is located on a 186.60 acre tract using less than 10 of those acres. The project was built in 2011.

I have considered the recent sale of Parcel 11 shown above, which sold on July 22, 2015 after the solar farm was built. The property sold for \$326,456 for a 2.12 acre site with a home built in 1912 with 2,154 s.f. and 4 BR and 2 BA. It was noted as a recently remodeled residence with outbuildings that sold for \$151.56 per square foot. I compared this to a number of similar older residences on similar acreage as shown below.

Adjoining Residential Sales After Solar Farm Approved										Adjust for Adjusted Adjusted		
Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Time	Sales	\$/SF	
Adjoins	12001 SW Bellevue, Amity	2.12	7/22/2015	\$326,456	1912	2,154	\$151.56	4/2				
Not	19915 SW Muddy, McMinnville	1.82	2/28/2011	\$213,400	1910	1,798	\$118.69	3/2	27%	\$271,018	\$150.73	
Not	22600 Hopewell, Salem	1.00	10/15/2014	\$256,000	1910	1,966	\$130.21	3/2	5%	\$268,800	\$136.72	
Not	22355 Hopewell, Salem	1.00	11/13/2015	\$320,000	1930	2,592	\$123.46	3/2	-2%	\$313,600	\$120.99	
Not	9955 Bethel, Amity	2.86	2/17/2016	\$289,900	1936	2,028	\$142.95	3/2	-4%	\$278,304	\$137.23	
Not	3361 Lone Oak, McMinnville	2.91	3/1/2016	\$465,000	1937	2,950	\$157.63	3/2	-7%	\$432,450	\$146.59	
										Average	\$138.45	
										Median	\$137.23	

The sales prices of the comparables were only adjusted for time and provide a range of adjusted values of \$120.99 per square foot to \$150.73 per square foot. The subject property sold for above the high end of this range despite being on the older end of the range of comparables. Considering 9955 Bethel as the most similar in acreage, age and size and the price per square foot which adjusted to the median rate at \$137.23 per square foot. Applying that rate to the subject property square footage, the indicated value is \$295,593 for that matched pair, suggesting a 9% enhancement due to the adjacency to the solar farm.

This set of matched pair data falls in line with the data seen in other states. The home is 700 feet from the closest solar panel.

16. Matched Pair – Marion Solar, Aurora, OR



This solar farm has a 0.3 MW output and is located on a 2-acre portion of a 31.76-acre tract. The project was built in 2014.

I have considered the recent sale of Parcels 5 and 6 shown above, which sold on August 6, 2014 after the solar farm was built for \$259,000, or \$16,444 per acre for a combined 15.75 acres. This was sold as vacant agricultural land with a permitted home site.

I compared this to a number of similar land sales as shown below.

Adjoining Residential Land Sales After Solar Farm Approved								Adj for	Adjusted	Adjusted
Solar	Address	Acres	Date Sold	Sales Price	\$/Ac	Soils	Homesite	Time	Sales	\$/SF
Adjoins	18916 Butteville, Aurora	15.75	8/6/2014	\$259,000	\$16,444	2&3	Est.			
Not	15961 Wilsonville, Wilsonville	50.50	5/20/2014	\$950,000	\$18,812	2&3	Est.	1.5%	\$964,250	\$19,094
Not	11471 Wilco, Mt. Angel	13.31	11/10/2014	\$159,500	\$11,983	2&4	N/A	-1.5%	\$157,108	\$11,804
Not	Waconda, Salem	11.86	9/9/2015	\$215,000	\$18,128	2	N/A	-6.5%	\$201,025	\$16,950
									Average	\$15,949
									Median	\$16,950

The sales price for the subject property is in line and between the average and median rates from the comparables. The sale at 11471 Wilco is the most similar in terms of acreage, time, and location. The sale on Waconda is similar in size, but newer and required more adjustment. I therefore conclude that no impact due to the proximity of the solar farm.

17. Matched Pair – Clackamas II, Aurora, OR



This solar farm has a 0.22 MW output and is located on a 1-acre portion of a 156.32-acre tract. The project was built in 2014.

I have considered the homesales along SW Fairway Drive both before and after the solar farm was announced to see if there was any impact on total sales price or price per square foot. As can be seen in the chart below, the sales prices continued to trend upward after the announcement and the price per square foot continued to trend upward. These homes are all approximately 125 feet from the closest solar panel.

I adjusted these based on 0.75% per month difference in date of sale to January 1, 2014. The indicated average and median rate are right in line with the sales before and after the solar farm was built. These comparables strongly indicate no impact in sales price.

Adjoining Residential Sales Before and After Solar Farm Announced								Adjust	Adjusted	Adjusted
Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	Time	Sales	\$/SF
Prior	7500 SW Fairway	0.20	12/9/2011	\$365,000	1992	2,435	\$149.90	18.8%	\$433,620	\$178.08
Prior	7580 SW Fairway	0.30	11/21/2012	\$335,000	1990	2,256	\$148.49	11%	\$370,175	\$164.08
Prior	7480 SW Fairway	0.19	6/27/2013	\$365,000	1992	2,244	\$162.66	5%	\$384,345	\$171.28
							\$153.68	Average		\$171.15
							\$149.90	Median		\$171.28
After	7620 SW Fairway	0.27	7/1/2013	\$365,000	1992	2,212	\$165.01	3.8%	\$378,870	\$171.28
After	7700 SW Fairway	0.18	6/11/2014	\$377,100	1991	2,328	\$161.98	-2%	\$371,444	\$159.55
After	7380 SW Fairway	0.19	7/18/2014	\$415,000	1989	2,115	\$196.22	-6%	\$390,100	\$184.44
							\$174.40	Average		\$171.76
							\$165.01	Median		\$171.28

18. Matched Pair – Grand Ridge Solar, Streator, IL



This solar farm has a 20 MW output and is located on a 160-acre tract. The project was built in 2012.

I have considered the recent sale of Parcel 13 shown above, which sold in October 2016 after the solar farm was built. I have compared that sale to a number of nearby residential sales not in proximity to the solar farm as shown below. Parcel 13 is 480 feet from the closest solar panel.

Adjoining Residential Sales After Solar Farm Completed

#	TAX ID	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA
13	34-21-237-000	2	Oct-16	\$186,000	1997	2,328	\$79.90

Not Adjoining Residential Sales After Solar Farm Completed

#	TAX ID	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA
712 Columbus Rd	32-39-134-005	1.26	Jun-16	\$166,000	1950	2,100	\$79.05
504 N 2782 Rd	18-13-115-000	2.68	Oct-12	\$154,000	1980	2,800	\$55.00
7720 S Dwight Rd	11-09-300-004	1.14	Nov-16	\$191,000	1919	2,772	\$68.90
701 N 2050th Rd	26-20-105-000	1.97	Aug-13	\$200,000	2000	2,200	\$90.91
9955 E 1600th St	04-13-200-007	1.98	May-13	\$181,858	1991	2,600	\$69.95

TAX ID	Date Sold	Time	Adjustments	
			Total	\$/Sf
34-21-237-000	Oct-16		\$186,000	\$79.90
32-39-134-005	Jun-16		\$166,000	\$79.05
18-13-115-000	Oct-12	\$12,320	\$166,320	\$59.40
11-09-300-004	Nov-16		\$191,000	\$68.90
26-20-105-000	Aug-13	\$12,000	\$212,000	\$96.36
04-13-200-007	May-13	\$10,911	\$192,769	\$74.14

	Adjoins Solar Farm		Not Adjoin Solar Farm	
	Average	Median	Average	Median
Sales Price/SF	\$79.90	\$79.90	\$75.57	\$74.14
GBA	2,328	2,328	2,494	2,600

Based on the matched pairs I find no indication of negative impact due to proximity to the solar farm.

The most similar comparable is the home on Columbus that sold for \$79.05 per square foot. This is higher than the median rate for all of the comparables. Applying that price per square foot to the subject property square footage indicates a value of \$184,000.

19. Matched Pair – Portage Solar, Portage, IN



This solar farm has a 2 MW output and is located on a portion of a 56-acre tract. The project was built in 2012.

I have considered the recent sale of Parcels 5 and 12. Parcel 5 is an undeveloped tract, while Parcel 12 is a residential home. I have compared each to a set of comparable sales to determine if there was any impact due to the adjoining solar farm. This home is 1,320 feet from the closest solar panel.

Adjoining Residential Sales After Solar Farm Completed

#	TAX ID	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA
12	64-06-19-326-007.000-015	1.00	Sep-13	\$149,800	1964	1,776	\$84.35

Nearby Residential Sales After Solar Farm Completed

#	TAX ID	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA
2501 Architect Dr	64-04-32-202-004.000-021	1.31	Nov-15	\$191,500	1959	2,064	\$92.78
336 E 1050 N	64-07-09-326-003.000-005	1.07	Jan-13	\$155,000	1980	1,908	\$81.24
2572 Pryor Rd	64-05-14-204-006.000-016	1.00	Jan-16	\$216,000	1960	2,348	\$91.99

Adjoining Land Sales After Solar Farm Completed

#	TAX ID	Acres	Date Sold	Sales Price	\$/AC
5	64-06-19-200-003.000-015	18.70	Feb-14	\$149,600	\$8,000

Nearby Land Sales After Solar Farm Completed

#	TAX ID	Acres	Date Sold	Sales Price	\$/AC
	64-07-22-401-001.000-005	74.35	Jun-17	\$520,450	\$7,000
	64-15-08-200-010.000-001	15.02	Jan-17	\$115,000	\$7,658

Residential Sale Adjustment Chart

TAX ID	Date Sold	Adjustments		\$/Sf
		Time	Total	
64-06-19-326-007.000-015	Sep-13	\$8,988	\$158,788	\$89.41
64-04-32-202-004.000-021	Nov-15	\$3,830	\$195,330	\$94.64
64-07-09-326-003.000-005	Jan-13	\$9,300	\$164,300	\$86.11
64-05-14-204-006.000-016	Jan-16		\$216,000	\$91.99

2% adjustment/year
Adjusted to 2017

	Adjoins Solar Farm		Not Adjoin Solar Farm	
	Average	Median	Average	Median
Sales Price/SF	\$89.41	\$89.41	\$90.91	\$91.99
GBA	1,776	1,776	2,107	2,064

After adjusting the price per square foot is 2.88% less for the home adjoining the solar farm versus those not adjoining the solar farm. This is within the typical range of variation to be anticipated in any real estate transaction and indicates no impact on property value.

Applying the price per square foot for the 336 E 1050 N sale, which is the most similar to the Parcel 12 sale, the adjusted price at \$81.24 per square foot applied to the Parcel 12 square footage yields a value of \$144,282.

Land Sale Adjustment Chart

TAX ID	Date Sold	Adjustments		\$/Acre
		Time	Total	
64-06-19-200-003.000-015	Feb-14	\$8,976	\$158,576	\$8,480
64-07-22-401-001.000-005	Jun-17		\$520,450	\$7,000
64-15-08-200-010.000-001	Jan-17		\$115,000	\$7,658

2% adjustment/year
Adjusted to 2017

	Adjoins Solar Farm		Not Adjoin Solar Farm	
	Average	Median	Average	Median
Sales Price/Ac	\$8,480	\$8,480	\$7,329	\$7,329
Acres	18.70	18.70	44.68	44.68

After adjusting the price per acre is higher for the property adjoining the solar farm, but the average and median size considered is higher which suggests a slight discount. This set of matched pair supports no indication of negative impact due to the adjoining solar farm.

Alternatively, adjusting the 2017 sales back to 2014 I derive an indicated price per acre for the comparables at \$6,580 per acre to \$7,198 per acre, which I compare to the unadjusted subject property sale at \$8,000 per acre.

20. Matched Pair – Dominion Indy III, Indianapolis, IN

This solar farm has an 8.6 MW output and is located on a portion of a 134-acre tract. The project was built in 2013.

There are a number of homes on small lots located along the northern boundary and I have considered several sales of these homes. I have compared those homes to a set of nearby not adjoining home sales as shown below. The adjoining homes that sold range from 380 to 420 feet from the nearest solar panel, with an average of 400 feet.

Adjoining Residential Sales After Solar Farm Completed

#	TAX ID	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA
2	2013249	0.38	12/9/2015	\$140,000	2006	2,412	\$58.04
4	2013251	0.23	9/6/2017	\$160,000	2006	2,412	\$66.33
5	2013252	0.23	5/10/2017	\$147,000	2009	2,028	\$72.49
11	2013258	0.23	12/9/2015	\$131,750	2011	2,190	\$60.16
13	2013260	0.23	3/4/2015	\$127,000	2005	2,080	\$61.06
14	2013261	0.23	2/3/2014	\$120,000	2010	2,136	\$56.18

Nearby Not Adjoining Residential Sales After Solar Farm Completed

#	TAX ID	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA
5836 Sable Dr	2013277	0.14	Jun-16	\$141,000	2005	2,280	\$61.84
5928 Mosaic Pl	2013845	0.17	Sep-15	\$145,000	2007	2,280	\$63.60
5904 Minden Dr	2012912	0.16	May-16	\$130,000	2004	2,252	\$57.73
5910 Mosaic Pl	2000178	0.15	Aug-16	\$146,000	2009	2,360	\$61.86
5723 Minden Dr	2012866	0.26	Nov-16	\$139,900	2005	2,492	\$56.14

Adjustments

TAX ID	Date Sold	Time	Total	\$/Sf
2013249	12/9/2015	\$5,600	\$145,600	\$60.36
2013251	9/6/2017		\$160,000	\$66.33
2013252	5/10/2017		\$147,000	\$72.49
2013258	12/9/2015	\$5,270	\$137,020	\$62.57
2013260	3/4/2015	\$5,080	\$132,080	\$63.50
2013261	2/3/2014	\$7,200	\$127,200	\$59.55
2013277	6/1/2016	\$2,820	\$143,820	\$63.08
2013845	9/1/2015	\$5,800	\$150,800	\$66.14
2012912	5/1/2016	\$2,600	\$132,600	\$58.88
2000178	8/1/2016	\$2,920	\$148,920	\$63.10
2012866	11/1/2016	\$2,798	\$142,698	\$57.26

2% adjustment/year
Adjusted to 2017

	Adjoins Solar Farm		Not Adjoin Solar Farm	
	Average	Median	Average	Median
Sales Price/SF	\$64.13	\$63.03	\$61.69	\$63.08
GBA	2,210	2,163	2,333	2,280

This set of homes provides very strong indication of no impact due to the adjacency to the solar farm and includes a large selection of homes both adjoining and not adjoining in the analysis.

21. Matched Pair – Beetle-Shelby Solar, Cleveland County, NC



This project is located on Bachelor Road at Timber Drive, Mooresboro, NC. This is a 4 MW facility on a parent tract of 24 acres.

I have considered a custom home on a nearby property adjoining this solar farm. This home is located on 10.08 acres, was built in 2013, and has a gross living area of 3,196 s.f. This property sold on October 1, 2018 \$416,000. I compared this to several nearby homes of similar size on large lots as shown below.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
Adjoins	1715 Timber	10.08	10/1/2018	\$416,000	2013	3,196	\$130.16	4/3.5	2xGar	1.5 story	Pool, Scrn Prch
Not	1021 Posting	2.45	2/15/2019	\$414,000	2000	4,937	\$83.86	4/4.5	2xGar	1.5 story	Scrn Prch
Not	2521 Wood	3.25	7/30/2017	\$350,000	2003	3,607	\$97.03	4/4	4xGar	1.5 story	Pool, sunroom
Not	356 Whitaker	7.28	1/9/2017	\$340,000	1997	3,216	\$105.72	4/4	2xGar	Ranch	Pole barn

Adjoining Sales Adjusted

Time	Acres	YB	GLA	BR/BA	Park	Other	Total	% Diff
							\$416,000	
	\$15,000	\$37,674	-\$58,398	-\$10,000			\$398,276	4%
\$10,500	\$12,000	\$24,500	-\$15,952	-\$5,000	-\$5,000		\$371,048	11%
\$15,300	\$5,000	\$38,080	-\$846	-\$5,000			\$392,534	6%
							Average	7%

The data on these sales all show that the subject property adjoining the solar farm sold for more than these other comparable sales. These sales suggest a mild increase in value due to proximity to the solar farm; however, the subject property is a custom home with upgrades that would balance out that difference. I therefore conclude that these matched pairs support an indication of no impact on property value.

22. Matched Pair – Courthouse Solar, Gaston County, NC



This project is a 5 MW facility located on 161.92 acres on Tryon Courthouse Road near Bessemer City that was approved in late 2016 but has not yet been constructed due to delays in the power purchase agreement process with Duke Progress Energy.

I have considered a recent sale of a home (Parcel 13) located across from this approved solar farm project as well as an adjoining lot sale (Parcel 25) to the west of this approved project.

I compared the home sale to similar sized homes with similar exposure to county roads as shown below. I considered three similar sales that once adjusted for differences show a positive relationship due to proximity to the solar farm. The positive impact is less than 5% which is a standard deviation for real estate transaction and indicates no impact on property value.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style
Adjoins	2134 Tryon Court.	0.85	3/15/2017	\$111,000	2001	1,272	\$87.26	3/2	Drive	Ranch
Not	214 Kiser	1.14	1/5/2017	\$94,000	1987	1,344	\$69.94	3/2	Drive	Ranch
Not	101 Windward	0.30	3/30/2017	\$104,000	1995	1,139	\$91.31	3/2	Drive	Ranch
Not	5550 Lennox	1.44	10/12/2018	\$115,000	2002	1,224	\$93.95	3/2	Drive	Ranch

Adjoining Residential Sales After Solar Farm Approved

Adjoining Sales Adjusted

Solar	Address	Acres	Date Sold	Sales Price	Time	Acres	YB	GLA	Total	% Diff
Adjoins	2134 Tryon Court.	0.85	3/15/2017	\$111,000					\$111,000	
Not	214 Kiser	1.14	1/5/2017	\$94,000	\$533		\$9,212	-\$1,511	\$102,234	8%
Not	101 Windward	0.30	3/30/2017	\$104,000	-\$128		\$4,368	\$5,615	\$113,855	-3%
Not	5550 Lennox	1.44	10/12/2018	\$115,000	-\$5,444		-\$805	-\$2,396	\$106,355	4%
									Average	3%

Similarly, I compared the lot sale to four nearby land sales. Parcel 25 could not be subdivided and was a single estate lot. There were a number of nearby lot sales along Weaver Dairy that sold for \$43,000 to \$30,000 per lot for 4-acre home lots. Estate lots typically sell at a base homesite rate

that would be represented by those prices plus a diminishing additional value per additional acre. The consideration of the larger tract more accurately illustrates the value per acre for larger tracts. After adjustments, the land sales show a mild positive impact on land value with an average increase of 9%, which supports a positive impact.

Adjoining Residential Land Sales After Solar Farm Approved						Adjoining Sales Adjusted				
Solar	Address	Acres	Date Sold	Sales Price	\$/Ac	Time	Acres	Total	% Diff	Note
Adjoins	5021 Buckland	9.66	3/21/2018	\$58,500	\$6,056			\$58,500		1 homesite only
Not	Campbell	6.75	10/31/2018	\$42,000	\$6,222	-\$773	\$18,107	\$59,333	-1%	
Not	Kiser	17.65	11/27/2017	\$69,000	\$3,909	\$647	-\$19,508	\$50,139	14%	6 acres less usable due to shape (50%)
Not	522 Weaver Dairy	3.93	2/26/2018	\$30,000	\$7,634	\$57	\$25,000	\$55,057	6%	
Not	779 Sunnyside	6.99	3/6/2017	\$34,000	\$4,864	\$1,062	\$12,987	\$48,049	18%	
Average									9%	

23. Matched Pair – Mariposa Solar, Gaston County, NC



This project is a 5 MW facility located on 35.80 acres out of a parent tract of 87.61 acres at 517 Blacksnsake Road, Stanley that was built in 2016.

I have considered a number of recent sales around this facility as shown below.

The first is identified in the map above as Parcel 1, which is 215 Mariposa Road. This is an older dwelling on large acreage with only one bathroom. I've compared it to similar nearby homes as shown below.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style
Adjoins	215 Mariposa	17.74	12/12/2017	\$249,000	1958	1,551	\$160.54	3/1	Garage	Br/Rnch
Not	249 Mariposa	0.48	3/1/2019	\$153,000	1974	1,792	\$85.38	4/2	Garage	Br/Rnch
Not	110 Airport	0.83	5/10/2016	\$166,000	1962	2,165	\$76.67	3/2	Crprt	Br/Rnch
Not	1249 Blacksnsake	5.01	9/20/2018	\$242,500	1980	2,156	\$112.48	3/2	Drive	1.5
Not	1201 Abernathy	27.00	5/3/2018	\$390,000	1970	2,190	\$178.08	3/2	Crprt	Br/Rnch

Adjoining Residential Sales After Solar Farm Approved					Adjoining Sales Adjusted								
Solar	Address	Acres	Date Sold	Sales Price	Time	YB	Acres	GLA	BR/BA	Park	Other	Total	% Diff
Adjoins	215 Mariposa	17.74	12/12/2017	\$249,000								\$249,000	
Not	249 Mariposa	0.48	3/1/2019	\$153,000	-\$5,583	-\$17,136	\$129,450	-\$20,576	-\$10,000			\$229,154	8%
Not	110 Airport	0.83	5/10/2016	\$166,000	\$7,927	-\$4,648	\$126,825	-\$47,078	-\$10,000			\$239,026	4%
Not	1249 Blacksnake	5.01	9/20/2018	\$242,500	-\$5,621	-\$37,345	\$95,475	-\$68,048	-\$10,000	\$5,000		\$221,961	11%
Not	1201 Abernathy	27.00	5/3/2018	\$390,000	-\$4,552	-\$32,760	-\$69,450	-\$60,705	-\$10,000			\$212,533	15%
												Average	9%

The average difference after adjusting for all factors is +9% on average, which suggests an enhancement due to the solar farm across the street. Given the large adjustments for acreage and size, I will focus on the low end of the adjusted range at 4%, which is within the typical deviation and therefore suggests no impact on value.

I have also considered Parcel 4 that sold after the solar farm was approved but before it had been constructed in 2016.

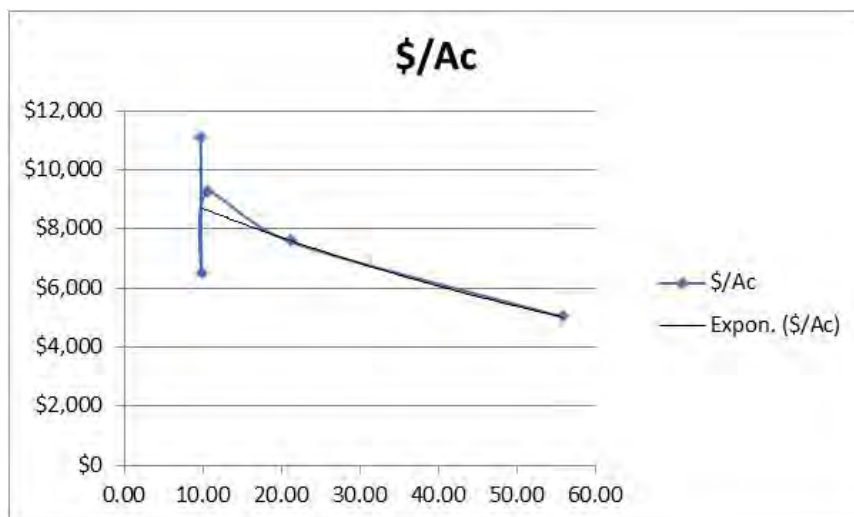
Adjoining Residential Sales After Solar Farm Approved												
Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	
Adjoins	242 Mariposa	2.91	9/21/2015	\$180,000	1962	1,880	\$95.74	3/2	Carport	Br/Rnch	Det Wrkshop	
Not	249 Mariposa	0.48	3/1/2019	\$153,000	1974	1,792	\$85.38	4/2	Garage	Br/Rnch		
Not	110 Airport	0.83	5/10/2016	\$166,000	1962	2,165	\$76.67	3/2	Crprt	Br/Rnch		
Not	1249 Blacksnake	5.01	9/20/2018	\$242,500	1980	2,156	\$112.48	3/2	Drive	1.5		

Adjoining Residential Sales After Solar Farm Approved					Adjoining Sales Adjusted								
Solar	Address	Acres	Date Sold	Sales Price	Time	YB	Acres	GLA	BR/BA	Park	Other	Total	% Diff
Adjoins	242 Mariposa	2.91	9/21/2015	\$180,000								\$180,000	
Not	249 Mariposa	0.48	3/1/2019	\$153,000	-\$15,807	-\$12,852	\$18,468	\$7,513		-\$3,000	\$25,000	\$172,322	4%
Not	110 Airport	0.83	5/10/2016	\$166,000	-\$3,165	\$0	\$15,808	-\$28,600			\$25,000	\$175,043	3%
Not	1249 Blacksnake	5.01	9/20/2018	\$242,500	-\$21,825	-\$30,555	-\$15,960	-\$40,942		\$2,000	\$25,000	\$160,218	11%
												Average	6%

The average difference after adjusting for all factors is +6%, which is again suggests a mild increase in value due to the adjoining solar farm use. The median is a 4% adjustment, which is within a standard deviation and suggests no impact on property value.

I have also considered the recent sale of Parcel 13 that is located on Blacksnake Road south of the project. I was unable to find good land sales in the same 20 acre range, so I have considered sales of larger and smaller acreage. I adjusted each of those land sales for time. I then applied the price per acre to a trendline to show where the expected price per acre would be for 20 acres. As can be seen in the chart below, this lines up exactly with the purchase of the subject property. I therefore conclude that there is no impact on Parcel 13 due to proximity to the solar farm.

Adjoining Residential Land Sales After Solar Farm Approved						Adjoining Sales Adjusted	
Solar	Tax/Street	Acres	Date Sold	Sales Price	\$/Ac	Time	\$/Ac
Adjoins	174339/Blacksnake	21.15	6/29/2018	\$160,000	\$7,565		\$7,565
Not	227852/Abernathy	10.57	5/9/2018	\$97,000	\$9,177	\$38	\$9,215
Not	17443/Legion	9.87	9/7/2018	\$64,000	\$6,484	-\$37	\$6,447
Not	164243/Alexis	9.75	2/1/2019	\$110,000	\$11,282	-\$201	\$11,081
Not	176884/Bowden	55.77	6/13/2018	\$280,000	\$5,021	\$7	\$5,027

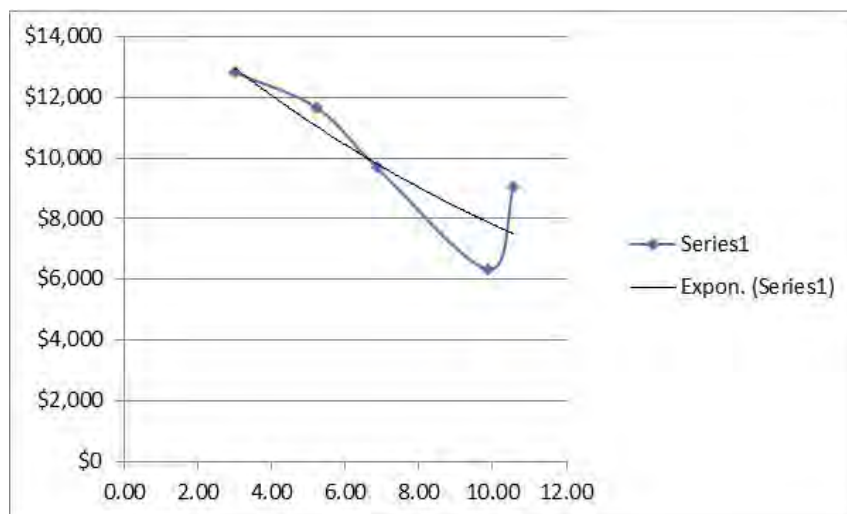


Finally, I have considered the recent sale of Parcel 17 that sold as vacant land. I was unable to find good land sales in the same 7 acre range, so I have considered sales of larger and smaller acreage. I adjusted each of those land sales for time. I then applied the price per acre to a trendline to show where the expected price per acre would be for 7 acres. As can be seen in the chart below, this lines up with the trendline running right through the purchase price for the subject property. I therefore conclude that there is no impact on Parcel 13 due to proximity to the solar farm. I note that this property was improved with a 3,196 square foot ranch built in 2018 following the land purchase, which shows that development near the solar farm was unimpeded.

Adjoining Residential Land Sales After Solar Farm Approved

Adjoining Sales Adjusted

Solar	Tax/Street	Acres	Date Sold	Sales Price	\$/Ac	Time	Location	\$/Ac
Adjoins	227039/Mariposa	6.86	12/6/2017	\$66,500	\$9,694			\$9,694
Not	227852/Abernathy	10.57	5/9/2018	\$97,000	\$9,177	-\$116		\$9,061
Not	17443/Legion	9.87	9/7/2018	\$64,000	\$6,484	-\$147		\$6,338
Not	177322/Robinson	5.23	5/12/2017	\$66,500	\$12,715	\$217	-\$1,272	\$11,661
Not	203386/Carousel	2.99	7/13/2018	\$43,500	\$14,548	-\$262	-\$1,455	\$12,832



24. Matched Pair – Clarke County Solar, Clarke County, VA



This project is a 20 MW facility located on a 234-acre tract that was built in 2017.

I have considered a recent sale of Parcel 3. The home on this parcel is 1,230 feet from the closest panel as measured in the second map from Google Earth, which shows the solar farm under construction.

I've compared this home sale to a number of similar rural homes on similar parcels as shown below. I have used multiple sales that bracket the subject property in terms of sale date, year built, gross living area, bedrooms and bathrooms. Bracketing the parameters insures that all factors are well balanced out in the adjustments. The trend for these sales shows a positive value for the adjacency to the solar farm.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
Adjoins	833 Nations Spr	5.13	1/9/2017	\$295,000	1979	1,392	\$211.93	3/2	Det Gar	Ranch	Unfin bsmt
Not	85 Ashby	5.09	9/11/2017	\$315,000	1982	2,333	\$135.02	3/2	2 Gar	Ranch	
Not	541 Old Kitchen	5.07	9/9/2018	\$370,000	1986	3,157	\$117.20	4/4	2 Gar	2 story	
Not	4174 Rockland	5.06	1/2/2017	\$300,000	1990	1,688	\$177.73	3/2	3 Gar	2 story	
Not	400 Sugar Hill	1.00	6/7/2018	\$180,000	1975	1,008	\$178.57	3/1	Drive	Ranch	

Adjoining Residential Sales After Solar Farm Approved

Adjoining Residential Sales After Solar Farm Approved					Adjoining Sales Adjusted									
Solar	Address	Acres	Date Sold	Sales Price	Time	Acres	YB	GLA	BR/BA	Park	Other	Total	% Diff	
Adjoins	833 Nations Spr	5.13	1/9/2017	\$295,000								\$295,000		
Not	85 Ashby	5.09	9/11/2017	\$315,000	-\$6,300			-\$6,615	-\$38,116		-\$7,000	\$15,000	\$271,969	8%
Not	541 Old Kitchen	5.07	9/9/2018	\$370,000	-\$18,500			-\$18,130	-\$62,057		-\$7,000	\$15,000	\$279,313	5%
Not	4174 Rockland	5.06	1/2/2017	\$300,000				-\$23,100	-\$15,782		-\$12,000	\$15,000	\$264,118	10%
Not	400 Sugar Hill	1.00	6/7/2018	\$180,000	-\$9,000	\$43,000	\$5,040	\$20,571	\$10,000	\$3,000	\$15,000	\$267,611	9%	
												Average	8%	

25. Matched Pair – Flemington Solar, Flemington, NJ



This solar farm is located off Kuhl Road and is south of Hart Boulevard. I spoke with Gerry Giles a local realtor who is familiar with the adjoining neighborhood as she has lived in that neighborhood. She indicated that in her opinion the adjoining solar farm is a quiet neighbor and would not have a negative impact on property value.

Furthermore, I spoke with her specifically about the recent sale of 10 Coventry, which I have included in the matched pairs. She noted that the seller was a divorced bachelor who had set the place up like a dorm and that it showed terribly. She believes proper staging of the interior would have significantly improved the sales price on this home. I adjusted for that factor in the comparables in that analysis based on that information.

I have identified four recent sales of homes adjoining this subdivision along Hart Boulevard and the side streets off of Hart Boulevard.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
8	Adjoins	10 Coventry	0.36	3/19/2018	\$370,000	1986	1,829	\$202.30	3/2.5	2-Gar	2-Story	Staging
	Not	58 Wellington	0.45	6/8/2018	\$334,500	1984	1,757	\$190.38	3/2.5	2-Gar	2-Story	
	Not	28 Bristol	0.35	1/17/2018	\$398,000	1985	1,757	\$226.52	3/2.5	2-Gar	2-Story	
	Not	1 Sheffield	0.35	12/15/2017	\$399,900	1984	1,870	\$213.85	4/2.5	2-Gar	2-Story	

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$370,000			295
-\$2,283	\$3,345	\$8,224			-\$10,035	\$333,751	10%		
\$2,046	\$1,990	\$9,786			-\$11,940	\$399,882	-8%		
\$3,168	\$3,999	-\$5,261			-\$11,997	\$389,809	-5%	-1%	

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
14	Adjoins	54 Hart	0.36	7/25/2016	\$420,000	1986	2,680	\$156.72	4/2.5	2-Gar	2-Story	
	Not	43 Aberdeen	0.36	11/21/2016	\$417,000	1987	2,524	\$165.21	4/2.5	2-Gar	2-Story	
	Not	42 Aberdeen	0.34	2/7/2017	\$454,900	1988	2,734	\$166.39	5/3	2-Gar	2-Story	
	Not	18 Aberdeen	0.34	11/6/2017	\$437,500	1988	2,687	\$162.82	4/2.5	2-Gar	2-Story	

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$420,000			375
-\$4,182	-\$2,085	\$15,464				\$426,197	-1%		
-\$7,552	-\$4,549	-\$5,391	-\$5,000			\$432,408	-3%		
-\$17,291	-\$4,375	-\$684				\$415,150	1%	-1%	

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
16	Adjoins	6 Portsmouth	0.36	6/19/2015	\$410,000	1991	2,687	\$152.59	4/2.5	2-Gar	2-Story	
	Not	43 Aberdeen	0.36	11/21/2016	\$417,000	1987	2,524	\$165.21	4/2.5	2-Gar	2-Story	
	Not	42 Aberdeen	0.34	2/7/2017	\$454,900	1988	2,734	\$166.39	5/3	2-Gar	2-Story	
	Not	18 Aberdeen	0.34	11/6/2017	\$437,500	1988	2,687	\$162.82	4/2.5	2-Gar	2-Story	

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$410,000			425
-\$18,308	\$8,340	\$16,158				\$423,190	-3%		
-\$22,962	\$6,824	-\$4,692	-\$5,000			\$429,069	-5%		
-\$32,112	\$6,563	\$0				\$411,950	0%	-3%	

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
19	Adjoins	12 Stratford	0.55	11/30/2017	\$414,900	1991	1,828	\$226.97	3/2.5	2-Gar	2-Story	
	Not	58 Wellington	0.45	6/8/2018	\$334,500	1984	1,757	\$190.38	3/2.5	2-Gar	2-Story	
	Not	28 Bristol	0.35	1/17/2018	\$398,000	1985	1,757	\$226.52	3/2.5	2-Gar	2-Story	
	Not	1 Sheffield	0.35	12/15/2017	\$399,900	1984	1,870	\$213.85	4/2	Gar	2-Story	

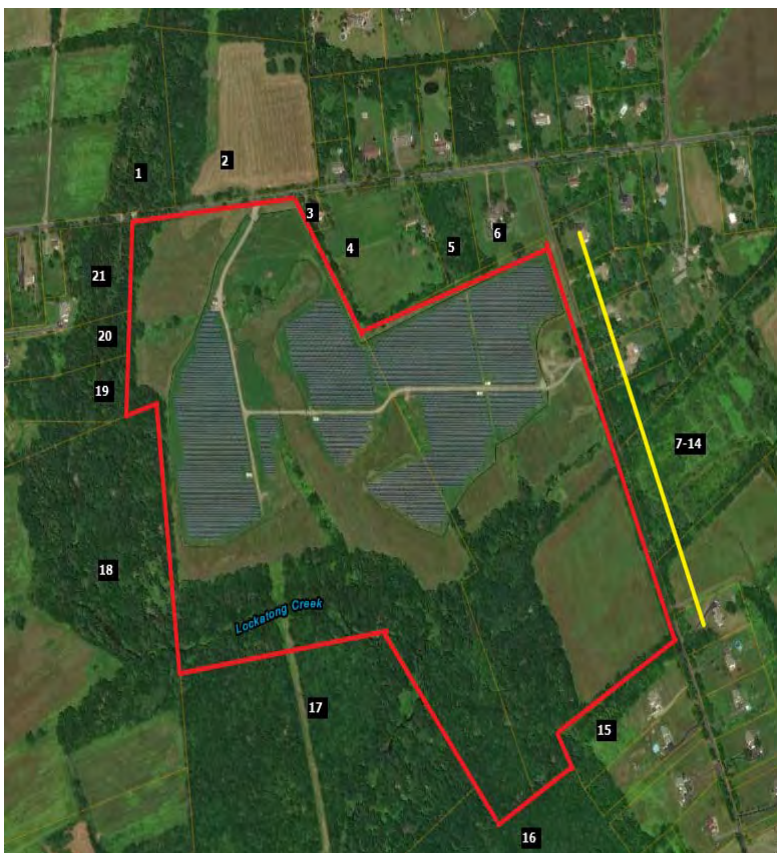
Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$414,900			345
-\$5,356	\$11,708	\$8,110				\$348,962	16%		
-\$1,610	\$11,940	\$9,650				\$417,980	-1%		
-\$505	\$13,997	-\$5,389	\$5,000	\$7,000		\$420,002	-1%	5%	

The range of impact identified by these matched pairs ranges are therefore -3% to +5% for distances ranging from 295 feet to 425 feet with an average difference from these four indicators of 0%. As noted earlier this range is within the typical plus or minus for any real estate transaction and indicates no impact on property value.

The broker Gerry Giles indicated that she has not seen the solar farm having any impact on adjoining property value. She noted that the solar farm is visible from Hart Boulevard and from a number of these backyards, but is still heavily screened.

26. Matched Pair – Frenchtown Solar, Frenchtown, NJ



This solar farm is located off Muddy Run Road. I spoke with Gerry Giles a local realtor who helped a buyer purchase 5 Muddy Town Road. She indicated that his home adjoining the solar farm had multiple offers and that most of those offers were higher than the offer she presented, but her buyer provided an all cash offer. This was important as the property was being purchased while the septic system required repairs and updates that the seller paid for but completed the work during/after the purchase. The solar farm was not considered a negative by her buyer.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
7	Adjoins	5 Muddy Run	2.14	6/23/2017	\$385,000	1985	2,044	\$188.36	4/2.5	2-Gar	2-Story	Updated
	Not	319 Barbertown	2.00	5/21/2019	\$358,000	1988	2,240	\$159.82	4/3	Gar	2-Story	
	Not	132 Kingwood	3.17	10/31/2016	\$380,000	1996	2,392	\$158.86	3/2.5	Det 2	2-Story	
	Not	26 Barbertown	2.03	5/21/2019	\$360,000	1998	2,125	\$169.41	4/3	2-Gar	2-Story	

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$385,000			250
-\$13,673	-\$5,370	-\$18,795	-\$5,000	\$10,000	\$20,000	\$345,162	10%		
\$4,893	-\$20,900	-\$33,171		\$5,000	\$20,000	\$355,823	8%		
-\$13,749	-\$23,400	-\$8,233	-\$5,000		\$20,000	\$329,618	14%		
								11%	

After typical adjustments including a \$20,000 increase in the comparable sales for updates, the subject property is showing a significant premium that may be attributable to the adjoining solar farm.

27. Matched Pair – McGraw Solar, East Windsor, NJ



This solar farm is located off Oak Creek Road. The matched pairs considered at this solar farm involve the townhome/duplexes located off Wyndmoor Drive and a single family home off Wilmor Drive.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style
	Adjoins	153 Wyndmoor	N/A	4/25/2017	\$215,000	1987	1,532	\$140.34	3/3	Gar	2-Story
	Not	164 Wyndmoor	N/A	5/13/2019	\$258,000	1987	1,532	\$168.41	3/3	Gar	2-Story
	Not	33 Monroe	N/A	2/6/2018	\$261,000	1987	1,532	\$170.37	3/3	Gar	2-Story
	Not	20 Spyglass	N/A	12/19/2017	\$240,000	1987	1,532	\$156.66	3/3	Gar	2-Story

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$215,000			175
-\$15,862	\$0	\$0				\$242,138	-13%		
-\$6,157	\$0	\$0				\$254,843	-19%		
-\$4,695	\$0	\$0				\$235,305	-9%	-14%	

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style
	Adjoins	149 Wyndmoor	N/A	5/24/2017	\$206,000	1987	1,236	\$166.67	2/1.5	Gar	2-Story
	Not	97 Wyndmoor	N/A	4/17/2017	\$210,000	1987	1,236	\$169.90	2/1.5	Gar	2-Story
	Not	24 Monroe	N/A	12/23/2016	\$217,979	1987	1,560	\$139.73	3/2.5	Gar	2-Story
	Not	81 Wyndmoor	N/A	1/31/2018	\$204,000	1987	1,254	\$162.68	2/2.5	Gar	2-Story

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$206,000			175
\$639	\$0	\$0				\$210,639	-2%		
\$2,723	\$0	-\$27,164				\$193,539	6%		
-\$4,225	\$0	-\$1,757				\$198,018	4%	3%	

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style
	Adjoins	26 Wilmor	0.46	3/19/2019	\$286,000	1961	1,092	\$261.90	3/1.5	Gar	Ranch
	Not	25 Pinehurst	0.48	5/17/2019	\$315,000	1967	1,314	\$239.73	3/1&2	Gar	Ranch
	Not	15 Maple Stream	0.40	6/6/2017	\$285,000	1964	1,202	\$237.10	3/1.5	Gar	Ranch
	Not	3 Amy	0.29	10/11/2018	\$286,000	1969	1,229	\$232.71	3/1.5	Gar	Ranch

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$286,000			400
-\$1,566	-\$9,450	-\$31,932	-\$5,000			\$267,052	7%		
\$15,635	-\$4,275	-\$15,649				\$280,711	2%		
\$3,832	-\$11,440	-\$19,129				\$259,263	9%	6%	
						Average		-2%	250

The range of impact identified by these matched pairs ranges are therefore -14% to +6% for distances ranging from 175 feet to 400 feet with an average difference from these three indicators of -2%. As noted earlier this range is within the typical plus or minus for any real estate transaction and indicates no impact on property value.

This set of matched pairs is interesting and there appears to be more going on when you compare the two townhome properties. One shows a significant discount and the other shows no impact. When I compare the two townhomes that both back up to the same solar farm, the townhome that includes 1,532 s.f. sold for only \$9,000 more than the townhome that has 1,236 s.f. I attempted to speak with the broker involved with these but was unable to get a reply. The difference there strongly indicates that something else is going on with the larger townhome. I will not rely heavily on that matched pair, but I have included it to be complete.

28. Matched Pair – Tinton Falls Solar, Tinton Falls, NJ



This solar farm is located off W. Park Avenue. The tract with the solar farm also has a condo/townhome project from which I have considered recent sales activity. I note that the developer of the solar farm and the townhome community clearly did not see any negative impact from the combined use. These units are still being constructed with new sales expected in the near future.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	111 Kyle	N/A	8/8/2018	\$402,000	2015	2,200	\$182.73	3/2.5	Gar	3-Story	End
	Not	80 Kyle	N/A	9/18/2017	\$410,000	2015	2,226	\$184.19	2/2.5	Gar	3-Story	End/Park
	Not	15 Michael	N/A	9/19/2018	\$412,000	2016	2,157	\$191.01	3/2.5	Gar	3-Story	End
	Not	31 Michael	N/A	4/1/2019	\$390,000	2016	2,200	\$177.27	3/2.5	Gar	3-Story	End
	Not	15 Michael	N/A	9/9/2018	\$412,000	2016	2,157	\$191.01	3/2.5	Gar	3-Story	End

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$402,000			185
\$11,194	\$0	-\$2,873			-\$20,500	\$397,821	1%		
-\$1,458	-\$2,060	\$4,928				\$413,410	-3%		
-\$7,756	-\$1,950	\$0				\$380,294	5%		
-\$1,111	-\$2,060	\$4,928				\$413,757	-4%		

1%

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	47 Kyle	N/A	8/31/2018	\$260,000	2016	1,140	\$228.07	2/2	Gar	3-Story	End
	Not	26 Jake	N/A	10/31/2017	\$268,000	2014	1,140	\$235.09	2/2	Gar	3-Story	End
	Not	4 Michael	N/A	11/8/2018	\$260,000	2015	1,140	\$228.07	2/2	Gar	3-Story	End
	Not	36 Kyle	N/A	1/10/2019	\$260,000	2015	1,140	\$228.07	2/2	Gar	3-Story	

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$260,000			155
\$6,866	\$2,680	\$0				\$277,546	-7%		
-\$1,512	\$1,300	\$0				\$259,788	0%		
-\$2,892	\$1,300	\$0			\$7,800	\$266,208	-2%	-3%	

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	7 Kyle	N/A	6/15/2017	\$262,195	2017	1,140	\$230.00	2/2	Gar	3-Story	End
	Not	26 Jake	N/A	10/31/2017	\$268,000	2014	1,140	\$235.09	2/2	Gar	3-Story	End
	Not	4 Michael	N/A	11/8/2018	\$260,000	2015	1,140	\$228.07	2/2	Gar	3-Story	End
	Not	36 Kyle	N/A	1/10/2019	\$260,000	2015	1,140	\$228.07	2/2	Gar	3-Story	

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$262,195			150
-\$3,117	\$4,020	\$0				\$268,903	-3%		
-\$11,196	\$2,600	\$0	-\$5,000			\$246,404	6%		
-\$12,576	\$2,600	\$0			\$7,800	\$257,824	2%	2%	

Adjoining Residential Sales After Solar Farm Approved

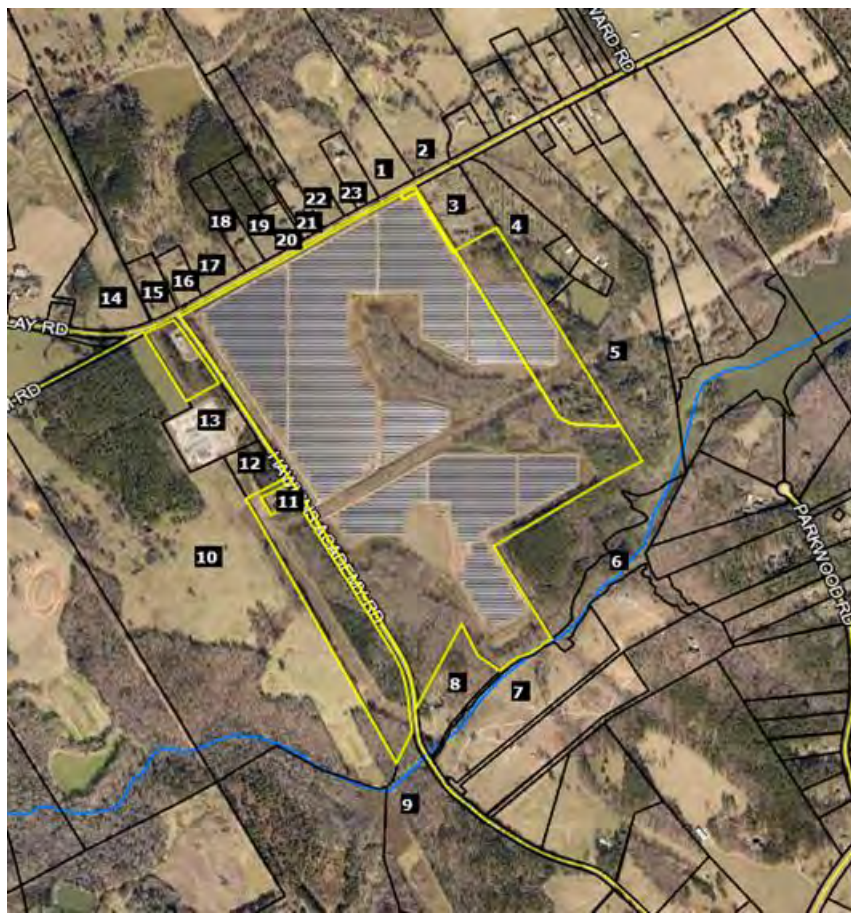
Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	1 Samantha	N/A	9/1/2017	\$258,205	2017	1,140	\$226.50	2/2	Gar	3-Story	End
	Not	26 Jake	N/A	10/31/2017	\$268,000	2014	1,140	\$235.09	2/2	Gar	3-Story	End
	Not	4 Michael	N/A	11/8/2018	\$260,000	2015	1,140	\$228.07	2/2	Gar	3-Story	End
	Not	36 Kyle	N/A	1/10/2019	\$260,000	2015	1,140	\$228.07	2/2	Gar	3-Story	

Adjoining Sales Adjusted

Time	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
						\$258,205			155
-\$1,355	\$4,020	\$0	-\$5,000			\$265,665	-3%		
-\$9,487	\$2,600	\$0				\$253,113	2%		
-\$10,867	\$2,600	\$0			\$7,800	\$259,533	-1%	0%	

The range of impact identified by these matched pairs ranges are therefore -3% to +2% for distances ranging from 150 feet to 185 feet with an average difference from these four indicators of 0%. As noted earlier this range is within the typical plus or minus for any real estate transaction and indicates no impact on property value.

29. Matched Pair – Simon Solar, Social Circle, GA



This solar farm is located off Hawkins Academy Road and Social Circle Fairplay Road. I identified three adjoining sales to this tract after development of the solar farm. However, one of those is shown as Parcel 12 in the map above and includes a powerline easement encumbering over a third of the 5 acres and adjoins a large substation as well. It would be difficult to isolate those impacts from any potential solar farm impact and therefore I have excluded that sale. I also excluded the recent sale of Parcel 17, which is a farm with conservation restrictions on it that similarly would require a detailed examination of those conservation restrictions in order to see if there was any impact related to the solar farm. I therefore focused on the recent sale of Parcel 7 and the adjoining parcel to the south of that. They are technically not adjoining due to the access road for the flag-shaped lot to the east. Furthermore, there is an apparent access easement serving the two rear lots that encumber these two parcels which is a further limitation on these sales. This analysis assumes that the access easement does not negatively impact the subject property, though it may.

Adjoining Land Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	\$/AC	Type	Other
7+	Adjoins	4514 Hawkins	36.86	3/31/2016	\$180,000	\$4,883	Pasture	Esmts
	Not	HD Atha	69.95	12/20/2016	\$357,500	\$5,111	Wooded	N/A
	Not	Pannell	66.94	11/8/2016	\$322,851	\$4,823	Mixed	*
	Not	1402 Roy	123.36	9/29/2016	\$479,302	\$3,885	Mixed	**

* Adjoining 1 acre purchased by same buyer in same deed. Allocation assigned on the County Tax Record.

** Dwelling built in 1996 with a 2016 tax assessed value of \$75,800 deducted from sales price to reflect land value

Adjoining Sales Adjusted						Avg
Time	Size	Type	Other	Total/Ac	% Diff	% Diff
				\$4,883		
\$89	\$256			\$5,455	-12%	
-\$90	\$241			\$4,974	-2%	
-\$60	\$389			\$4,214	14%	
						0%

The range of impact identified by these matched pairs ranges are therefore -12% to +14% for with an average of 0%. The best matched pair with the least adjustment supports a -2% impact due to the solar farm. I note again that this analysis considers no impact for the existing access easements that meander through this property and it may be having an impact. Still at -2% impact as the best indication for the solar farm, I consider that to be no impact given that market fluctuations support +/- 5%.

30. Matched Pair – Candace Solar, Princeton, NC



This solar farm is located at 4839 US 70 Highway just east of Herring Road. This solar farm was completed on October 25, 2016.

I identified three adjoining sales to this tract after development of the solar farm with frontage on US 70. I did not attempt to analyze those sales as they have exposure to an adjacent highway and railroad track. Those homes are therefore problematic for a matched pair analysis unless I have similar homes fronting on a similar corridor.

I did consider a land sale and a home sale on adjoining parcels without those complications.

The lot at 499 Herring Road sold to Paradise Homes of Johnston County of NC, Inc. for \$30,000 in May 2017 and a modular home was placed there and sold to Karen and Jason Toole on September 29, 2017. I considered the lot sale first as shown below and then the home sale that followed.

Adjoining Land Sales After Solar Farm Approved						Adjoining Sales Adjusted					
Parcel	Solar	Address	Acres	Date Sold	Sales Price	Other	Time	Site	Other	Total	% Diff
16	Adjoins	499 Herring	2.03	5/1/2017	\$30,000					\$30,000	
	Not	37 Becky	0.87	7/23/2019	\$24,500	Sub/Pwr	-\$1,679	\$4,900		\$27,721	8%
	Not	5858 Bizzell	0.88	8/17/2016	\$18,000		\$390	\$3,600		\$21,990	27%
	Not	488 Herring	2.13	12/20/2016	\$35,000		\$389			\$35,389	-18%
Average											5%

Following the land purchase, the modular home was placed on the site and sold. I have compared this modular home to the following sales to determine if the solar farm had any impact on the purchase price.

Adjoining Residential Sales After Solar Farm Approved												
Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
16	Adjoins	499 Herring	2.03	9/27/2017	\$215,000	2017	2,356	\$91.26	4/3	Drive	Modular	
	Not	678 WC	6.32	3/8/2019	\$226,000	1995	1,848	\$122.29	3/2.5	Det Gar	Mobile	Ag bldgs
	Not	1810 Bay V	8.70	3/26/2018	\$170,000	2003	2,356	\$72.16	3/2	Drive	Mobile	Ag bldgs
	Not	1795 Bay V	1.78	12/1/2017	\$194,000	2017	1,982	\$97.88	4/3	Drive	Modular	

Adjoining Residential Sales Af Adjoining Sales Adjusted												
Parcel	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
16	Adjoins	499 Herring								\$215,000		
	Not	678 WC	-\$10,037	-\$25,000	\$24,860	\$37,275	-\$5,000	-\$7,500	-\$20,000	\$220,599	-3%	
	Not	1810 Bay V	-\$2,579	-\$20,000	\$11,900	\$0				\$159,321	26%	
	Not	1795 Bay V	-\$1,063		\$0	\$21,964				\$214,902	0%	
Avg												8%

The best comparable is 1795 Bay Valley as it required the least adjustment and was therefore most similar, which shows a 0% impact. This signifies no impact related to the solar farm.

The range of impact identified by these matched pairs ranges are therefore -3% to +26% with an average of +8% for the home and an average of +4% for the lot, though the best indicator for the lot shows a \$5,000 difference in the lot value due to the proximity to the solar farm or a -12% impact.

31. Matched Pair – Crittenden Solar, Crittenden, KY



This solar farm was built in December 2017 on a 181.70-acre tract but utilizing only 34.10 acres. This is a 2.7 MW facility with residential subdivisions to the north and south.

I have identified five home sales to the north of this solar farm on Claiborne Drive and one home sale to the south on Eagle Ridge Drive since the completion of this solar farm. The home sale on Eagle Drive is for a \$75,000 home and all of the homes along that street are similar in size and price range. According to local broker Steve Glacken with Cutler Real Estate these are the lowest price range/style home in the market. I have not analyzed that sale as it would unlikely provide significant data to other homes in the area.

Mr. Glacken is currently selling lots at the west end of Claiborne for new home construction. He indicated that the solar farm near the entrance of the development has been a complete non-factor and none of the home sales are showing any concern over the solar farm. Most of the homes are in the \$250,000 to \$280,000 price range on lots being marketed for \$28,000 to \$29,000.

The first home considered is a bit of an anomaly for this subdivision in that it is the only manufactured home that was allowed in the community. It sold on January 3, 2019. I compared that sale to three other manufactured home sales in the area making minor adjustments as shown on the next page to account for the differences. After all other factors are considered the adjustments show a -1% to +13% impact due to the adjacency of the solar farm. The best indicator is 1250 Cason, which shows a 3% impact. A 3% impact is within the normal static of real estate transactions and therefore not considered indicative of a positive impact on the property, but it strongly supports an indication of no negative impact.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	250 Claiborne	0.96	1/3/2019	\$120,000	2000	2,016	\$59.52	3/2	Drive	Manuf	
	Not	1250 Cason	1.40	4/18/2018	\$95,000	1994	1,500	\$63.33	3/2	2-Det	Manuf	Carport
	Not	410 Reeves	1.02	11/27/2018	\$80,000	2000	1,456	\$54.95	3/2	Drive	Manuf	
	Not	315 N Fork	1.09	5/4/2019	\$107,000	1992	1,792	\$59.71	3/2	Drive	Manuf	

Adjustments											Avg	
Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
Adjoins	250 Claiborne								\$120,000			373
Not	1250 Cason	\$2,081		\$2,850	\$26,144		-\$5,000	-\$5,000	\$116,075	3%		
Not	410 Reeves	\$249		\$0	\$24,615				\$104,865	13%		
Not	315 N Fork	-\$1,091		\$4,280	\$10,700				\$120,889	-1%		
											5%	

I also looked at three other home sales on this street as shown below. These are stick-built homes and show a higher price range.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	300 Claiborne	1.08	9/20/2018	\$212,720	2003	1,568	\$135.66	3/3	2-Car	Ranch	Brick
	Not	460 Claiborne	0.31	1/3/2019	\$229,000	2007	1,446	\$158.37	3/2	2-Car	Ranch	Brick
	Not	2160 Sherman	1.46	6/1/2019	\$265,000	2005	1,735	\$152.74	3/3	2-Car	Ranch	Brick
	Not	215 Lexington	1.00	7/27/2018	\$231,200	2000	1,590	\$145.41	5/4	2-Car	Ranch	Brick

Adjustments											Avg	
Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
Adjoins	300 Claiborne								\$213,000			488
Not	460 Claiborne	-\$2,026		-\$4,580	\$15,457	\$5,000			\$242,850	-14%		
Not	2160 Sherman	-\$5,672		-\$2,650	-\$20,406				\$236,272	-11%		
Not	215 Lexington	\$1,072		\$3,468	-\$2,559	-\$5,000			\$228,180	-7%		
											-11%	

This set of matched pairs shows a minor negative impact for this property. I was unable to confirm the sales price or conditions of this sale. The best indication of value is based on 215 Lexington, which required the least adjusting and supports a -7% impact.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	350 Claiborne	1.00	7/20/2018	\$245,000	2002	1,688	\$145.14	3/3	2-Car	Ranch	Brick
	Not	460 Claiborne	0.31	1/3/2019	\$229,000	2007	1,446	\$158.37	3/2	2-Car	Ranch	Brick
	Not	2160 Sherman	1.46	6/1/2019	\$265,000	2005	1,735	\$152.74	3/3	2-Car	R/FBsmt	Brick
	Not	215 Lexington	1.00	7/27/2018	\$231,200	2000	1,590	\$145.41	5/4	2-Car	Ranch	Brick

Adjustments											Avg	
Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
Adjoins	350 Claiborne								\$245,000			720
Not	460 Claiborne	-\$3,223		-\$5,725	\$30,660	\$5,000			\$255,712	-4%		
Not	2160 Sherman	-\$7,057		-\$3,975	-\$5,743				\$248,225	-1%		
Not	215 Lexington	-\$136		\$2,312	\$11,400	-\$5,000			\$239,776	2%		
											-1%	

This set of matched pairs shows a no negative impact for this property. The range of adjusted impacts is -4% to +2%. The best indication is -1%, which as described above is within the typical market static and supports no impact on adjoining property value.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	370 Claiborne	1.06	8/22/2019	\$273,000	2005	1,570	\$173.89	4/3	2-Car	2-Story	Brick
	Not	2160 Sherman	1.46	6/1/2019	\$265,000	2005	1,735	\$152.74	3/3	2-Car	R/FBsmt	Brick
	Not	2290 Dry	1.53	5/2/2019	\$239,400	1988	1,400	\$171.00	3/2.5	2-Car	R/FBsmt	Brick
	Not	125 Lexington	1.20	4/17/2018	\$240,000	2001	1,569	\$152.96	3/3	2-Car	Split	Brick

Adjustments											Avg	
Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
Adjoins	370 Claiborne								\$273,000			930
Not	2160 Sherman	\$1,831		\$0	-\$20,161				\$246,670	10%		
Not	2290 Dry	\$2,260		\$20,349	\$23,256	\$2,500			\$287,765	-5%		
Not	125 Lexington	\$9,951		\$4,800					\$254,751	7%		
											4%	

This set of matched pairs shows a general positive impact for this property. The range of adjusted impacts is -5% to +10%. The best indication is +7%. I typically consider measurements of +/-5% to be within the typical variation in real estate transactions. This indication is higher than that and suggests a positive relationship.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
Adjoins	330 Claiborne	1.00	12/10/2019	\$282,500	2003	1,768	\$159.79	3/3	2-Car	Ranch	Brick/pool
Not	895 Osborne	1.70	9/16/2019	\$249,900	2002	1,705	\$146.57	3/2	2-Car	Ranch	Brick/pool
Not	2160 Sherman	1.46	6/1/2019	\$265,000	2005	1,735	\$152.74	3/3	2-Car	R/FBsmt	Brick
Not	215 Lexington	1.00	7/27/2018	\$231,200	2000	1,590	\$145.41	5/4	2-Car	Ranch	Brick

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
Adjoins	330 Claiborne								\$282,500			665
Not	895 Osborne	\$1,790		\$1,250	\$7,387	\$5,000		\$0	\$265,327	6%		
Not	2160 Sherman	\$4,288		-\$2,650	\$4,032			\$20,000	\$290,670	-3%		
Not	215 Lexington	\$9,761		\$3,468	\$20,706	-\$5,000		\$20,000	\$280,135	1%		

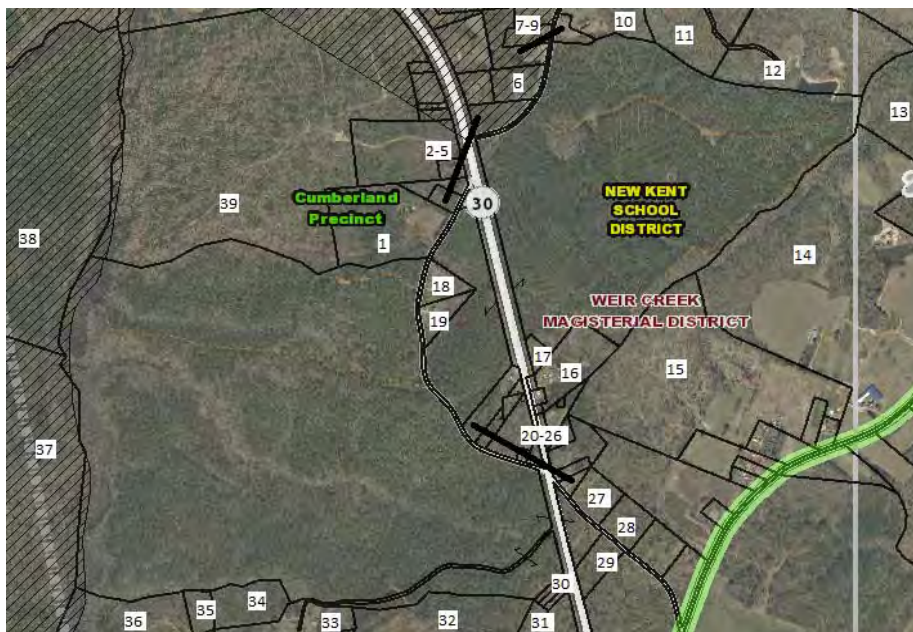
1%

This set of matched pairs shows a general positive impact for this property. The range of adjusted impacts is -3% to +6%. The best indication is +6%. I typically consider measurements of +/-5% to be within the typical variation in real estate transactions. This indication is higher than that and suggests a positive relationship.

The five matched pairs considered in this analysis includes two that show no impact on value, one that shows a negative impact on value, and two that show a positive impact. The negative indication supported by one matched pair is -7% and the positive impacts are +6% and +7%. The two neutral indications show impacts of -1% and +3%. The average indicated impact is +0% when all five of these indicators are blended.

Furthermore, the comments of the local broker strongly support the data that shows no negative impact on value due to the proximity to the solar farm. This is further supported by the national data that is shown on the following pages.

32. Matched Pair – Walker-Correctional Solar, Barham Road, Barhamsville, VA



This project was built in 2017 and located on 484.65 acres for a 20 MW with the closest home at 110 feet from the closest solar panel with an average distance of 500 feet.

I considered the recent sale identified on the map above as Parcel 19, which is directly across the street and based on the map shown on the following page is 250 feet from the closest panel. A limited buffering remains along the road with natural growth being encouraged, but currently the panels are visible from the road. Alex Uminski, SRA with MGMiller Valuations in Richmond VA confirmed this sale with the buying and selling broker. The selling broker indicated that the solar farm was not a negative influence on this sale and in fact the buyer noticed the solar farm and then discovered the listing. The privacy being afforded by the solar farm was considered a benefit by the buyer. I used a matched pair analysis with a similar sale nearby as shown below and found no negative impact on the sales price. Property actually closed for more than the asking price.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
Adjoins	5241 Barham	2.65	10/18/2018	\$264,000	2007	1,660	\$159.04	3/2	Drive	Ranch	Modular
Not	17950 New Kent	5.00	9/5/2018	\$290,000	1987	1,756	\$165.15	3/2.5	3 Gar	Ranch	
Not	9252 Ordinary	4.00	6/13/2019	\$277,000	2001	1,610	\$172.05	3/2	1.5-Gar	Ranch	
Not	2416 W Miller	1.04	9/24/2018	\$299,000	1999	1,864	\$160.41	3/2.5	Gar	Ranch	

Adjoining Sales Adjusted

Solar	Address	Time	Ac/Loc	YB	GLA	BR/BA	Park	Other	Total	% Diff	Dist
Adjoins	5241 Barham								\$264,000		250
Not	17950 New Kent		-\$8,000	\$29,000	-\$4,756	-\$5,000	-\$20,000	-\$15,000	\$266,244	-1%	
Not	9252 Ordinary	-\$8,310	-\$8,000	\$8,310	\$2,581		-\$10,000	-\$15,000	\$246,581	7%	
Not	2416 W Miller		\$8,000	\$11,960	-\$9,817	-\$5,000	-\$10,000	-\$15,000	\$279,143	-6%	

Average Diff 0%



I also spoke with Patrick W. McCrerey of Virginia Estates who was marketing a property that sold at 5300 Barham Road adjoining the Walker-Correctional Solar Farm. He indicated that this property was unique with a home built in 1882 and heavily renovated and updated on 16.02 acres. The solar farm was through the woods and couldn't be seen by this property and it had no impact on marketing this property. This home sold on April 26, 2017 for \$358,000. I did not set up any matched pairs for this property as it was such a unique property that any such comparison would be difficult to rely on. The broker's comments do support the assertion that the adjoining solar farm had no impact on value. The home in this case was 510 feet from the closest panel.

33. Matched Pair – Innovative Solar 46, Roslin Farm Rd, Hope Mills, NC



This project was built in 2016 and located on 532 acres for a 78.5 MW solar farm with the closest home at 125 feet from the closest solar panel with an average distance of 423 feet.

I considered the recent sale of a home on Roslin Farm Road just north of Running Fox Road as shown below. This sale supports an indication of no impact on property value.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
Adjoins	6849 Roslin Farm	1.00	2/18/2019	\$155,000	1967	1,610	\$96.27	3/3	Drive	Ranch	Brick	435
Not	6592 Sim Canady	2.43	9/5/2017	\$185,000	1974	2,195	\$84.28	3/2	Gar	Ranch	Brick	
Not	1614 Joe Hall	1.63	9/3/2019	\$145,000	1974	1,674	\$86.62	3/2	Det Gar	Ranch	Brick	
Not	109 Bledsoe	0.68	1/17/2019	\$150,000	1973	1,663	\$90.20	3/2	Gar	Ranch	Brick	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	6849 Roslin Farm								\$155,000		5%
Not	6592 Sim Canady	\$8,278		-\$6,475	-\$39,444	\$10,000	-\$5,000		\$152,359	2%	
Not	1614 Joe Hall	-\$2,407		-\$5,075	-\$3,881	\$10,000	-\$2,500		\$141,137	9%	
Not	109 Bledsoe	\$404	\$10,000	-\$4,500	-\$3,346		-\$5,000		\$147,558	5%	

34. Matched Pair – Innovative Solar 42, County Line Rd, Fayetteville, NC



This project was built in 2017 and located on 413.99 acres for a 71 MW with the closest home at 135 feet from the closest solar panel with an average distance of 375 feet.

I considered the recent sales identified on the map above as Parcels 2 and 3, which is directly across the street these homes are 330 and 340 feet away. Parcel 2 includes an older home built in 1976, while Parcel 3 is a new home built in 2019. So the presence of the solar farm had no impact on new construction in the area.

The matched pairs for each of these are shown below followed by a more recent map showing the panels at this site.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
Adjoins	2923 County Ln	8.98	2/28/2019	\$385,000	1976	2,905	\$132.53	3/3	2-Car	Ranch	Brick/Pond	340
Not	1928 Shaw Mill	17.00	7/3/2019	\$290,000	1977	3,001	\$96.63	4/4	2-Car	Ranch	Brick/Pond/Rental	
Not	2109 John McM.	7.78	4/25/2018	\$320,000	1978	2,474	\$129.35	3/2	Det Gar	Ranch	Vinyl/Pool,Stable	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	2923 County Ln								\$385,000		3%
Not	1928 Shaw Mill	-\$3,055	\$100,000	-\$1,450	-\$7,422	-\$10,000			\$368,074	4%	
Not	2109 John McM.	\$8,333		-\$3,200	\$39,023	\$10,000		\$5,000	\$379,156	2%	

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
Adjoins	2935 County Ln	1.19	6/18/2019	\$266,000	2019	2,401	\$110.79	4/3	Gar	2-Story		330
Not	3005 Hemingway	1.17	5/16/2019	\$269,000	2018	2,601	\$103.42	4/3	Gar	2-Story		
Not	7031 Glynn Mill	0.60	5/8/2018	\$255,000	2017	2,423	\$105.24	4/3	Gar	2-Story		
Not	5213 Bree Brdg	0.92	5/7/2019	\$260,000	2018	2,400	\$108.33	4/3	3-Gar	2-Story		

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	2935 County Ln								\$266,000		3%
Not	3005 Hemingway	\$748		\$1,345	-\$16,547				\$254,546	4%	
Not	7031 Glynn Mill	\$8,724		\$2,550	-\$1,852				\$264,422	1%	
Not	5213 Bree Brdg	\$920		\$1,300	\$76			-\$10,000	\$252,296	5%	

Both of these matched pairs adjust to an average of +3% on impact for the adjoining solar farm, meaning there is a slight positive impact due to proximity to the solar farm. This is within the standard +/- of typical real estate transactions, which strongly suggests no impact on property value. I noted specifically that for 2923 County Line Road, the best comparable is 2109 John McMillan as it does not have the additional rental unit on it. I made no adjustment to the other sale for the value of that rental unit, which would have pushed the impact on that comparable downward – meaning there would have been a more significant positive impact.



35. Matched Pair – Demille Solar, Demille Road, Lapeer, MI



This solar farm is located on 160 acres of a parent tract assemblage of 311.40 acres with a 28.4 MW output. This was built in 2017.

I have identified several home sales adjoining this solar farm at the southeast corner where the red line shows adjoining Parcels 5 through 17 on the map above.

The first is Parcel 8 in the map above, 1120 Don Wayne Drive, that sold in August 2019. I have compared this to multiple home sales as shown below. I consider 1231 Turrill to be the best comparable of this set as it required the least adjustment and was the most similar in size, age, and date of sale.

Adjoining Residential Sales After Solar Farm Built

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Dist.
Adjoins	1120 Don Wayne	0.47	8/28/2019	\$194,000	1976	1,700	\$114.12	3/3.5	2-Car	Ranch	Brick/FinBsmt	310
Not	1127 Don Wayne	0.51	9/23/2019	\$176,900	1974	1,452	\$121.83	3/2	2-Car	Ranch	Brick/Ufin Bsmt	
Not	1231 Turrill	1.21	4/25/2019	\$182,000	1971	1,560	\$116.67	3/2	2-Car	Ranch	Brick/Wrkshp	
Not	1000 Baldwin	3.11	8/1/2017	\$205,000	1993	1,821	\$112.58	3/2.5	2-Car	Ranch	Vinyl	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	1120 Don Wayne								\$194,000		-1%
Not	1127 Don Wayne	-\$258		\$1,769	\$24,171	\$10,000			\$212,582	-10%	
Not	1231 Turrill	\$1,278	-\$10,000	\$4,550	\$13,067	\$10,000			\$200,895	-4%	
Not	1000 Baldwin	\$8,718	-\$20,000	-\$17,425	-\$10,897	\$10,000			\$175,396	10%	

Next I considered Parcel 9, 1126 Don Wayne Drive, which I have compared to two similar home sales nearby that are not adjoining a solar farm as shown below. This home sold in May 2018 after the solar farm was built.

Adjoining Residential Sales After Solar Farm Built

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Dist.
Adjoins	1126 Don Wayne	0.47	5/16/2018	\$160,000	1971	1,900	\$84.21	3/2.5	2-Car	Ranch	Brick,FinBsmt	310
Not	70 Sterling Dr	0.32	8/2/2018	\$137,500	1960	1,800	\$76.39	3/1.5	1-Car	Ranch	Brick	
Not	3565 Garden Dr	0.34	5/15/2019	\$165,000	1960	2,102	\$78.50	3/1.5	2-Car	Ranch	Brick	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	1126 Don Wayne								\$160,000		-3%
Not	70 Sterling Dr	-\$603		\$7,563	\$6,111	\$10,000	\$5,000		\$165,571	-3%	
Not	3565 Garden Dr	-\$3,374		\$9,075	-\$12,685	\$5,000			\$163,016	-2%	

Next I looked at Parcel 11, 1138 Don Wayne Drive, that sold in August 2019. I have compared this to three similar sales as shown below. I attributed no value to the pool at 1138 Don Wayne Drive.

Adjoining Residential Sales After Solar Farm Built

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Dist.
Adjoins	1138 Don Wayne	0.47	8/28/2019	\$191,000	1975	2,128	\$89.76	4/1.5	2-Car	2-Story	Brick	380
Not	1331 W Genessee	0.45	10/25/2019	\$160,707	1940	1,955	\$82.20	4/1.5	Drive	1.5 Story	Vinyl/UnBsmt	
Not	1128 Gwen Dr	0.47	8/24/2018	\$187,500	1973	2,040	\$91.91	3/2.5	2-Car	2 Story	Brick/UnBsmt	
Not	1227 Oakridge	1.05	6/11/2017	\$235,000	1980	2,500	\$94.00	4/2.5	2-Car	2 Story	Brk/PFinBsmt	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	1138 Don Wayne								\$191,000		-1%
Not	1331 W Genessee	-\$524		\$16,874	\$11,377		\$10,000		\$198,434	-4%	
Not	1128 Gwen Dr	\$3,887		\$1,875	\$6,471	-\$10,000			\$189,733	1%	
Not	1227 Oakridge	\$10,667	-\$10,000	-\$5,875	-\$27,974	-\$10,000			\$191,818	0%	

Parcel 13, 1168 Alice Drive, sold in October 2019. I spoke with Tanya Biernat the buyer's agent who handled that sale and she indicated that the property was placed on the market below market for a fast sale by the sellers. The buyers expressed no concern regarding the adjacent solar farm and it had no impact on marketing or selling the property, though it did sell for a low price. I also spoke with Chantel Fink's office, the selling agent. They confirmed that the solar farm was not an issue in the sales price or marketing of the property. Given that this sale was noted as below market for a fast sale, I have not attempted to set it up as a matched pair.

Parcel 14, 1174 Alice Drive, sold in January 2019. I have compared that sale to three similar properties as shown below. I included 1135 Gwen Drive as a nearby comparable, but it is not a good comparable. According to the broker, Paul Coulter, that home had many recent and significant upgrades that made it superior to similar housing in the neighborhood. It is notably the highest sales price in the neighborhood. I have shown that one but I made no adjustment for those upgrades, but I won't rely on that sale for the matched pairs. I consider the 1127 Don Wayne Drive comparable to be a more reasonable comparison. I spoke with Chris Ferguson the broker for that sale who confirmed that it was arm's length and that while across Don Wayne Drive from the homes that adjoin the solar farm, this home had no view of the solar farm and was not an issue in marketing this home.

Adjoining Residential Sales After Solar Farm Built

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Dist.
Adjoins	1174 Alice Dr	0.54	1/14/2019	\$165,000	1973	1,400	\$117.86	3/1.5	2-Car	Ranch	Brick/Fin Bsmt	280
Not	1127 Don Wayne	0.51	9/23/2019	\$176,900	1974	1,452	\$121.83	3/2	2-Car	Ranch	Brick/Ufin Bsmt	
Not	1135 Gwen Dr	0.43	7/26/2019	\$205,000	1967	1,671	\$122.68	3/2	2-Car	Ranch	Brick/Ufin Bsmt	
Not	1160 Beth Dr	0.46	6/20/2019	\$147,500	1970	1,482	\$99.53	4/1.5	2-Car	Ranch	Brick/Fin Bsmt	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	1174 Alice Dr								\$165,000		2%
Not	1127 Don Wayne	-\$2,504		-\$885	-\$5,068	-\$5,000			\$163,443	1%	
Not	1135 Gwen Dr	-\$2,223		\$6,150	-\$26,597	-\$5,000			\$177,330	-7%	
Not	1160 Beth Dr	-\$1,301		\$2,213	-\$6,529				\$141,883	14%	

The four matched pairs identified show a range of -3% to +2% based on the average difference for each set of matched pairs. This is a very similar range I have found in most sales adjoining solar farms and strongly supports the assertion that the solar farm is not having a negative impact on adjoining property values.

Furthermore, two brokers active in the sale of a home adjoining the solar farm both confirmed that Parcel 13 was not impacted by the presence of the solar farm on the adjacent tract.

36. Matched Pair – Turrill Solar, Turrill Road, Lapeer, MI



This solar farm is located on approximately 230 acres with a 19.6 MW output. This was built in 2017.

I have identified several home sales adjoining this solar farm on the west side of this solar farm on Cliff Drive.

The first is 1060 Cliff Drive that sold in September 2018. I compared this to multiple nearby home sales as shown below.

Adjoining Residential Sales After Solar Farm Built

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
Adjoins	1060 Cliff Dr	1.03	9/14/2018	\$200,500	1970	2,114	\$94.84	4/2.5	2-Car	2 Story	Brick	290
Not	1331 W Genessee	0.45	10/25/2019	\$160,707	1940	1,955	\$82.20	4/1.5	Drive	1.5 Story	Vinyl/Unfin Bsmt	
Not	1128 Gwen Dr	0.47	8/24/2018	\$187,500	1973	2,040	\$91.91	3/2.5	2-Car	2 Story	Brick/Unfin Bsmt	
Not	1227 Oakridge	1.05	6/11/2017	\$235,000	1980	2,500	\$94.00	4/2.5	2-Car	2 Story	Brk/Prt Fin Bsmt	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	1060 Cliff Dr								\$200,500		-2%
Not	1331 W Genessee	-\$3,666	\$10,000	\$14,464	\$10,456	\$10,000	\$10,000		\$211,961	-6%	
Not	1128 Gwen Dr	\$221	\$10,000	-\$2,813	\$5,441				\$200,350	0%	
Not	1227 Oakridge	\$6,073		-\$11,750	-\$29,027				\$200,296	0%	

Next I considered 1040 Cliff Drive as shown below. Comparing to the 1127 Don Wayne Drive, I show no impact. I included 1135 Gwen Drive as a nearby comparable, but it is not a good comparable. According to the broker, Paul Coulter, that home had many recent and significant upgrades that made it superior to similar housing in the neighborhood. It is notably the highest sales price in the neighborhood. I have shown that one but I made no adjustment for those upgrades, but I won't rely on that sale for the matched pairs. This leaves 1127 Don Wayne Drive which shows no impact and 1160 Beth Drive, which had the fewest adjustments shows a 12% premium or enhancement for adjoining the solar farm. I consider the Don Wayne Drive match up to be the better of these two comparables even with a higher number of adjustments.

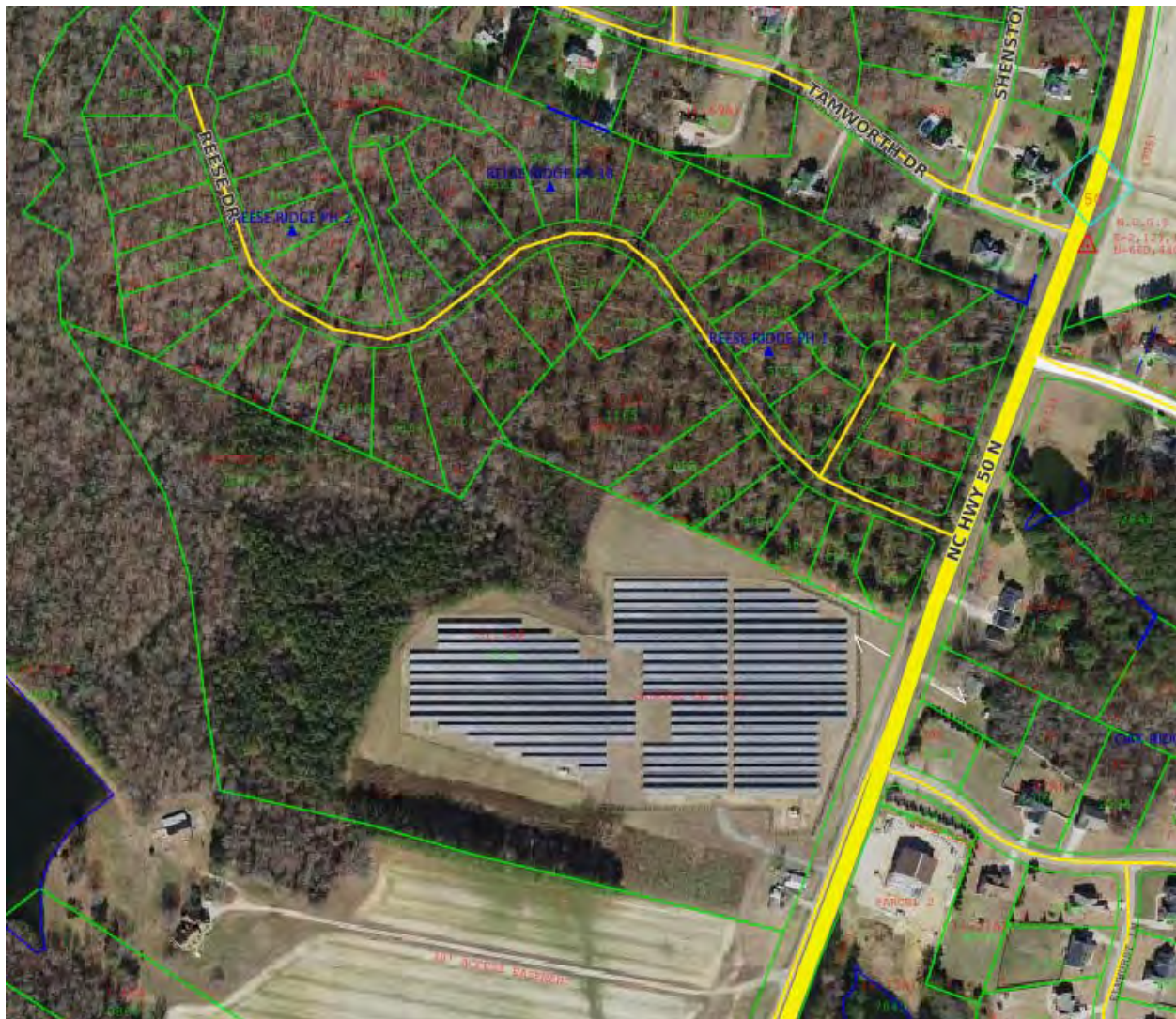
Adjoining Residential Sales After Solar Farm Built

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other	Distance
Adjoins	1040 Cliff Dr	1.03	6/29/2017	\$145,600	1960	1,348	\$108.01	3/1.5	3-Car	Ranch	Brick/Wrkshp	255
Not	1127 Don Wayne	0.51	9/23/2019	\$176,900	1974	1,452	\$121.83	3/2	2-Car	Ranch	Brick/Ufin Bsmt	
Not	1135 Gwen Dr	0.43	7/26/2019	\$205,000	1967	1,671	\$122.68	3/2	2-Car	Ranch	Brick/Ufin Bsmt	
Not	1160 Beth Dr	0.46	6/20/2019	\$147,500	1970	1,482	\$99.53	4/1.5	2-Car	Ranch	Brick/Fin Bsmt	

Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
Adjoins	1040 Cliff Dr								\$145,600		1%
Not	1127 Don Wayne	-\$8,110		-\$12,383	-\$10,136	-\$5,000	\$5,000		\$146,271	0%	
Not	1135 Gwen Dr	-\$8,718		-\$7,175	-\$31,701	-\$5,000	\$5,000		\$157,406	-8%	
Not	1160 Beth Dr	-\$5,975		-\$7,375	-\$10,669		\$5,000		\$128,481	12%	

The two matched pairs identified show a range of -2% to +1% based on the average difference for each set of matched pairs. This is a very similar range I have found in most sales adjoining solar farms and strongly supports the assertion that the solar farm is not having a negative impact on adjoining property values.

38. Matched Pair – HCE Johnston I, LLC, Benson, NC



This 2.6 MW project was built in 2015 and located on 30.55 acres.

There is a new subdivision that was developed in 2019 just north of this solar farm called Reese's Ridge. This location is near the McGees Crossroads near Mount Pleasant Road. As can be seen in the map below, the adjoining land to the north of this solar farm was purchased in 2017 and subdivided as Reese Ridge with 0.49 to 0.53 acre lots. Most of the trees on this site were cleared as part of the development with a single row of pine trees retained as a buffer along the solar farm. The first six lots on the south side of Reese Drive are around 115 feet from the center point in the lot to the nearest solar farm panel. This tract of land was purchased on September 7, 2017 for \$925,000 for 42.388 acres, or \$21,822 per acre.

The proposed homes will be custom homes starting at \$330,000. County water is available and the homes will use individual septic tanks. I spoke with Amanda with The Rodney Carroll Team who is marketing the homes and she indicated that 7 custom home builders had a lottery to purchase all of the lots.

Three different builders have purchased lots adjoining the solar farm for \$60,000 each. Similar lots across Reese Drive and further from the solar farm are selling at the same \$60,000 each. At

\$60,000 this indicates a lot-to-home ratio of 18%, which is typical for new home construction in the county where there is no amenity package.



Since then a home was built and then sold at 63 Reese Drive, which is two lots off of NC 50 and backs up to the solar farm. Similarly, 107 Reese Drive which is six lots off of NC 50 and backs up to the solar farm. I have considered both of these for matched pairs as shown below.

Adjoining Residential Sales After Solar Farm Built

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	107 Reese Drive	0.69	11/27/2019	\$393,000	2019	2,960	\$132.77	3/3	2-Car	1.5 Vinyl	
	Not	200 Reese Drive	0.44	2/19/2020	\$400,000	2019	3,209	\$124.65	3/2.5	2-Car	1.5 Batten/Stone	
	Not	35 Pawnee Pl	0.65	5/30/2018	\$325,000	2017	2,609	\$124.57	4/3	2-Car	1.5 Vinyl/Stone	
	Not	278 Timber Wolf	0.88	1/24/2020	\$367,443	2019	2,983	\$123.18	3/3	2-Car	1.5 Vinyl/Stone	
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
	Adjoins	107 Reese Drive								\$393,000		5%
	Not	200 Reese Drive	-\$2,831		\$0	-\$24,830	\$5,000			\$377,338	4%	
	Not	35 Pawnee Pl	\$14,954		\$3,250	\$34,979				\$378,183	4%	
	Not	278 Timber Wolf	-\$1,796		\$0	-\$2,266				\$363,381	8%	

Adjoining Residential Sales After Solar Farm Built

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
	Adjoins	63 Reese Drive	0.45	3/24/2020	\$410,000	2019	3,240	\$126.54	4/3	2-Car	Ranch/Wd	
	Not	200 Reese Drive	0.44	2/19/2020	\$400,000	2019	3,209	\$124.65	3/2.5	2-Car	1.5 Batten/Stone	
	Not	320 Wolf Den	0.97	9/27/2019	\$377,780	2019	3,122	\$121.01	4/3	2-Car	1.5 Vinyl/Stone	
	Not	37 Makers Way	0.59	5/29/2019	\$373,508	2019	3,122	\$119.64	4/3	3-Car	1.5 Vinyl/Stone	
	Solar	Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff
	Adjoins	63 Reese Drive								\$410,000		3%
	Not	200 Reese Drive	\$1,146		\$0	\$2,705	\$5,000			\$408,851	0%	
	Not	320 Wolf Den	\$5,699		\$0	\$9,995				\$393,474	4%	
	Not	37 Makers Way	\$9,443		\$0	\$9,882		-\$5,000		\$387,833	5%	

After adjustments, the two sales support a conclusion of no impact on property value due to the solar farm. I spoke with Rodney Carroll the broker marketing the homes and he indicated that the solar farm had zero impact on the sales price and they were marketing it as the best neighbor you could have.

39. Picture Rocks, Tucson, Pima County, AZ



This solar farm was built in 2012 on a 302.80-acre tract but utilizing only 182 acres. This is a 20 MW facility with residential subdivision to the south and larger lot homes to the north, south and west.

I have identified two adjoining homes in the Tierra Linda subdivision that have sold recently in close proximity to the solar farm. They are written up as matched pairs below.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GLA	BR/BA	Park	Style	Other
14	Adjoins	12980 W Moss V	0.97	6/4/2020	\$393,900	2020	2,241	\$175.77	4/3	3-Gar	Adobe	Crtyrd
	Not	13071 W Smr Ppy	0.85	2/26/2020	\$389,409	2019	2,231	\$174.54	4/3	3-Gar	Adobe	Crtyrd
	Not	13352 W Tgr Aloe	1.07	3/31/2020	\$389,300	2015	2,555	\$152.37	4/3	3-Gar	Adobe	Crtyrd
	Not		0.97	8/2/2020	\$410,000	2018	2,688	\$152.53	4/2	3-Gar	Adobe	Crtyrd

Adjoining Sales Adjusted

Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
							\$393,900			1100
\$3,249		\$1,947	\$1,396				\$396,001	-1%		
\$2,132		\$9,733	-\$38,275				\$362,890	8%		
-\$2,038		\$4,100	-\$54,545	\$10,000			\$367,517	7%		
									5%	

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GLA	BR/BA	Park	Style	Other
15	Adjoins	12986 W Moss V	1.00	6/27/2019	\$350,000	2006	2,660	\$131.58	4/3.5	3-Gar	Adobe	Crtyrd
	Not	12994 W Btr Bsh	0.92	5/24/2018	\$302,000	2007	2,410	\$125.31	4/3	3-Gar	Adobe	Crtyrd
	Not	12884W Zbra Aloe	0.83	1/29/2020	\$336,500	2007	2,452	\$137.23	4/3	3-Gar	Adobe	Crtyrd
	Not	12829W Smr Ppy	0.88	6/2/2020	\$317,500	2006	2,452	\$129.49	4/3	3-Gar	Adobe	Crtyrd

Adjoining Sales Adjusted									Avg	
Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
							\$350,000			970
\$10,154		-\$1,510	\$25,062	\$5,000			\$340,707	3%		
-\$6,125		-\$1,683	\$22,836	\$5,000			\$356,528	-2%		
-\$9,124		\$0	\$21,546	\$5,000			\$334,923	4%		
									2%	

I have also looked at a recent sale of a manufactured home in close proximity to this solar farm for an additional matched pairs. This home included a 2,200 s.f. detached metal building used as a garage/workshop that I adjusted based on Marshall Swift Cost Estimating Service values for a depreciated metal building.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GLA	BR/BA	Park	Style	Other
9	Adjoins	12705 W Emigh	2.26	1/27/2019	\$255,000	1994	2,640	\$96.59	3/2	Det 4Car	Ranch	Horse
	Not	12715 W Emigh	2.50	5/30/2019	\$210,000	2005	2,485	\$84.51	4/2	Crprt	Ranch	Horse
	Not	12020 W Camper	1.81	9/15/2019	\$200,000	2006	2,304	\$86.81	4/2	Open	Ranch	Horse
	Not	12445 W Emigh	5.00	10/2/2018	\$210,000	1999	2,400	\$87.50	4/2	Open	Ranch	Horse

Adjoining Sales Adjusted									Avg	
Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
							\$255,000			990
-\$2,177		-\$11,550	\$10,479		\$46,000	\$0	\$252,752	1%		
-\$3,893		-\$12,000	\$23,333		\$50,000	\$0	\$257,440	-1%		
\$2,071	-\$25,000	-\$5,250	\$16,800		\$50,000	\$0	\$248,621	3%		
									1%	

These matched pairs range from 970 to 1,100 feet from the closest solar panel and shows no negative impact due to proximity to the solar farm. The average measured impacts range from +1% to +5%, which is within a typical variation for real estate and supports a conclusion of no impact.

Adjoining Residential Sales After Solar Farm Approved

Parcel	Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GLA	BR/BA	Park	Style
	Adjoins	14441 W Stallion	4.40	12/21/2017	\$150,000	2002	2,280	\$65.79	3/3.5	Open	Manuf
	Not	9620 N Rng Bck	4.14	3/24/2019	\$139,000	2003	2,026	\$68.61	4/3	Open	Manuf
	Not	5537 N Whitetail	1.38	9/26/2018	\$148,000	2006	2,037	\$72.66	4/3	Open	Manuf
	Not	5494 N Puma	1.38	12/6/2017	\$138,900	2000	2,044	\$67.95	4/3	Open	Manuf

Adjoining Sales Adjusted

Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
							\$150,000			1467
-\$5,365		-\$695	\$10,456				\$143,396	4%		
-\$3,480	\$5,000	-\$2,960	\$10,593				\$157,154	-5%		
\$176	\$5,000	\$1,389	\$9,622				\$155,087	-3%		
									-1%	

These matched pairs range from 1,467 to 1,697 feet from the closest solar panel and shows no negative impact due to proximity to the solar farm. The average measured impacts range from -1% to 0%, which is within a typical variation for real estate and supports a conclusion of no impact.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GLA	BR/BA	Park	Style	Other
Adjoins	269 Grandy	0.78	5/7/2019	\$275,000	2019	1,535	\$179.15	3/2.5	2-Gar	Ranch	
Not	307 Grandy	1.04	10/8/2018	\$240,000	2002	1,634	\$146.88	3/2	Gar	1.5 Story	
Not	103 Branch	0.95	4/22/2020	\$230,000	2000	1,532	\$150.13	4/2	2-Gar	1.5 Story	
Not	103 Spring Lf	1.07	8/14/2018	\$270,000	2002	1,635	\$165.14	3/2	2-Gar	Ranch	Pool

Adjoining Sales Adjusted

Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	% Diff	Distance
269 Grandy								\$275,000			477
307 Grandy	\$4,267		\$20,400	-\$8,725	\$5,000	\$10,000		\$270,943	1%		
103 Branch	-\$6,803		\$21,850	\$270				\$245,317	11%		
103 Spring Lf	\$6,052		\$22,950	-\$9,908	\$5,000		-\$20,000	\$274,094	0%		
										4%	

Both of these matched pairs support a finding of no impact on value. This is reinforced by the listings for both properties identifying the privacy due to no housing in the rear of the property as part of the marketing for these homes.

44. Matched Pair – Champion Solar, Lexington County, SC



This project is a 10 MW facility located on a 366.04-acre tract that was built in 2017.

I have considered the 2020 sale of an adjoining home located off 517 Old Charleston Road.

Adjoining Residential Sales After Solar Farm Approved

Solar	Address	Acres	Date Sold	Sales Price	Built	GBA	\$/GBA	BR/BA	Park	Style	Other
Adjoins	517 Old Charleston	11.05	8/25/2020	\$110,000	1962	925	\$118.92	3/1	Crport	Br Rnch	
Not	133 Buena Vista	2.65	6/21/2020	\$115,000	1979	1,104	\$104.17	2/2	Crport	Br Rnch	
Not	214 Crystal Spr	2.13	6/10/2019	\$102,500	1970	1,025	\$100.00	3/2	Crport	Rnch	
Not	1429 Laurel	2.10	2/21/2019	\$126,000	1960	1,250	\$100.80	2/1.5	Open	Br Rnch	3 Gar/Brn

Adjoining Sales Adjusted

Address	Time	Site	YB	GLA	BR/BA	Park	Other	Total	% Diff	Avg % Diff	Distance
517 Old Charleston								\$110,000			505
133 Buena Vista	\$410	\$17,000	-\$9,775	-\$14,917	-\$10,000			\$97,718	11%		
214 Crystal Spr	\$2,482	\$18,000	-\$4,100	-\$8,000	-\$10,000		\$10,000	\$110,882	-1%		
1429 Laurel	\$3,804	\$18,000	\$1,260	-\$26,208	-\$5,000	\$5,000	-\$15,000	\$107,856	2%	4%	

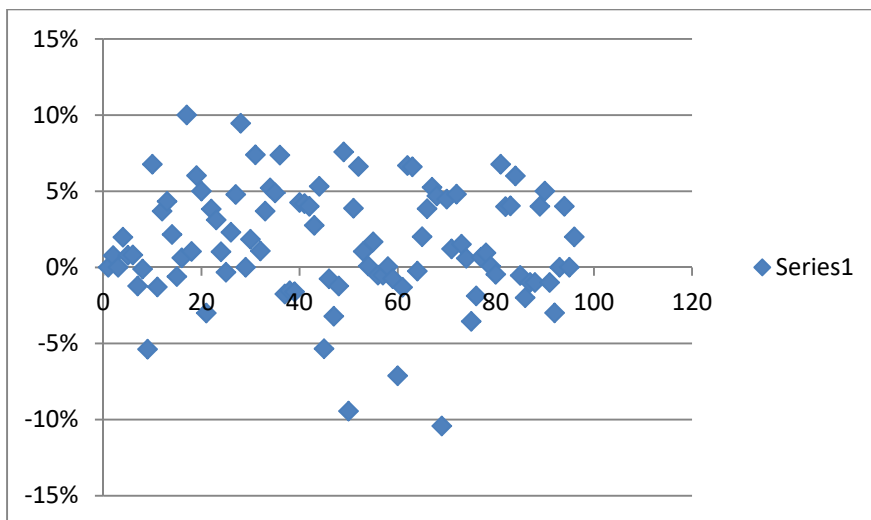
Conclusion

The solar farm matched pairs shown above have similar characteristics to each other in terms of population, but with several outliers showing solar farms in farm more urban areas. The median income for the population within 1 mile of a solar farm is \$63,665 with a median housing unit value of \$251,570. Most of the comparables are under \$400,000 in the home price, with \$770,000 being the high end of the set of matched pairs. The adjoining uses show that residential and agricultural uses are the predominant adjoining uses. These figures are in line with the larger set of solar farms that I have looked at with the predominant adjoining uses being residential and agricultural and similar to the solar farm breakdown shown for South Carolina and the proposed subject property.

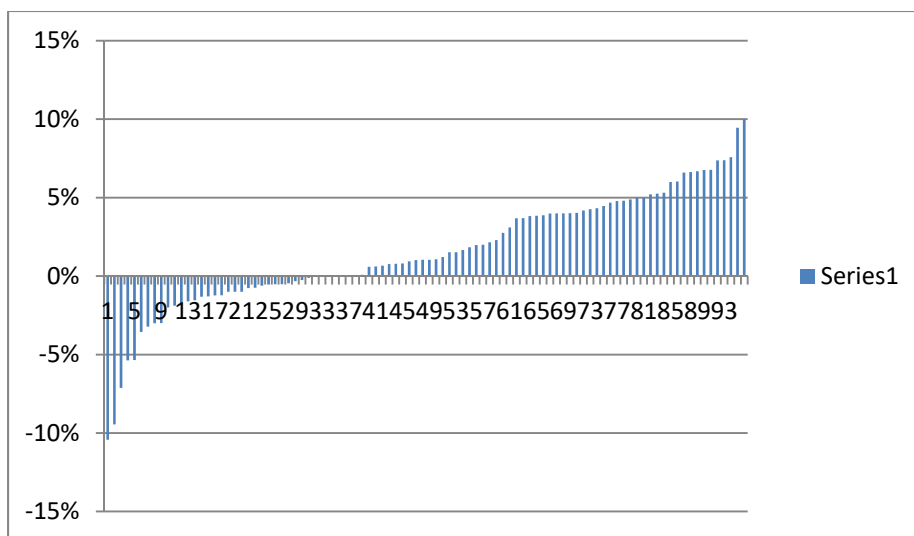
Matched Pair Summary					Adj. Uses By Acreage						1 mile Radius (2010-2020 Data)		
Name	City	State	Acres	MW	Topo Shift	Res	Ag/Res	Ag	Com/Ind	Population	Med. Income	Avg. Housing Unit	
1	AM Best	Goldsboro	NC	38	5.00	2	38%	23%	0%	39%	1,523	\$37,358	\$148,375
2	White Cross	Chapel Hill	NC	45	5.00	50	5%	51%	44%	0%	213	\$67,471	\$319,929
3	Wagstaff	Roxboro	NC	30	5.00	46	7%	89%	4%	0%	336	\$41,368	\$210,723
4	Mulberry	Selmer	TN	160	5.00	60	13%	10%	73%	3%	467	\$40,936	\$171,746
5	Nixon's	W. Friendship	MD	97	2.00	40	79%	4%	17%	0%	939	\$166,958	\$770,433
6	Leonard	Hughesville	MD	47	5.00	20	18%	0%	75%	6%	525	\$106,550	\$350,000
7	Talbot	Easton	MD	50	0.55	0	81%	0%	19%	0%	536	\$47,136	\$250,595
8	Alamo II	Converse	TX	98	4.40	30	95%	0%	5%	0%	9,257	\$62,363	\$138,617
9	Gastonia SC	Gastonia	NC	35	5.00	48	33%	23%	0%	44%	4,689	\$35,057	\$126,562
10	Summit	Moyock	NC	2,034	80.00	4	4%	94%	0%	2%	382	\$79,114	\$281,731
11	White Cross II	Chapel Hill	NC	34	2.80	35	25%	75%	0%	0%	213	\$67,471	\$319,929
12	Tracy	Bailey	NC	50	5.00	10	29%	71%	0%	0%	312	\$43,940	\$99,219
13	Manatee	Parrish	FL	1,180	75.00	20	2%	1%	97%	0%	48	\$75,000	\$291,667
14	McBride	Midland	NC	627	75.00	140	12%	78%	10%	0%	398	\$63,678	\$256,306
15	Yamhill II	Amity	OR	186	1.20	20	2%	0%	97%	1%	97	\$58,248	\$342,391
16	Marion	Aurora	OR	32	0.30	0	2%	37%	61%	0%	267	\$75,355	\$370,833
17	Clackamas II	Aurora	OR	156	0.22	0	7%	25%	68%	0%	3,062	\$70,911	\$464,501
18	Grand Ridge	Streator	IL	160	20.00	1	8%	5%	87%	0%	96	\$70,158	\$187,037
19	Portage	Portage	IN	56	2.00	0	19%	0%	81%	0%	6,642	\$65,695	\$186,463
20	Dominion	Indianapolis	IN	134	8.60	20	3%	0%	97%	0%	3,774	\$61,115	\$167,515
21	Beetle-Shelby	Shelby	NC	24	4.00	52	22%	0%	77%	1%	218	\$53,541	\$192,692
22	Courthouse	Bessemer	NC	52	5.00	150	48%	52%	0%	0%	551	\$45,968	\$139,404
23	Mariposa	Stanley	NC	36	5.00	96	48%	52%	0%	0%	1,716	\$36,439	\$137,884
24	Clarke Cnty	White Post	VA	234	20.00	70	14%	46%	39%	1%	578	\$81,022	\$374,453
25	Flemington	Flemington	NJ	120	9.36	N/A	13%	28%	50%	8%	3,477	\$105,714	\$444,696
26	Frenchtown	Frenchtown	NJ	139	7.90	N/A	37%	29%	35%	0%	457	\$111,562	\$515,399
27	McGraw	East Windsor	NJ	95	14.00	N/A	27%	0%	44%	29%	7,684	\$78,417	\$362,428
28	Tinton Falls	Tinton Falls	NJ	100	16.00	N/A	98%	0%	0%	2%	4,667	\$92,346	\$343,492
29	Simon	Social Circle	GA	237	30.00	71	1%	36%	63%	0%	203	\$76,155	\$269,922
30	Candace	Princeton	NC	54	5.00	22	76%	0%	24%	0%	448	\$51,002	\$107,171
31	Crittenden	Crittenden	KY	34	2.70	40	22%	27%	51%	0%	1,419	\$60,198	\$178,643
32	Walker	Barhamsville	VA	485	20.00	N/A	12%	20%	68%	0%	203	\$80,773	\$320,076
33	Innov 46	Hope Mills	NC	532	78.50	0	17%	0%	83%	0%	2,247	\$58,688	\$183,435
34	Innov 42	Fayetteville	NC	414	71.00	0	41%	0%	59%	0%	568	\$60,037	\$276,347
35	Demille	Lapeer	MI	160	28.40	10	10%	0%	68%	22%	2,010	\$47,208	\$187,214
36	Turrill	Lapeer	MI	230	19.60	10	75%	0%	59%	25%	2,390	\$46,839	\$110,361
37	Sunfish	Willow Spring	NC	50	6.40	30	35%	30%	35%	0%	1,515	\$63,652	\$253,138
38	HCE Johnston	Benson	NC	30	2.60	0	55%	45%	0%	0%	1,169	\$65,482	\$252,544
39	Picture Rocks	Tucson	AZ	182	20.00	N/A	6%	6%	88%	0%	102	\$81,081	\$280,172
40	Avra Valley	Tucson	AZ	246	25.00	N/A	3%	3%	94%	0%	85	\$80,997	\$292,308
41	Sappony	Stony Crk	VA	322	20.00	N/A	2%	0%	98%	0%	74	\$51,410	\$155,208
42	Camden Dam	Camden	NC	50	5.00	0	17%	11%	72%	0%	403	\$84,426	\$230,288
43	Grandy	Grandy	NC	121	20.00	10	55%	0%	24%	21%	949	\$50,355	\$231,408
44	Champion	Pelion	SC	100	10.00	N/A	4%	8%	70%	18%	1,336	\$46,867	\$171,939
Average				211	17.10	32	28%	22%	46%	5%	1,551	\$66,956	\$260,573
Median				100	5.70	20	18%	9%	51%	0%	544	\$63,665	\$251,570
High				2,034	80.00	150	98%	94%	98%	44%	9,257	\$166,958	\$770,433
Low				24	0.22	0	1%	0%	0%	0%	48	\$35,057	\$99,219
1 Mile Radius	N. Bobwhite	KY		1,281	121	210	6%	56%	38%	0%	180	\$37,500	\$144,444
3 Mile Radius	N. Bobwhite	KY		1,281	121	210	6%	56%	38%	0%	2,099	\$37,920	\$156,382

I have pulled 96 matched pairs from the above referenced solar farms to provide the following summary of home sale matched pairs and land sales next to solar farms. The summary shows that the range of differences is from -10% to +10% with an average of +1% and median of +1%. This means that the average and median impact is for a slight positive impact due to adjacency to a solar farm. However, this 1% rate is within the typical variability I would expect from real estate. I therefore conclude that this data shows no negative or positive impact due to adjacency to a solar farm.

While the range is seemingly wide, the graph below clearly shows that the vast majority of the data falls between -5% and +5% and most of those are clearly in the 0 to +5% range.



Arranging the data points in order of impact, I get the following chart that shows only 3 matched pairs out of 96 identifying impacts greater than -5% and only 22 more out of 96 between -5% and -1%. This leaves 71 out of 96 matched pairs showing positive impacts from 0 to +10%, or 74% of the total matched pairs. However, given that +/- 5% is considered no impact, that would include 82 of the 96 matched pairs, or 85% of the findings supporting a finding of no impact. The other readings are considered outliers with only 3 suggesting a negative impact and 11 suggesting a positive impact.



The breakdown for the 96 residential matched pairs is summarized below and the breakdown shown on the following pages.

Residential Dwelling Matched Pairs Adjoining Solar Farms

Pair	Solar Farm	City	State	Area	MW	Approx		Sale Date	Sale Price	Adj. Sale Price	% Diff
						Distance	Tax ID/Address				
1	AM Best	Goldsboro	NC	Suburban	5	280	3600195570	Sep-13	\$250,000		
							3600198928	Mar-14	\$250,000	\$250,000	0%
2	AM Best	Goldsboro	NC	Suburban	5	280	3600195361	Sep-13	\$260,000		
							3600194813	Apr-14	\$258,000	\$258,000	1%
3	AM Best	Goldsboro	NC	Suburban	5	280	3600199891	Jul-14	\$250,000		
							3600198928	Mar-14	\$250,000	\$250,000	0%
4	AM Best	Goldsboro	NC	Suburban	5	280	3600198632	Aug-14	\$253,000		
							3600193710	Oct-13	\$248,000	\$248,000	2%
5	AM Best	Goldsboro	NC	Suburban	5	280	3600196656	Dec-13	\$255,000		
							3601105180	Dec-13	\$253,000	\$253,000	1%
6	AM Best	Goldsboro	NC	Suburban	5	280	3600182511	Feb-13	\$247,000		
							3600183905	Dec-12	\$240,000	\$245,000	1%
7	AM Best	Goldsboro	NC	Suburban	5	280	3600182784	Apr-13	\$245,000		
							3600193710	Oct-13	\$248,000	\$248,000	-1%
8	AM Best	Goldsboro	NC	Suburban	5	280	3600195361	Nov-15	\$267,500		
							3600195361	Sep-13	\$260,000	\$267,800	0%
9	Mulberry	Selmer	TN	Rural	5	400	0900A011	Jul-14	\$130,000		
							099CA043	Feb-15	\$148,900	\$136,988	-5%
10	Mulberry	Selmer	TN	Rural	5	400	099CA002	Jul-15	\$130,000		
							0990NA040	Mar-15	\$120,000	\$121,200	7%
11	Mulberry	Selmer	TN	Rural	5	480	491 Dusty	Oct-16	\$176,000		
							35 April	Aug-16	\$185,000	\$178,283	-1%
12	Mulberry	Selmer	TN	Rural	5	650	297 Country	Sep-16	\$150,000		
							53 Glen	Mar-17	\$126,000	\$144,460	4%
13	Mulberry	Selmer	TN	Rural	5	685	57 Cooper	Feb-19	\$163,000		
							191 Amelia	Aug-18	\$132,000	\$155,947	4%
14	Nixon's	W. Friendship	MD	Rural	2	660	12909 Vistaview	Sep-14	\$775,000	\$771,640	
							2712 Friendship Farm	Jun-14	\$690,000	\$755,000	2%
15	Leonard Rd	Hughesville	MD	Rural	5.5	230	14595 Box Elder	Feb-16	\$291,000		
							15313 Bassford Rd	Jul-16	\$329,800	\$292,760	-1%
16	Talbot Cnty	Easton	MD	Rural	0.55	1000	10193 Hiners	Oct-12	\$136,092		
							10711 Hiners	Dec-12	\$135,000	\$135,250	1%
17	Alamo II	San Antonio	TX	Suburban	4.4	360	7703 Redstone Mnr	Mar-16	\$166,000		
							7703 Redstone Mnr	Oct-12	\$149,980	\$165,728	0%
18	Alamo II	San Antonio	TX	Suburban	4.4	170	7807 Redstone Mnr	Aug-14	\$147,000		
							7807 Redstone Mnr	May-12	\$136,266	\$145,464	1%
19	Alamo II	San Antonio	TX	Suburban	4.4	150	7734 Sundew Mist	Nov-14	\$134,000		
							7734 Sundew Mist	May-12	\$117,140	\$125,928	6%
20	Neal Hawkins	Gastonia	NC	Suburban	5	225	609 Neal Hawkins	Mar-17	\$270,000		
							1418 N Modena	Apr-18	\$225,000	\$257,290	5%
21	Summit	Moyock	NC	Suburban	80	1,060	129 Pinto	Apr-16	\$170,000		
							102 Timber	Apr-16	\$175,500	\$175,101	-3%
22	Summit	Moyock	NC	Suburban	80	2,020	105 Pinto	Dec-16	\$206,000		
							127 Ranchland	Jun-15	\$219,900	\$198,120	4%
23	White Cross II	Chapel Hill	NC	Rural	2.8	1,479	2018 Elkins	Feb-16	\$340,000		
							4200B Old Greensbor	Dec-15	\$380,000	\$329,438	3%
24	Tracy	Bailey	NC	Rural	5	780	9162 Winters	Jan-17	\$255,000		
							7352 Red Fox	Jun-16	\$176,000	\$252,399	1%
25	Manatee	Parrish	FL	Rural	75	1180	13670 Highland	Aug-18	\$255,000		
							13851 Highland	Sep-18	\$240,000	\$255,825	0%
26	McBride Place	Midland	NC	Rural	75	275	4380 Joyner	Nov-17	\$325,000		
							3870 Elkwood	Aug-16	\$250,000	\$317,523	2%
27	McBride Place	Midland	NC	Rural	75	505	5811 Kristi	Mar-20	\$530,000		
							3915 Tania	Dec-19	\$495,000	\$504,657	5%
28	Yamhill II	Amity	OR	Rural	1.2	700	12001 SW Bellerus	Jul-15	\$326,456		
							9955 Bethel	Feb-16	\$289,900	\$295,593	9%
29	Clackamas II	Aurora	OR	Suburban	0.22	125	7620 SW Fairway	Jul-13	\$365,000		
							7480 SW Fairway	Jun-13	\$365,000	\$365,000	0%
30	Clackamas II	Aurora	OR	Suburban	0.22	125	7700 SW Fairway	Jun-14	\$377,100		
							7500 SW Fairway	Dec-11	\$365,000	\$370,175	2%

Pair	Solar Farm	City	State	Area	MW	Approx		Sale Date	Sale Price	Adj. Sale Price	% Diff
						Distance	Tax ID/Address				
31	Clackamas II	Aurora	OR	Suburban	0.22	125	7380 SW Fairway 7480 SW Fairway	Jul-14 Jun-13	\$415,000 \$365,000		
32	Grand Ridge	Streator	IL	Rural	20	480	1497 E 21st 712 Columbus	Oct-16 Jun-16	\$186,000 \$166,000	\$384,345 \$184,000	7% 1%
33	Portage	Portage	IN	Rural	2	1320	836 N 450 W 336 E 1050 N	Sep-13 Jan-13	\$149,800 \$155,000		4%
34	Dominion	Indianapolis	IN	Rural	8.6	400	2013249 (Tax ID) 5723 Minden	Dec-15 Nov-16	\$140,000 \$139,900		5%
35	Dominion	Indianapolis	IN	Rural	8.6	400	2013251 (Tax ID) 5910 Mosaic	Sep-17 Aug-16	\$160,000 \$146,000		5%
36	Dominion	Indianapolis	IN	Rural	8.6	400	2013252 (Tax ID) 5836 Sable	May-17 Jun-16	\$147,000 \$141,000		7%
37	Dominion	Indianapolis	IN	Rural	8.6	400	2013258 (Tax ID) 5904 Minden	Dec-15 May-16	\$131,750 \$130,000		
38	Dominion	Indianapolis	IN	Rural	8.6	400	2013260 (Tax ID) 5904 Minden	Mar-15 May-16	\$127,000 \$130,000		-2%
39	Dominion	Indianapolis	IN	Rural	8.6	400	2013261 (Tax ID) 5904 Minden	Feb-14 May-16	\$120,000 \$130,000		-2%
40	Beetle-Shelby	Mooresboro	NC	Rural	4	945	1715 Timber 1021 Posting	Oct-18 Feb-19	\$416,000 \$414,000		4%
41	Courthouse	Bessemer	NC	Rural	5	375	2134 Tryon Court. 5550 Lennox	Mar-17 Oct-18	\$111,000 \$115,000		4%
42	Mariposa	Stanley	NC	Suburban	5	1155	215 Mariposa 110 Airport	Dec-17 May-16	\$249,000 \$166,000		4%
43	Mariposa	Stanley	NC	Suburban	5	570	242 Mariposa 110 Airport	Sep-15 Apr-16	\$180,000 \$166,000		3%
44	Clarke Cnty	White Post	VA	Rural	20	1230	833 Nations Spr 541 Old Kitchen	Jan-17 Sep-18	\$295,000 \$370,000		5%
45	Flemington	Flemington	NJ	Suburban	9.36	295	10 Coventry 1 Sheffield	Mar-18 Dec-17	\$370,000 \$399,900		-5%
46	Flemington	Flemington	NJ	Suburban	9.36	375	54 Hart 43 Aberdeen	Jul-16 Nov-16	\$420,000 \$417,000		-1%
47	Flemington	Flemington	NJ	Suburban	9.36	425	6 Portsmith 43 Aberdeen	Jun-15 Nov-16	\$410,000 \$417,000		-3%
48	Flemington	Flemington	NJ	Suburban	9.36	345	12 Stratford 28 Bristol	Nov-17 Dec-18	\$414,900 \$398,000		-1%
49	Frenchtown	Frenchtown	NJ	Rural	7.9	250	5 Muddy Run 132 Kingswood	Jun-17 Oct-16	\$385,000 \$380,000		8%
50	McGraw	East Windsor	NJ	Suburban	14	175	153 Wyndmoor 20 Spyglass	Apr-17 Dec-17	\$215,000 \$240,000		-9%
51	McGraw	East Windsor	NJ	Suburban	14	175	149 Wyndmoor 81 Wyndmoor	May-17 Jan-18	\$206,000 \$204,000		4%
52	McGraw	East Windsor	NJ	Suburban	14	400	26 Wilmor 25 Pinehurst	Mar-19 May-19	\$286,000 \$315,000		7%
53	Tinton Falls	Tinton Falls	NJ	Suburban	16	185	111 Kyle 80 Kyle	Aug-18 Sep-17	\$402,000 \$410,000		1%
54	Tinton Falls	Tinton Falls	NJ	Suburban	16	155	47 Kyle 4 Michael	Aug-18 Nov-18	\$260,000 \$260,000		0%
55	Tinton Falls	Tinton Falls	NJ	Suburban	16	150	7 Kyle 36 Kyle	Jun-17 Jan-19	\$262,195 \$260,000		2%
56	Tinton Falls	Tinton Falls	NJ	Suburban	16	155	1 Samantha 36 Kyle	Sep-17 Jan-19	\$258,205 \$260,000		-1%
57	Tinton Falls	Tinton Falls	NJ	Suburban	16	155	1 Samantha 36 Kyle	Sep-17 Jan-19	\$258,205 \$260,000		-1%
58	Candace	Princeton	NC	Suburban	5	488	499 Herring 1795 Bay Valley	Sep-17 Dec-17	\$215,000 \$194,000		0%
59	Crittenden	Crittenden	KY	Suburban	2.7	373	250 Claiborne 315 N Fork	Jan-19 May-19	\$120,000 \$107,000		-1%

Pair	Solar Farm	City	State	Area	MW	Distance	Tax ID/Address	Sale Date	Sale Price	Adj. Sale Price	% Diff
60	Crittenden	Crittenden	KY	Suburban	2.7	488	300 Claiborne	Sep-18	\$213,000		
							1795 Bay Valley	Dec-17	\$231,200	\$228,180	-7%
61	Crittenden	Crittenden	KY	Suburban	2.7	720	350 Claiborne	Jul-18	\$245,000		
							2160 Sherman	Jun-19	\$265,000	\$248,225	-1%
62	Crittenden	Crittenden	KY	Suburban	2.7	930	370 Claiborne	Aug-19	\$273,000		
							125 Lexington	Apr-18	\$240,000	\$254,751	7%
63	Walker	Barhamsville	VA	Rural	20	250	5241 Barham	Oct-18	\$264,000		
							9252 Ordinary	Jun-19	\$277,000	\$246,581	7%
64	AM Best	Goldsboro	NC	Suburban	5	385	103 Granville Pl	Jul-18	\$265,000		
							2219 Granville	Jan-18	\$260,000	\$265,682	0%
65	AM Best	Goldsboro	NC	Suburban	5	315	104 Erin	Jun-17	\$280,000		
							2219 Granville	Jan-18	\$265,000	\$274,390	2%
66	AM Best	Goldsboro	NC	Suburban	5	400	2312 Granville	May-18	\$284,900		
							2219 Granville	Jan-18	\$265,000	\$273,948	4%
67	AM Best	Goldsboro	NC	Suburban	5	400	2310 Granville	May-19	\$280,000		
							634 Friendly	Jul-19	\$267,000	\$265,291	5%
68	Summit	Moyock	NC	Suburban	80	570	318 Green View	Sep-19	\$357,000		
							336 Green View	Jan-19	\$365,000	\$340,286	5%
69	Summit	Moyock	NC	Suburban	80	440	164 Ranchland	Apr-19	\$169,000		
							105 Longhorn	Oct-17	\$184,500	\$186,616	-10%
70	Summit	Moyock	NC	Suburban	80	635	358 Oxford	Sep-19	\$478,000		
							176 Providence	Sep-19	\$425,000	\$456,623	4%
71	Summit	Moyock	NC	Suburban	80	970	343 Oxford	Mar-17	\$490,000		
							218 Oxford	Apr-17	\$525,000	\$484,064	1%
72	Innov 46	Hope Mills	NC	Suburban	78.5	435	6849 Roslin Farm	Feb-19	\$155,000		
							109 Bledsoe	Jan-19	\$150,000	\$147,558	5%
73	Innov 42	Fayetteville	NC	Suburban	71	340	2923 County Line	Feb-19	\$385,000		
							2109 John McMillan	Apr-18	\$320,000	\$379,156	2%
74	Innov 42	Fayetteville	NC	Suburban	71	330	2935 County Line	Jun-19	\$266,000		
							7031 Glynn Mill	May-18	\$255,000	\$264,422	1%
75	Demille	Lapeer	MI	Suburban	28	310	1120 Don Wayne	Aug-19	\$194,000		
							1231 Turrill	Apr-19	\$182,000	\$200,895	-4%
76	Demille	Lapeer	MI	Suburban	28	310	1126 Don Wayne	May-18	\$160,000		
							3565 Garden	May-19	\$165,000	\$163,016	-2%
77	Demille	Lapeer	MI	Suburban	28	380	1138 Don Wayne	Aug-19	\$191,000		
							1128 Gwen	Aug-18	\$187,500	\$189,733	1%
78	Demille	Lapeer	MI	Suburban	28	280	1174 Alice	Jan-19	\$165,000		
							1127 Don Wayne	Sep-19	\$176,900	\$163,443	1%
79	Turrill	Lapeer	MI	Suburban	20	290	1060 Cliff	Sep-18	\$200,500		
							1128 Gwen	Aug-18	\$187,500	\$200,350	0%
80	Turrill	Lapeer	MI	Suburban	20	255	1040 Cliff	Jun-17	\$145,600		
							1127 Don Wayne	Sep-19	\$176,900	\$146,271	0%
81	Sunfish	Willow Sprng	NC	Suburban	6.4	205	7513 Glen Willow	Sep-17	\$185,000		
							205 Pine Burr	Dec-17	\$191,000	\$172,487	7%
82	HCE Johnston	Benson	NC	Suburban	2.6	290	107 Reese	Nov-19	\$393,000		
							200 Reese	Feb-20	\$400,000	\$377,338	4%
83	HCE Johnston	Benson	NC	Suburban	2.6	105	63 Reese	Mar-20	\$410,000		
							320 Wolf Den	Sep-19	\$377,780	\$393,474	4%
84	Crittenden	Crittenden	KY	Suburban	2.7	655	330 Claiborne	Dec-19	\$282,500		
							895 Osborne	Sep-19	\$249,900	\$265,327	6%
85	Picture Rocks	Tucson	AZ	Rural	20	1100	12980 W Moss V	Jun-20	\$393,900		
							13071 W Smr Poppy	Feb-20	\$389,409	\$396,001	-1%
86	Picture Rocks	Tucson	AZ	Rural	20	970	12986 W Moss V	Jun-19	\$350,000		
							12884 W Zebra Aloe	Jan-20	\$336,500	\$356,528	-2%
87	Picture Rocks	Tucson	AZ	Rural	20	990	12705 W Emigh	Jan-19	\$255,000		
							12020 W Camper	Sep-19	\$200,000	\$257,440	-1%
88	Avra Valley	Tucson	AZ	Rural	25	1697	9415 N Ghost Ranch	Oct-18	\$131,000		
							7175 N Nelson Quich.	Mar-19	\$136,000	\$131,913	-1%
89	Avra Valley	Tucson	AZ	Rural	25	1467	14441 W Stallion	Dec-17	\$150,000		
							9620 N Rng Bck	Mar-19	\$139,000	\$143,396	4%
90	Neal Hawkins	Gastonia	NC	Suburban	5	145	611 Neal Hawkins	Jun-17	\$288,000		
							1211 Still Forrest	Jul-18	\$280,000	\$284,838	1%
91	Clarke Cnty	White Post	VA	Rural	20	1230	833 Nations Spr	Aug-19	\$385,000		
							2393 Old Chapel	Aug-20	\$330,000	\$389,286	-1%
92	Sappony	Stony Creek	VA	Rural	20	1425	12511 Palestine	Jul-18	\$128,400		
							6494 Rocky Branch	Nov-18	\$100,000	\$131,842	-3%

Pair	Solar Farm	City	State	Area	MW	Approx		Sale Date	Sale Price	Adj. Sale Price	% Diff
						Tax ID/Address	Distance				
93	Camden Dam	Camden	NC	Rural	5	122 N Mill Dam	342	Nov-18	\$350,000		
						548 Trotman		May-18	\$309,000	\$351,027	0%
94	Grandy	Grandy	NC	Suburban	20	120 Par Four	405	Aug-19	\$315,000		
95	Grandy	Grandy	NC	Suburban	20	116 Barefoot	477	Sep-20	\$290,000	\$302,587	4%
						269 Grandy		May-19	\$275,000		
96	Champion	Pelion	SC	Suburban	10	103 Spring Leaf	505	Aug-18	\$270,000	\$274,094	0%
						517 Old Charleston		Aug-20	\$110,000		
						1429 Laurel		Feb-19	\$126,000	\$107,856	2%
Avg.											
					MW	Distance				Average	% Dif
					Average	18.11	521			Average	1%
					Median	8.60	400			Median	1%
					High	80.00	2,020			High	10%
					Low	0.22	105			Low	-10%

Similarly, the 10 land sales shows a median impact of 0% due to adjacency to a solar farm. The range of these adjustments range from -12% to +17%. Land prices tend to vary more widely than residential homes, which is part of that greater range. I consider this data to support no negative or positive impact due to adjacency to a solar farm.

Land Sale Matched Pairs Adjoining Solar Farms

Pair	Solar Farm	City	State	Area	MW	Tax ID/Address	Sale Date	Sale Price	Acres	\$/AC	Adj.		% Diff
											\$/AC	% Diff	
1	White Cross	Chapel Hill	NC	Rural	5	9748336770	Jul-13	\$265,000	47.20	\$5,614			
						9747184527	Nov-10	\$361,000	59.09	\$6,109	\$5,278	6%	
2	Wagstaff	Roxboro	NC	Rural	5	91817117960	Aug-13	\$164,000	18.82	\$8,714			
						91800759812	Dec-13	\$130,000	14.88	\$8,737	\$8,737	0%	
3	Tracy	Bailey	NC	Rural	5	316003	Jul-16	\$70,000	13.22	\$5,295			
						6056	Oct-16	\$164,000	41.00	\$4,000	\$4,400	17%	
4	Marion	Aurora	OR	Rural	0.3	18916 Butteville	Aug-14	\$259,000	15.75	\$16,444			
						Waconda	Sep-15	\$215,000	11.86	\$18,128	\$16,950	-3%	
5	Portage	Portage	IN	Sub	2	64-06-19-200-003	Feb-14	\$149,600	18.70	\$8,000			
						64-15-08-200-010	Jan-17	\$115,000	15.02	\$7,656	\$7,198	10%	
6	Courthouse	Bessemer	NC	Rural	5	5021 Buckland	Mar-18	\$58,500	9.66	\$6,056			
						Kiser	Nov-17	\$69,000	17.65	\$3,909	\$5,190	14%	
7	Mariposa	Stanley	NC	Sub	5	174339	Jun-18	\$160,000	21.15	\$7,565			
						227852	May-18	\$97,000	10.57	\$9,177	\$7,565	0%	
8	Mariposa	Stanley	NC	Sub	5	227039	Dec-17	\$66,500	6.86	\$9,694			
						177322	May-17	\$66,500	5.23	\$12,715	\$9,694	0%	
9	Simon	Social Circle	GA	Rural	30	4514 Hawkins	Mar-16	\$180,000	36.86	\$4,883			
						Pannell	Nov-16	\$322,851	66.94	\$4,823	\$4,974	-2%	
10	Candace	Princeton	NC	Sub	5	499 Herring	May-17	\$30,000	2.03	\$14,778			
						488 Herring	Dec-16	\$35,000	2.17	\$16,129	\$16,615	-12%	
Average													
					Average	6.73				Average	3%		
					Median	5.00				Median	0%		
					High	30.00				High	17%		
					Low	0.30				Low	-12%		

Larger Solar Farm Data

I have summarized the solar farm data for projects at 20 MW and larger as shown below. These are the same solar farms noted above but focused on larger projects.

Matched Pair Summary						Adj. Uses By Acreage					1 mile Radius (2010-2020 Data)		
Name	City	State	Acres	MW	Topo	Res	Ag/Res	Ag	Com/Ind	Population	Med. Income	Avg. Housing Unit	
10	Summit	Moyock	NC	2,034	80.00	4	4%	94%	0%	2%	382	\$79,114	\$281,731
13	Manatee	Parrish	FL	1,180	75.00	20	2%	1%	97%	0%	48	\$75,000	\$291,667
14	McBride	Midland	NC	627	75.00	140	12%	78%	10%	0%	398	\$63,678	\$256,306
18	Grand Ridge	Streator	IL	160	20.00	1	8%	5%	87%	0%	96	\$70,158	\$187,037
24	Clarke Cnty	White Post	VA	234	20.00	70	14%	46%	39%	1%	578	\$81,022	\$374,453
26	Simon	Social Circle	GA	237	30.00	71	1%	36%	63%	0%	203	\$76,155	\$269,922
32	Walker	Barhamsville	VA	485	20.00	N/A	12%	20%	68%	0%	203	\$80,773	\$320,076
33	Innov 46	Hope Mills	NC	532	78.50	0	17%	0%	83%	0%	2,247	\$58,688	\$183,435
34	Innov 42	Fayetteville	NC	414	71.00	0	41%	0%	59%	0%	568	\$60,037	\$276,347
35	Demille	Lapeer	MI	160	28.40	10	10%	0%	68%	22%	2,010	\$47,208	\$187,214
36	Turrill	Lapeer	MI	230	19.60	10	75%	0%	59%	25%	2,390	\$46,839	\$110,361
39	Picture Rocks	Tucson	AZ	182	20.00	N/A	6%	6%	88%	0%	102	\$81,081	\$280,172
40	Avra Valley	Tucson	AZ	246	25.00	N/A	3%	3%	94%	0%	85	\$80,997	\$292,308
41	Sappony	Stony Crk	VA	322	20.00	N/A	2%	0%	98%	0%	74	\$51,410	\$155,208
43	Grandy	Grandy	NC	121	20.00	10	55%	0%	24%	21%	949	\$50,355	\$231,408
Average				478	40	31	17%	19%	62%	5%	689	\$66,834	\$246,510
Median				246	25	10	10%	3%	68%	0%	382	\$70,158	\$269,922
High				2,034	80	140	75%	94%	98%	25%	2,390	\$81,081	\$374,453
Low				121	20	0	1%	0%	0%	0%	48	\$46,839	\$110,361

The breakdown of adjoining uses, population density, median income and housing prices for these projects are very similar to those of the larger set.

On the following page I show 63 projects ranging in size from 50 MW up to 1,000 MW with an average size of 118.48 MW and a median of 80 MW. The average closest distance for an adjoining home is 241 feet, while the median distance is 175 feet. The closest distance is 57 feet. The mix of adjoining uses is similar with most of the adjoining uses remaining residential or agricultural in nature.

Parcel #	State	County	City	Name	Output (MW)	Total Acres	Used Acres	Avg. Dist to home	Closest Home	Adjoining Use by Acre			
										Res	Agri	Agri/Res	Com
78	NC	Currituck	Moyock	Summit/Ranchland	80	2034		674	360	4%	94%	0%	2%
133	MS	Forrest	Hattiesburg	Hattiesburg	50	1129	479.6	650	315	35%	65%	0%	0%
179	SC	Jasper	Ridgeland	Jasper	140	1600	1000	461	108	2%	85%	13%	0%
211	NC	Halifax	Enfield	Chestnut	75	1428.1		1,429	210	4%	96%	0%	0%
222	VA	Mecklenburg	Chase City	Grasshopper	80	946.25				6%	87%	5%	1%
226	VA	Louisa	Louisa	Belcher	88	1238.1			150	19%	53%	28%	0%
305	FL	Pasco	Dade City	Mountain View	55	347.12		510	175	32%	39%	21%	8%
319	FL	Hamilton	Jasper	Hamilton	74.9	1268.9	537	3,596	240	5%	67%	28%	0%
336	FL	Manatee	Parrish	Manatee	74.5	1180.4		1,079	625	2%	50%	1%	47%
337	FL	DeSoto	Arcadia	Citrus	74.5	640				0%	0%	100%	0%
338	FL	Charlotte	Port Charlotte	Babcock	74.5	422.61				0%	0%	100%	0%
353	VA	Accomack	Oak Hall	Amazon East(ern shore)	80	1000		645	135	8%	75%	17%	0%
364	VA	Culpepper	Stevensburg	Greenwood	100	2266.6	1800	788	200	8%	62%	29%	0%
368	NC	Duplin	Warsaw	Warsaw	87.5	585.97	499	526	130	11%	66%	21%	3%
390	NC	Richmond	Ellerbe	Innovative Solar 34	50	385.24	226	N/A	N/A	1%	99%	0%	0%
399	NC	Cabarrus	Midland	McBride	74.9	974.59	627	1,425	140	12%	78%	9%	0%
400	FL	Polk	Mulberry	Alafia	51	420.35		490	105	7%	90%	3%	0%
406	VA	Halifax	Clover	Foxhound	91	1311.8		885	185	5%	61%	17%	18%
410	FL	Gilchrist	Trenton	Trenton	74.5	480		2,193	775	0%	26%	55%	19%
411	NC	Edgecombe	Battleboro	Fern	100	1235.4	960.71	1,494	220	5%	76%	19%	0%
412	MD	Caroline	Goldsboro	Cherrywood	202	1722.9	1073.7	429	200	10%	76%	13%	0%
434	NC	Edgecombe	Conetoe	Conetoe	80	1389.9	910.6	1,152	120	5%	78%	17%	0%
440	FL	Volusia	Debary	Debary	74.5	844.63		654	190	3%	27%	0%	70%
441	FL	Alachua & Pt	Hawthorne	Horizon	74.5	684				3%	81%	16%	0%
484	VA	Southampton	Newsoms	Southampton	100	3243.9		-	-	3%	78%	17%	3%
486	VA	Augusta	Stuarts Draft	Augusta	125	3197.4	1147	588	165	16%	61%	16%	7%
491	NC	Stanly	Misenheimer	Misenheimer 2018	80	740.2	687.2	504	130	11%	40%	22%	27%
494	VA	King and Que	Shacklefords	Walnut	110	1700	1173	641	165	14%	72%	13%	1%
496	VA	Halifax	Clover	Piney Creek	80	776.18	422	523	195	15%	62%	24%	0%
511	NC	Halifax	Scotland Neck	American Beech	160	3255.2	1807.8	1,262	205	2%	58%	38%	3%
514	NC	Rockingham	Reidsville	Williamsburg	80	802.6	507	734	200	25%	12%	63%	0%
517	VA	Rocky	Luray	Cape	100	566.53	461	519	110	42%	12%	46%	0%
518	VA	Greensville	Emporia	Fountain Creek	80	798.3	595	862	300	6%	23%	71%	0%
525	NC	Washington	Plymouth	Macadamia	484	5578.7	4813.5	1,513	275	1%	90%	9%	0%
526	NC	Cleveland	Mooreboro	Broad River	50	759.8	365	419	70	29%	55%	16%	0%
555	FL	Polk	Mulberry	Durrance	74.5	463.57	324.65	438	140	3%	97%	0%	0%
560	NC	Yadkin	Yadkinville	Sugar	60	477	357	382	65	19%	39%	20%	22%
561	NC	Halifax	Enfield	Halifax 80mw 2019	80	1007.6	1007.6	672	190	8%	73%	19%	0%
577	VA	Isle of Wight	Windsor	Windsor	85	564.1	564.1	572	160	9%	67%	24%	0%
579	VA	Spotsylvania	Paytes	Spotsylvania	500	6412	3500			9%	52%	11%	27%
582	NC	Rowan	Salisbury	China Grove	65	428.66	324.26	438	85	58%	4%	38%	0%
583	NC	Stokes	Walnut Cove	Lick Creek	50	1424	185.11	410	65	20%	64%	11%	5%
584	NC	Halifax	Enfield	Sweetleaf	94	1956.3	1250	968	160	5%	63%	32%	0%
586	VA	King William	Aylett	Sweet Sue	77	1262	576	1,617	680	7%	68%	25%	0%
593	NC	Bertie	Windsor	Sumac	120	3360.6	1257.9	876	160	4%	90%	6%	0%
599	TN	Payette	Somerville	Yum Yum	147	4000	1500	1,862	330	3%	32%	64%	1%
602	GA	Burke	Waynesboro	White Oak	76.5	516.7	516.7	2,995	1,790	1%	34%	65%	0%
603	GA	Taylor	Butler	Butler GA	103	2395.1	2395.1	1,534	255	2%	73%	23%	2%
604	GA	Taylor	Butler	White Pine	101.2	505.94	505.94	1,044	100	1%	51%	48%	1%
605	GA	Candler	Metter	Live Oak	51	417.84	417.84	910	235	4%	72%	23%	0%
606	GA	Jeff Davis	Hazelhurst	Hazelhurst II	52.5	947.15	490.42	2,114	105	9%	64%	27%	0%
607	GA	Decatur	Bainbridge	Decatur Parkway	80	781.5	781.5	1,123	450	2%	27%	22%	49%
608	GA	Sumter	Leslie-DeSoto	Americus	1000	9661.2	4437	5,210	510	1%	63%	36%	0%
616	FL	Colombia	Fort White	Fort White	74.5	570.5	457.2	828	220	12%	71%	17%	0%
621	VA	Surry	Spring Grove	Loblolly	150	2181.9	1000	1,860	110	7%	62%	31%	0%
622	VA	Albemarle	Scottsville	Woodridge	138	2260.9	1000	1,094	170	9%	63%	28%	0%
625	NC	Nash	Middlesex	Phobos	80	754.52	734	356	57	14%	75%	10%	0%
628	MI	Lenawee	Deerfield	Carroll Road	200	1694.8	1694.8	343	190	12%	86%	0%	2%
633	VA	Greensville	Emporia	Brunswick	150.2	2076.4	1387.3	1,091	240	4%	85%	11%	0%
634	NC	Surry	Elkin	Partin	50	429.4	257.64	945	155	30%	25%	15%	30%
638	GA	Twiggs	Dry Branch	Twiggs	200	2132.7	2132.7	-	-	10%	55%	35%	0%
639	NC	Cumberland	Hope Mills	Innovative Solar 46	78.5	531.87	531.87	423	125	17%	83%	0%	0%
640	NC	Cumberland	Hope Mills	Innovative Solar 42	71	413.99	413.99	375	135	41%	59%	0%	0%
Total Number of Solar Farms					63								
Average					118.48	1533.1	1043.6	1058	241	11%	60%	24%	6%
Median					80.00	1000.0	657.1	808	175	7%	64%	19%	0%
High					1000.00	9661.2	4813.5	5210	1790	58%	99%	100%	70%
Low					50.00	347.1	185.1	343	57	0%	0%	0%	0%

III. Distance Between Homes and Solar Panels

I have measured distances at matched pairs as close as 105 feet between panel and home to show no impact on value. This measurement goes from the closest point on the home to the closest solar panel. This is a strong indication that at this distance there is no impact on adjoining homes.

However, in tracking other approved solar farms across Kentucky, North Carolina and other states, I have found that it is common for there to be homes within 100 to 150 feet of solar panels. Given the visual barriers in the form of privacy fencing or landscaping, there is no sign of negative impact.

I have also tracked a number of locations where solar panels are between 50 and 100 feet of single family homes. In these cases the landscaping is typically a double row of more mature evergreens at time of planting. There are many examples of solar farms with one or two homes closer than 100-feet, but most of the adjoining homes are further than that distance.

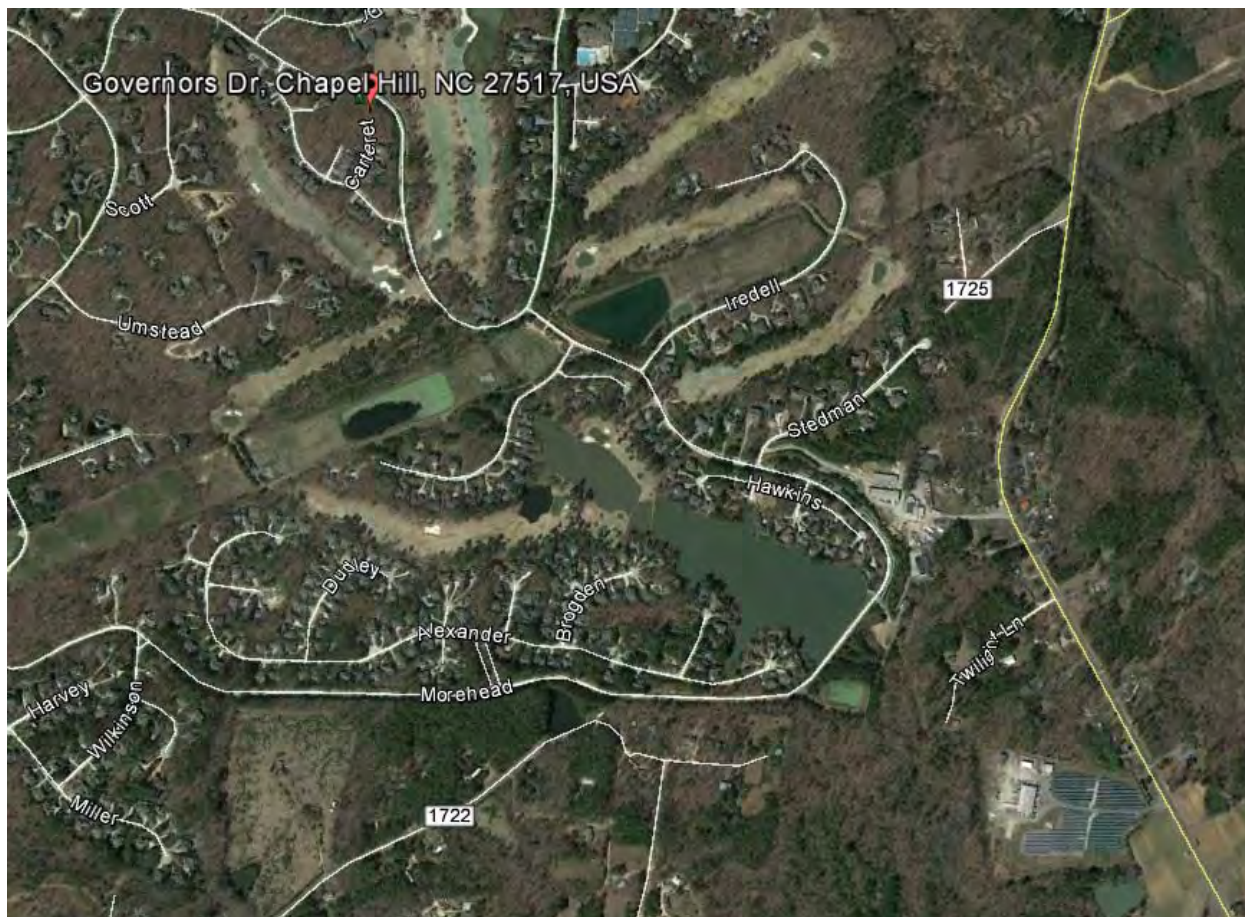
IV. Potential Impacts During Construction

I have previously been asked by the Kentucky Siting Board about potential impacts during construction. This is not a typical question I get as any development of a site will have a certain amount of construction, whether it is for a commercial agricultural use such as large scale poultry operations or a new residential subdivision. I defer to the traffic study on traffic impacts. Construction will be temporary and consistent with other development uses of the land and in fact dust from the construction will likely be less than most other construction projects given the minimal grading. I would not anticipate any impacts on property value due to construction on the site.

I note that in the matched pairs that I have included there have been a number of home sales that happened after a solar farm was approved but before the solar farm was built showing no impact on property value. Therefore the anticipated construction had no impact as shown by that data.

V. Scope of Research

I have researched over 700 solar farms and sites on which solar farms are existing and proposed in North Carolina, Kentucky, Virginia as well as other states to determine what uses are typically found in proximity with a solar farm. The data I have collected and provide in this report strongly supports the assertion that solar farms are having no negative consequences on adjoining agricultural and residential values. While I have focused on adjoining values, I note that there are many examples of solar farms being located within a quarter mile of residential developments, including such notable developments as Governor's Club in Chapel Hill, which has a solar farm within a quarter mile as shown on the following aerial map. Governor's Club is a gated golf community with homes selling for \$300,000 to over \$2 million.



The subdivisions included in the matched pair analysis also show an acceptance of residential uses adjoining solar farms with no negative impact on property value.

Beyond these references, I have quantified the adjoining uses for a number of solar farm comparables to derive a breakdown of the adjoining uses for each solar farm. The chart below shows the breakdown of adjoining or abutting uses by total acreage.

Percentage By Adjoining Acreage									
	Res	Ag	Res/AG	Comm	Ind	Avg Home	Closest Home	All Res Uses	All Comm Uses
Average	19%	53%	20%	2%	6%	887	344	91%	8%
Median	11%	56%	11%	0%	0%	708	218	100%	0%
High	100%	100%	100%	93%	98%	5,210	4,670	100%	98%
Low	0%	0%	0%	0%	0%	90	25	0%	0%

Res = Residential, Ag = Agriculture, Com = Commercial

Total Solar Farms Considered: 705

I have also included a breakdown of each solar farm by number of adjoining parcels rather than acreage. Using both factors provides a more complete picture of the neighboring properties.

Percentage By Number of Parcels Adjoining									
	Res	Ag	Res/AG	Comm	Ind	Avg Home	Closest Home	All Res Uses	All Comm Uses
Average	61%	24%	9%	2%	4%	887	344	93%	6%
Median	65%	19%	5%	0%	0%	708	218	100%	0%
High	100%	100%	100%	60%	78%	5,210	4,670	105%	78%
Low	0%	0%	0%	0%	0%	90	25	0%	0%

Res = Residential, Ag = Agriculture, Com = Commercial

Total Solar Farms Considered: 705

Both of the above charts show a marked residential and agricultural adjoining use for most solar farms. Every single solar farm considered included an adjoining residential or residential agricultural use.

VI. Specific Factors Related To Impacts on Value

I have completed a number of Impact Studies related to a variety of uses and I have found that the most common areas for impact on adjoining values typically follow a hierarchy with descending levels of potential impact. I will discuss each of these categories and how they relate to a solar farm.

1. Hazardous material
2. Odor
3. Noise
4. Traffic
5. Stigma
6. Appearance

1. Hazardous material

The solar farm presents no potential hazardous waste byproduct as part of normal operation. Any fertilizer, weed control, vehicular traffic, or construction will be significantly less than typically applied in a residential development and even most agricultural uses.

The various solar farms that I have inspected and identified in the addenda have no known environmental impacts associated with the development and operation.

2. Odor

The various solar farms that I have inspected produced no odor.

3. Noise

Whether discussing passive fixed solar panels, or single-axis trackers, there is no negative impact associated with noise from a solar farm. The transformer reportedly has a hum similar to an HVAC that can only be heard in close proximity to this transformer and the buffers on the property are sufficient to make emitted sounds inaudible from the adjoining properties. No sound is emitted from the facility at night.

The various solar farms that I have inspected were inaudible from the roadways.

4. Traffic

The solar farm will have no onsite employee's or staff. The site requires only minimal maintenance. Relative to other potential uses of the site (such as a residential subdivision), the additional traffic generated by a solar farm use on this site is insignificant.

5. Stigma

There is no stigma associated with solar farms and solar farms and people generally respond favorably towards such a use. While an individual may express concerns about proximity to a solar farm, there is no specific stigma associated with a solar farm. Stigma generally refers to things such as adult establishments, prisons, rehabilitation facilities, and so forth.

Solar panels have no associated stigma and in smaller collections are found in yards and roofs in many residential communities. Solar farms are adjoining elementary, middle and high schools as well as churches and subdivisions. I note that Solar Farm Matched Pair Set 9 in this report not only adjoins a church, but is actually located on land owned by the church. Solar panels on a roof are often cited as an enhancement to the property in marketing brochures.

I see no basis for an impact from stigma due to a solar farm.

6. Appearance

I note that larger solar farms using fixed or tracking panels are a passive use of the land that is in keeping with a rural/residential area. As shown below, solar farms are comparable to larger greenhouses. This is not surprising given that a greenhouse is essentially another method for collecting passive solar energy. The greenhouse use is well received in residential/rural areas and has a similar visual impact as a solar farm.



The solar panels are all less than 15 feet high, which means that the visual impact of the solar panels will be similar in height to a typical greenhouse and lower than a single story residential dwelling. Were the subject property developed with single family housing, that development would have a much greater visual impact on the surrounding area given that a two-story home with attic could be three to four times as high as these proposed panels.

7. Conclusion

On the basis of the factors described above, it is my professional opinion that the proposed solar farm will not negatively impact adjoining property values. The only category of impact of note is appearance, which is addressed through setbacks and landscaping buffers. The matched pair data supports that conclusion.

VII. Conclusion

The matched pair analysis shows no impact in home values due to abutting or adjoining a solar farm as well as no impact to abutting or adjacent vacant residential or agricultural land. The criteria that typically correlates with downward adjustments on property values such as noise, odor, and traffic all support a finding of no impact on property value.

Very similar solar farms in very similar areas have been found by hundreds of towns and counties not to have a substantial injury to abutting or adjoining properties, and many of those findings of no impact have been upheld by appellate courts. Similar solar farms have been approved adjoining agricultural uses, schools, churches, and residential developments.

Based on the data and analysis in this report, it is my professional opinion that the solar farm proposed at the subject property will have no impact on the value of adjoining or abutting property. I note that some of the positive implications of a solar farm that have been expressed by people living next to solar farms include protection from future development of residential developments or other more intrusive uses, reduced dust, odor and chemicals from former farming operations, protection from light pollution at night, it's quiet, and there is no traffic.



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Professional Experience

Kirkland Appraisals, LLC , Raleigh, N.C. Commercial appraiser	2003 – Present
Hester & Company , Raleigh, N.C. Commercial appraiser	1996 – 2003

Professional Affiliations

MAI (Member, Appraisal Institute) designation #11796	2001
NC State Certified General Appraiser # A4359	1999
VA State Certified General Appraiser # 4001017291	
SC State Certified General Appraiser # 6209	
FL State Certified General Appraiser # RZ3950	
IL State Certified General Appraiser # 553.002633	
KY State Certified General Appraiser # 5522	

Education

Bachelor of Arts in English , University of North Carolina, Chapel Hill	1993
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Continuing Education

Florida Appraisal Laws and Regulations	2020
Michigan Appraisal Law	2020
Uniform Standards of Professional Appraisal Practice Update	2020
Uniform Appraisal Standards for Federal Land Acquisitions (Yellow Book)	2019
The Cost Approach	2019
Income Approach Case Studies for Commercial Appraisers	2018
Introduction to Expert Witness Testimony for Appraisers	2018
Appraising Small Apartment Properties	2018
Florida Appraisal Laws and Regulations	2018
Uniform Standards of Professional Appraisal Practice Update	2018
Appraisal of REO and Foreclosure Properties	2017
Appraisal of Self Storage Facilities	2017
Land and Site Valuation	2017
NCDOT Appraisal Principles and Procedures	2017
Uniform Standards of Professional Appraisal Practice Update	2016
Forecasting Revenue	2015
Wind Turbine Effect on Value	2015
Supervisor/Trainee Class	2015
Business Practices and Ethics	2014
Subdivision Valuation	2014
Uniform Standards of Professional Appraisal Practice Update	2014
Introduction to Vineyard and Winery Valuation	2013
Appraising Rural Residential Properties	2012

Uniform Standards of Professional Appraisal Practice Update Supervisors/Trainees	2012
Rates and Ratios: Making sense of GIMs, OARs, and DCFs	2011
Advanced Internet Search Strategies	2011
Analyzing Distressed Real Estate	2011
Uniform Standards of Professional Appraisal Practice Update Business Practices and Ethics	2011
Appraisal Curriculum Overview (2 Days – General)	2009
Appraisal Review - General	2009
Uniform Standards of Professional Appraisal Practice Update Subdivision Valuation: A Comprehensive Guide	2008
Office Building Valuation: A Contemporary Perspective	2008
Valuation of Detrimental Conditions in Real Estate	2007
The Appraisal of Small Subdivisions	2007
Uniform Standards of Professional Appraisal Practice Update Evaluating Commercial Construction	2006
Conservation Easements	2005
Uniform Standards of Professional Appraisal Practice Update Condemnation Appraising	2004
Land Valuation Adjustment Procedures	2004
Supporting Capitalization Rates	2004
Uniform Standards of Professional Appraisal Practice, C Wells and Septic Systems and Wastewater Irrigation Systems	2002
Appraisals 2002	2002
Analyzing Commercial Lease Clauses	2002
Conservation Easements	2000
Preparation for Litigation	2000
Appraisal of Nonconforming Uses	2000
Advanced Applications	2000
Highest and Best Use and Market Analysis	1999
Advanced Sales Comparison and Cost Approaches	1999
Advanced Income Capitalization	1998
Valuation of Detrimental Conditions in Real Estate	1999
Report Writing and Valuation Analysis	1999
Property Tax Values and Appeals	1997
Uniform Standards of Professional Appraisal Practice, A & B	1997
Basic Income Capitalization	1996

APPENDIX B
DESCRIPTION OF LEGAL BOUNDARIES

Northern Bobwhite Solar LLC

Title Descriptions

Brussel

Real Estate Property which consists of the surface only of all that certain tract or parcel of land, situate in Marion County, Kentucky, said parcel of land being more particularly bounded and described as follows:

Being Tract 3 of the McMichael Farm Division as per plat thereof of record in [Plat Cabinet 2, Page 308A](#), in the Marion County Court Clerk's Office;

Being the same real property conveyed by Deed dated March 12, 2004, and recorded in Deed [Book 242, Page 734](#) from George W. Glazebrook, Sr., single, and David C. Clark and Maura H. Clark, his wife, unto Charles Brussel and Paula Brussels, jointly and equally, for and during their joint lives with remainder to the survivor of them.

Parcel No.: 064-002-03

Campbell

TRACT 1:

Two parcels of land situated in Marion County, Kentucky, about six miles N. E. of Lebanon on the Barbours Mill Pike and thus described, to-wit:

Parcel #1

BEGINNING at a stake at the intersection of the center of the Barbours Mill Pike, with the center of Campbell's Lane, about 1/2 mile South of the Washington County line, thence with said Campbell's Lane S. 26 1/2 E. 365 feet to a stake, thence S. 13 E. 380 feet, S. 3 1/2 E. 1400 feet, S. 9 1/2 E. 200 feet, S. 25 3/4 E. 1291 feet to a stake, corner to Campbell, thence with Campbell and Mullins lines N. 87 W. 1498 feet to a post, corner to E. Harmon, thence with Harmon's line, N. 4 E. 1500 feet to a stake in the center of Barbours Mill Pike, thence with the center of same N. 1 1/2 W. 500 feet, N. 23 W. 380 feet, N. 38 E. 650 feet, N. 30 E. 300 feet, N. 15 E. 246 feet to the beginning, containing 63 1/2 acres, more or less.

Parcel #2

BEGINNING at a stake in the center of Campbell's Lane corner to No. 2 of Tract No. 1, thence S. 86 E. 235 feet to a post, thence S. 4 1/2 W. 366 feet to a post, thence N. 84 W. 121 feet to the center of the Lane, thence N. 13 W. 380 feet to the beginning, containing 1.21 acres, more or less.

HOWEVER, THERE IS EXCEPTED AND NOT CONVEYED HEREIN the following described parcels of land:

Located in Marion County, Kentucky, about 3 1/2 miles Northwest of Lebanon, on the Barbours Mill Road and BEGINNING at a point in the center of said Barbours Mill Road, thence with a new line leaving the road N. 89 E. 150 feet to a stake, thence N. 1 W. 150 feet to a stake, thence S. 89 W. 150 feet to a point in the center of the Barbours Mill Road, thence with the center of the road S. 1 E. 150 feet to the point of beginning, containing 22,500 square feet or 0.516 acres as surveyed by James Goatley, Registered Land Surveyor No. 1119 on June 8, 1977.

AND BEING the same property conveyed by Deed to Eugene Campbell and Cynthia Campbell, his wife, by Garland Campbell and Cynthia Campbell, his wife, dated October 7, 1977, recorded October 1, 1977 in [Volume 112, Page 194](#), Office of the Marion County Clerk, Marion County, Kentucky.

Located in Marion County, Kentucky, about 3 1/2 miles North of Lebanon on the Bryan Burdette Road about 1,000 feet from the Barbours Mill Road and BEGINNING at a point in the center of the road opposite the end of the yard fence at the North side of the garage, thence leaving the road with the yard fence N. 89 W. 49 feet to post S. 4 W. 57

feet to a post, S. 89 W. 59.5 feet to post, S. 4 W. 95.5 feet to post, S. 89 E. 138 feet to post in center of said Bryan Burdette Road and thence with center of said Road N. 7 W. 157 feet to the point of beginning, containing 0.44 acres as surveyed by James Goatley, Registered Land Surveyor No. 1119 on May 14, 1986, a plat of said survey being of record in [Volume 141, Page 74](#), records of the Marion County Court Clerk's Office.

AND BEING the same property conveyed to Eugene Campbell and Cynthia Campbell, his wife jointly, by Garland Campbell and Ruth Campbell, his wife, by Deed dated May 19, 1986, recorded May 19, 1986 in Deed Book 141, Page 74, Office of the Marion County Clerk, Marion County, Kentucky.

HOWEVER THERE IS EXCEPTED AND NOT CONVEYED HEREIN the following described tract or parcel of land situated in Marion County, Kentucky about 3 1/2 miles North of Lebanon, Marion County, Kentucky, on the Barbour's Mill Road and BEGINNING at a point in the center of the said road opposite the end of the yard fence on the south side of the residence; thence leaving the road with the plank fence S. 81 deg. 30 min. E. 254 feet to post N. 8 deg. 30 min. E. 154 feet to post, N. 1 W. 252 feet to post, N. 3 E. 366 feet to post, N. 82 W. 213 feet to a point in the center of the said road, thence with the center line of said road S. 1 W. 216 feet, S. 8 W. 551 feet to the point of beginning, containing 4 acres, more or less, as per survey of James Goatley, Registered Land Surveyor No. 1119 made on January 19, 1989, a copy of which is attached.

AND BEING the same property conveyed to Eugene Campbell and Cynthia Campbell, his wife, from Garland Campbell, by Ruth Campbell, Attorney in Fact, and Ruth Campbell, his wife, by Deed dated February 8, 1989, recorded February 8, 1989 in Deed Book 150, page 68, Office of the Marion County Clerk, Marion County, Kentucky.

TRACT 2:

Located in Marion County, Kentucky, about 3 1/2 miles North of Lebanon on the Bryan Burdette Road about 1,000 feet from the Barbour's Mill Road and BEGINNING at a point in the center of the road opposite the end of the yard fence at the North side of the garage, thence leaving the road with the yard fence N. 89 W. 49 feet to post S. 4 W. 57 feet to a post, S. 89 W. 59.5 feet to post, S. 4 W. 95.5 feet to post, S. 89 E. 138 feet to point in center of said Bryan Burdette Road and thence with center of said Road N. 7 W. 157 feet to the point of beginning, containing 0.44 acres as surveyed by James Goatley, Registered Land Surveyor No. 1119 made May 14, 1986, a plat of survey being attached.

Being the same property conveyed by Deed dated May 19, 1986, and recorded in [Volume 141, Page 74](#), from Ruth Campbell, Attorney in Fact for Garland Campbell and Ruth Campbell, his wife, to Eugene Campbell and Cynthia Campbell, his wife, jointly and equally, for and during their joint natural lives and at the death of either, remainder to the survivor.

Tax Map/Parcel: 070-035

Clark

BEGINNING at a corner post in east edge of Springfield Road; thence with said highway S. 9 1/2 degrees E. 25.24 poles, S. 12 1/2 degrees E. 45.4 poles, S. 17 1/2 degrees E. 22 poles, S. 22 degrees E. 29.60 poles to stake;

THENCE with line of highway and old Springfield-Lebanon Road, S. 29 degrees 20 poles to a post, corner to land sold to Kentucky Utilities Company;

THENCE N. 60 1/2 degrees E. 31.72 poles to a post, another corner to the Kentucky Utilities Company 6.65 acre tract;

THENCE with their line S. 28 1/4 degrees E. 39.32 poles to post, corner to Kentucky Utilities Company in north side of Will Murphy's road; thence with north side of Murphy's road N. 43 1/2 degrees E. 15.44 poles to hickory tree in high point in fence line;

THENCE with road N. 41 1/2 degrees E. 10.60 poles to corner post at foot of hill;

THENCE with road N. 85 degrees E. 13 poles to a post in west side of water gap and north side of road;

THENCE S. 88 degrees E. 7.08 poles to stake in north side of Murphy's road in south side of branch opposite elm tree on north side of branch;

THENCE S. 83 degrees E. 6 poles to a corner post in Murphy's line;

THENCE in same line N. 24 Yz [1/2] degrees E. 15.48 poles to a post, corner to Will Murphy;

THENCE N. 68 Yz [1/2] degrees W. with his line 7.04 poles to corner post in east side of branch;

THENCE N. 26 degrees E. 80.56 poles to post, corner to Murphy;

THENCE with his line S. 68 degrees E. 81 poles to a stone, corner to Murphy;

THENCE with his line N. 35 degrees E. 83.04 poles to stone, corner to B.E. Nickerson;

THENCE with Hickerson's line N. 46 degrees W. 72 poles to a post in Hickerson's line;

THENCE S. 52 1/2 degrees W. 138 poles to a post;

THENCE N. 75 1/2 degrees W. 10 poles to a post;

THENCE N. 43 degrees W. 98.36 poles to corner post;

THENCE S. 58 degrees W. 63.20 poles to the beginning.

Containing 167 acres, more or less, according to survey by C.M. Probus made on October 6, 1950.

EXCEPT THEREFROM the following described portion thereof conveyed to East Kentucky Rural Electric Cooperative Corporation by Deed dated January 29, 1963, of record in [Volume 079, Page 363](#), in the Marion County Court Clerk's Office:

BEGINNING at an iron pin on the northwest side of the private drive leading from the Lebanon-Springfield Highway to lands of Clarence Murphy, corner to the property owned by Kentucky Utilities Company;

THENCE with the line of Kentucky Utilities Company N. 31 degrees 8' W. 448.5 feet to an iron pin on the southeast side of Kentucky Utilities Company tower line N. 57 degrees 38' E. 415 feet to an iron stake in the southeast line of right of way of the above-mentioned tower line;

THENCE a division line in the lands of the grantors S. 30 degrees 15' E. 334.5 feet to an iron stake on the northwest of the aforementioned private road;

THENCE with northwest side of same S. 40 degrees 53' W. 172.5 feet;

THENCE S. 43 degrees W. 225 feet to the beginning.

Containing 3.739 acres.

AND EXCEPT THEREFROM that portion conveyed to Commonwealth of Kentucky, Department of Highways, by Deed dated December 17, 1980, of record in [Volume 125, Page 053](#), in the aforesaid Clerk's office.

AND EXCEPT THEREFROM the following described portion thereof conveyed to Michael W. Clark and Gloria R. Clark, husband and wife, by Deed dated June 15, 1978, of record in [Volume 115, Page 363](#), in the aforesaid Clerk's office:

BEGINNING at a marked tree in fence line and original tract line, being approximately 215 feet, N. 60 degrees E. from Highway No. 55 (Springfield-Lebanon Highway), and said 30-foot legal easement as shown;

THENCE along said original tract line N. 60 degrees E. 170 1/2 feet to stake in fence line;

THENCE leaving said fence line and along new division lines S. 14 degrees 45' E. 132 1/2 feet to a stake S. 60 degrees W. 170 1/2 feet to stake N. 14 degrees 45' W. 132 1/2 feet to the point of beginning.

Containing 0.5 acre, as surveyed by F. Keith Sanford, dated June 1, 1978.

AND ALSO, EXCEPT THEREFROM the following described portion thereof retained by Grantors:

BEGINNING at steel pullpost on the east r/w of Hwy. 55; south corner to Judy and Mary R. Averitt Farm; north side of controlled access entrance and 30 feet in width r/w easement in favor of Phillip and Tonya Clarkson Lot (DB 253 PG 567- Plat in [Volume 115, Page 363](#)).

THENCE leaving Averitt and with Hwy 55 r/w, S. 13 degrees 59 minutes 31 seconds E. 80.47 feet, crossing the beginning of 30 feet in width r/w easement in favor of Clarkson Lot, to the south side of controlled access entrance;

THENCE with wire woven r/w fence, S 15 degrees 04 minutes 08 seconds E. 446.49 feet to pullpost; S. 22 degrees 54 minutes 28 seconds E. 252.37 feet to pullpost; S. 15 degrees 02 minutes 50 seconds E. 350.23 feet to pullpost; S. 12 degrees 01 minutes 21 seconds E. 12.14 feet to rebar (set) and corner to remaining Marcus and Elizabeth A. Clark Farm;

THENCE leaving Hwy 55 r/w and with new lines to remaining Clark, N 85 degrees 53 minutes 38 seconds E. 27.50 feet to rebar (set) at treated post; S. 87 degrees 40 minutes 20 seconds E. 277.09 feet to rebar (set); N. 84 degrees 25 minutes 35 seconds E. 202.06 feet to rebar (set); N. 66 degrees 05 minutes 04 seconds E. 62.47 feet to rebar (set); S. 89 degrees 11 minutes 00 seconds E. 129.23 feet to rebar (set); N. 73 degrees 33 minutes 03 seconds E. 258.05 feet to rebar (set) at treated gate post, and N. 4 7 degrees 06 minutes 17 seconds E. 732.70 feet to rebar (set) in fenceline of Averitt and corner to remaining Clark Farm;

THENCE leaving remaining Clark and with Averitt as fenced, N. 44 degrees 42 minutes 40 seconds W. 1402.32 feet to corner rebar (set) at stone and stub post; S. 58 degrees 03 minutes 07 seconds W. 639.09 feet to rebar (set) at 60 inch Hackberry and corner to Phillip and Tonya Clarkson Lot;

THENCE leaving Averitt and with Clarkson as fenced, S. 19 degrees 28 minutes 41 seconds E. 131.07 feet to corner rebar (set) at pullpost; S. 57 degrees 48 minutes 09 seconds W. 170.25 feet to corner rebar (set) at pullpost; N. 17 degrees 29 minutes 42 seconds W. 132.15 feet, crossing the end of 30 feet in width r/w easement, to corner rebar (set) in fenceline of Averitt;

THENCE leaving Clarkson and with Averitt as fenced on the north side of r/w easement, S. 58 degrees 00 minutes 30 seconds W. 158.18 feet to the beginning.

Containing 40.838 acres by survey of Reed Spaulding, PLS #3066 as performed 6/19/09 and as shown on plat by same dated 6/22/09.

Being the same property conveyed to David C. Clark by quitclaim deed from Marcus Clark, married, dated December 11, 2018, and recorded in [Volume 328, Page 114](#).

Tax Map/Parcel: 063-015

Hodgens

Real Estate Property which consists of the surface only of all that certain tract or parcel of land, situate in Marion County, Kentucky, said parcel of land being more particularly bounded and described as follows:

SITUATED about 8 miles northeast of Lebanon, in Marion County, Kentucky, and thus described:

Tract One:

BEGINNING at a stone corner to Hill and Johnson, marked "B" on plat; hence N. 2 E 173.40 poles to Hill's corner; thence S. 87 1/2 E. 153.16 poles to the center of the pike; thence S. 26 E. 23 poles to a stone; thence N. 87 1/2 W. 152.52 poles to stone; thence S. 10.8 poles to the beginning, containing 30 acres, more or less, and being known as the Home Farm of Charlie Hill.

Tract Two:

BEGINNING at a black oak corner to Hill; thence with his line S. 82 E 57 poles and 16 links to a stone in McElroy Brothers line corner to Hill; thence with said line S. 3 1/2 W 147 poles and 3 links to stone in said line corner to R. N. Lanham; thence with his line N. 88 1/2 W 64 poles and 7 links to a stone corner to Lanham, Harmon and Rollins, thence N. 6 1/2 E 153 2/5 poles to the beginning, containing 56 1/2 acres and 22 square poles, more or less.

Tract Three:

Situated on the waters of Pleasant Run, BEGINNING at a stone corner to Rollins heirs; thence N. 2 1/2 E. 569 poles to a stone in Chas. Hill line, thence N. 89 1/2 W. 53.26 poles to stone in Simms line corner to said Hill; thence with Sims line S. 4 W. 488 poles to a stone 2 feet north of an ash tree corner to Rollins heirs; thence S. 82 1/2 E. 55.6 poles to the beginning, containing 17 acres, 3 roods and 25 poles, more or less.

Tract Four:

BEGINNING at the Knob Lick Road, thence west to the land of or formerly owned by Lucas Moore; thence north to the lands of John Simms; thence east to Simms' line; thence north to Simms; thence east to the beginning, containing 19-3/5 acres, more or less.

Tract Five:

BEGINNING at a stone corner to Sarah Adams of color; thence across the field running N. 89 W. 49.36 poles to stone in line of Jno. Simms, thence with said Simms N. 4 1/2 E. 29.6 poles to stone corner to same, thence N. 1 W. 27 poles to the beginning, containing 8 1/2 acres, more or less.

ALSO, THE FOLLOWING DESCRIBED PROPERTY:

A certain Tract of Parcel of Land situated in Marion County, Kentucky, and upon the Knob Lick Road and near St. Ivo's Catholic Church and bounded as follows:

BEGINNING at a stake in center of said road, corner to Charles Hill, thence with center of road as it meanders N. 26 W. 17 poles, N 33 1/2 W. 16 poles, N 31 1/2 W. 21.6 poles to a stake in center of road, a division corner to Pat Brady in W. L. Smith line; thence S. 3 3/4 E 46.8 poles to a stake in W. L. Smith line, corner to Charles Hill, thence S. 89 3/4 E. 91.6 poles to the beginning, containing twenty-three acres and thirty-eight square poles, as surveyed by F. R. Neale, Surveyor, on April 11, 1912.

Being the same property conveyed by Deed dated December 31, 1986, and recorded in Deed [Book 143, Page 262](#), from Robert T. Hodgen and Juanita H. Hodgen, husband and wife, unto Robert T. Hodgen, Jr., and Sherri H. Hodgen, husband and wife, for their joint lives and at the death of either of them, to the survivor in fee simple, their heirs and assigns forever.

Parcel No.: 070-005

ALSO

All that portion of land lying in Marion County, Kentucky of the following described property:

Certain Tracts or Parcels of Land located on the Barber's Mill Turnpike, partly in Marion County and partly in Washington County, Kentucky, and bounded and described as follows:

TRACT #1: Beginning at a stone in the Springfield and Knob Lick Road, to corner Thomas W. Brown; thence S 21 E 48 3/4 poles to a stone in said Road, corner to said Brown; thence S 89 W 61 1/2 poles to a stone in William Simpson's line; thence with his line N 7 W 44 1/2 poles to the middle of the Barbour Mill or Lebanon and Mackville turnpike; thence N 72 E 12 poles; thence S 88 1/2 E 37 3/4 poles to the Beginning, containing about 20 acres.

TRACT No. 2. Beginning at a point in the center of pike, corner (1) to Spalding, (at a sugar tree) land; thence S 5 E 112 poles to a stone corner (2); thence S 89 W 50 1/2 poles to a stone, corner (3); thence N 1 W 11 1/3 poles to a stone, corner (4); thence N 88 1/2 W 56 3/5 poles to a stone, corner (5); thence S 5 W 52 3/5 poles to corner (6); thence N 87 W 70 3/5 poles to a stone, corner (7) thence N 5 W 94 2/5 poles to a point in the center of pike and in McElroy's line; thence with the center of turnpike as it meanders N 64 E 24 3/4 poles to (x) Simms and McElroy's corner; same course continued making whole line 96.6 poles to corner (9), S 89 E 52 poles to (10), N 82 E 9 poles to (11), N 73 1/2 E 8 poles to (12), N 69 1/2 E 18.2 poles to the Beginning, containing One Hundred and Fifteen (115) Acres.

Being the same property described in the Deed from J. W. Reynolds and Alice Reynolds, his wife, Fannie Lou Hardin and Orland Hardin, her husband, Irvin Lee Reynolds and Dorothy Reynolds, his wife and R. Mitchell Reynolds and Alma Reynolds his wife to Robert Thomas Hodgen, Jr. and Sherri Hall Hodgen, husband and wife dated January 3, 1980 and recorded January 4, 1980 in Book 136, Page 134, as Document No. 180004 in the County Clerk's Office of Washington County, Kentucky.

Parcel No.: 26-020 (portion)

Luckett

Real Estate Property which consists of the surface only of all that certain tract or parcel of land, situate in Marion County, Kentucky, said parcel of land being more particularly bounded and described as follows:

BEGINNING at iron post, corner to Clarence Murphy and the Old Springfield and Lebanon Road; the with road S. 43° 35 minutes E. 585 feet to iron post; then S. 34° 50 minutes E. 90 feet to iron post; then S. 24° 20 minutes E. 85 feet to iron post; then passing tenant house S. 19° 50 minutes E. 392 feet to iron post, northwest corner of yard; then S. 23° 05 minutes E. 372 feet to iron post at cross fence; then S. 22° 20 minutes E. 564 feet to iron post at Murphy passway; then leaving road N. 60° 20 minutes E. 459 feet to iron post; then N. 59° 20 minutes E. 674.5 feet to iron post; then N. 57° 50 minutes E. 983 feet to iron post at dead elm snag; then continuing with fence N. 55° 30 minutes E. 1369 feet to iron post at edge of branch; then N. 60° 30 minutes W. 1059.3 feet to iron stake at black oak; then N. 75 W. 43 feet to iron post; then S. 75 W. 261 feet to iron post at elm; then S. 52 W. 66 feet to iron post at hickory; then S. 35 W. 66 feet to iron post at hickory; then S. 47° 30 minutes W. 304 feet to iron post at 12-inch walnut; then S. 45 W. 613 feet to iron post; then N. 50 W. 1048 feet to iron post; then N. 20 E. 116 feet to cedar and iron post at edge of Clarence Murphy lane, then with lane N. 81 W. 86 feet to iron post at 8-inch ash; then S. 89 W. 101 feet to iron post at 9-inch cedar; then S. 86° 30 minutes W. 175 feet to iron post at 14-inch buckeye; then S. 68 W. 69 feet to 6-inch buckeye; then S. 51 W. 28 feet to iron post at 18-inch black oak; then S. 47 W. 99 feet to iron post; then S. 43 W. 88 feet to iron post under power line; then S. 43° 30 minutes W. 212 feet to iron post under power line; then S. 43° 30 minutes W. 259 feet to the beginning, containing 102.51 acres, as per survey of C. M. Probus, Registered Land Surveyor, dated August 28, 1971, and subject to all legal highways and easements for transmission lines.

HOWEVER, THERE IS EXCEPTED from the foregoing the following described portion thereof conveyed by Harold B. Hundley to Raymond A. Nally, et ux., by deed dated June 10, 1975 of record in Deed [Book 102, Page 244](#) in the Marion County Court Clerk's office:

A PARCEL of land, lying in Marion County, Kentucky, and fronting on the Laura P. Lavit Lane and more particularly described as follows:

BEGINNING at an iron pin corner to Charles Guilfoil at the right of way of said lane; thence N. 61° E. 475 feet along Guilfoil's line to an iron pin corner to Harold B. Hundley; thence with Hundley N. 40¹/₄° W. 145 feet to an iron pin and S. 61° W. 425 feet to an iron pin at the right of way of said lane; thence S. 21° E. 145 feet along said right of way to the beginning containing 1.50 acres, more or less.

Being the same property conveyed by Deed dated August 22, 1988, and recorded in Deed [Book 148, Page 444](#), from Harold B. Hundley unto Edward Garland Luckett, single.

Parcel No.: 064-001A

Mattingly

Subject Property consists of the surface only of all that certain tract or parcel of land, situate in Marion County, Kentucky, more particularly bounded and described as follows:

A certain tract of land located in Marion County, Kentucky on the North side of Horan Lane approximately 1 1/2 miles East of Springfield Highway – KY 555 and being tract 2 of the Sylvester Brown Division and more particularly described as follows:

BEGINNING at a fence post in the North Horan Lane right of way and corner with Edgar R. and Teresa Mattingly and Michael Mattingly (DB 116, PG 286); thence leaving the Horan Lane right of way and running with the fence Mattingly line N 11 degrees 58' 19" E 765.27 feet to a 20" elm; thence N 83 degrees 24' 22" W 56.58 feet to a 20" elm; thence N 13 degrees 43' 10" E 342.75 feet to a 28" shagbark hickory; thence S 84 degrees 27' 20" E 1029.09 feet to a steel pin in the fence line next to a 25" elm and corner with tract 1 of the Sylvester Brown division; thence leaving the Mattingly line and running with a new division line and tract 1 line S 10 degrees 12' 45" W 387.06 feet to a steel pin; thence S 22 degrees 37' 37" W 757.33 feet to a steel pin in the north Horan Lane fence right of way, also located N 86 degrees 03' 44" W 55.00 feet from a fence post on the west side of a driveway; thence leaving the new division line and Sylvester Brown division tract 1 line and running with the fenced Horan Lane right of way N 88 degrees 35' 24" W 41.23 feet to a fence post; thence N 86 degrees 08' 38" W 252.90 feet to a steel pin and corner

with David Allan Brown (DB 143. PG 236); thence leaving the Horan Lane right of way and running with the David Allan Brown line N 15 degrees 55' 27" E 147.57 feet to a steel pin; thence N 81 degrees 04' 33" W 147.57 feet to a steel pin; thence S 15 degrees 55' 27" W 147.57 feet to a fence post in the north Horan Lane right of way; thence leaving the David Allan Brown line and running with the fence Horan Lane right of way N 81 degrees 32' 45" W 219.39 feet to a fence post; thence N 84 degrees 35' 54" W 192.63 feet to the point of beginning, containing 24.0 acres by survey of Sam S. Anzelmo LS #2688, dated May 18, 1993, attached and made a part herein. The tract described above is subject to all recorded and unrecorded utility easements.

Parcel No.: 063-008-02

ALSO

Being Tract #1 containing 133.26 +/- acres of the Mattingly Family Farms – Horan Lane Division, as recorded in Plat Cabinet C, Slide 896, in the Office of the Marion County Court Clerk, Kentucky.

Being the same property conveyed to William Cole Mattingly, single, by deed dated May 16, 2019, from Michael W. Mattingly and Pam Marks, Trustees of the Edgar Mattingly and Teresa A. Mattingly Revocable Living Trust Agreement dated September 8, 1994, recorded in Deed [Book 330, Page 312](#) Marion County, Kentucky.

Parcel No.: 063-021.

Murphy Family Trust

TRACT 1:

Being Tracts 3 and 4 of the Harold McMichael Property Division as per plat thereof of record in [Plat Cabinet 1, Slide 130](#), in the Marion County Court Clerk's Office.

Being a portion of the real property conveyed by Deed dated July 18, 2016, and recorded in [Volume 313, Page 459](#), from Elaine G. Murphy, a/k/a Mary Elaine Murphy, to Clarence W. Murphy, Jr., Trustee of the Murphy Family Trust.

Tax Map/Parcel: 064-001-03

TRACT 2:

Parcel 1:

Situated in Marion County, Kentucky and lying on the waters of Cartwright's Creek in said County and bounded as follows:

Beginning at a stone corner to Mrs. Dick Spalding, thence N. 23 1/2 E. 26 poles to a stake, corner to John Thompson;

THENCE with his line N. 73 1/4 W. 7.28 poles to a stake, N. 23 1/4 E. 81.32 poles to a stake, S. 69 3/4 E. 81.64 poles to a stone, N. 33 3/4 E. 93.48 poles to an ash tree, N. 27 1/2 E. 116.92 poles to a stake corner to said Thompson and in Alfred Board's line;

THENCE with Board's line S. 51 3/4 E. 85.50 poles to a hickory tree, corner to Samuel Spalding;

THENCE with his line S. 65 1/2 E. 11.24 poles to a stake corner to same;

THENCE with the line of same and Mrs. Richard Spalding S. 42 3/4 W. 224.32 poles to a stake near a branch, corner to Mrs. Richard Spalding;

THENCE down said branch S. 76 1/4 W. 17.32 poles, S. 72 1/2 W. 15.05 poles S. 72 1/2 W. 15.04 poles to a hickory tree, corner to same, N. 60 W. 4.36 poles to a sugar tree on the South side of a branch, corner to same, leaving the branch S. 43 1/2 W. 62.84 poles to a stake, corner to same;

THENCE N. 51 W. 63.12 poles to the beginning, containing 163 acres and 60 poles, more or less.

Parcel 2:

Beginning at a post in Averitt line and yard to tenant house;

THENCE with Averitt line N. 54 1/4 E. 75.15 rods to stake in branch;

THENCE with Averitt line N. 60 1/2 W. 60.2 rods to corner to Averitt;

THENCE N. 40 1/2 E. 90 rods to old corner of Charles Harmon;

THENCE S. 80 1/2 E. 144.8 rods to old corner of J.C. Mann;

THENCE S. 44 W. 40.8 rods to post;

THENCE S. 73 1/2 E. 67.6 rods to stone;

THENCE S. 37 1/2 W. 153.4 rods to hickory corner to Spencer Clark;

THENCE N. 10 W. 1.25 rods to a dead tree;

THENCE with fence line N. 48 W. 75.45 rods to corner post;

THENCE S. 55 W. 25.57 rods to walnut in fence line;

THENCE S. 48 W. 15.75 rods to hickory in fence line;

THENCE S. 45 W. 20.12 rods to post in fence line;

THENCE S. 54 W 5.88 rods to corner post;

THENCE N. 26 1/2 W. 17.9 rods to post;

THENCE N. 45 W. 28.97 rods to post;

THENCE S. 51 W. 6.6 rods to corner post; thence N. 42 1/2 W. 20.6 rods to the beginning, containing 180 acres, more or less.

ALSO an easement for a farm road joining the above tract and running to the Old Lebanon-Springfield Highway, beginning S. 54 1/4 W. 7.95 rods to an elm;

THENCE S. 57 3/4 W. 60.8 rods to a post;

THENCE S. 59 W. 40.8 rods to a post;

THENCE S. 60 W. 28.4 rods to a stake near culvert corner to Ed Winstead in line of Old Lebanon and New Market Road;

THENCE with the road S. 22 1/2 E. 30 feet, N. 60 E. 28.4 rods, N. 59 E. 40.8 rods, N. 57 3/4 E. 60.8 rods, N. 54 1/4 E. 7.95 rods, N 42 1/2 W. 30 feet to the point of beginning

EXCEPT THEREFROM from the foregoing and not conveyed the following portion sold to William Chad Murphy and Lena Murphy, husband and wife, by deed dated August 10, 2007, and of record in [Volume 266, Page 472](#), and described as follows:

A description of a parcel of land of Clarence W. Murphy and Elaine G. Murphy, [Volume 144, Page 264](#) and [Volume 189, Page 747](#), Marion County, Kentucky. A rural tract located on Horan Lane and more particularly described as follows: An iron pin called for shall mean a monument consisting of a 5/8" x 18" rebar with yellow identifier cap stamped. L.S. Hardin PLS 527. Beginning at an iron pin, set this survey in the west R/W line of Horan Lane, 15 ft. West of the center line of Horan Lane and 1 mile west of Barbers Mill Road at a corner between Clarence W. Murphy, DB 144, PG 264 and Maurice Tatum and Susan Tatum, DB 150, PG 570;

THENCE leaving the west R/W line of Horan Lane, crossing Casey Branch, with the fenced line between Murphy and Tatum, S 43 deg. 13' 53" W 138.66 feet to a twin white oak; S 51 deg. 25' 27" W 223.84 ft. to a 16" hickory; S 53 deg. 32' 24" W 269.42 ft. to a 12" hickory; S 54 deg. 37' 31" W 210.98 feet to an iron pin set this survey; S 56 deg. 15' 17" W 179.44 feet to an iron pin set this survey at the base of a hickory in the line of Clarence W. Murphy and Elaine G. Murphy, DB 189, PG 747;

THENCE leaving Murphy, DB 144, PG 264, with the fenced line between Murphy DB 189, PG 747 and Tatum, S 63 deg. 07' 45" E 173.03 feet to a 26" ash; S 01 deg. 00' 42" W 10.19 feet to an iron pin set this survey by a 12" cedar; S 41 deg. 55' 27" W 352.10 feet to an iron pin set this survey at the juncture of a cross-fence of Murphy;

THENCE leaving Tatum, with new lines across Murphy, DB 189, PG 747, with the cross-fence, N 75 deg. 26' 33" W 207.10 feet to an iron pin set this survey; S 76 deg. 58' 29" W 90.15 feet to an iron pin set this survey; N 83 deg. 45' 54" W 61.94 feet to an iron pin set this survey; N 75 deg. 55' 09" W 258.08 feet to a treated post;

THENCE, leaving the cross-fence, continuing with new lines across Murphy, N 33 deg. 37' 56" E 319.13 feet to an iron pin set this survey; N 52 deg. 44' 29" E crossing the tract line into Murphy, DB 144, PG 264 at 305 feet for a total distance of 547.37 feet to an iron pin set this survey;

THENCE continuing with new lines across Murphy DB 144, PG 264, each call to an iron pin set this survey, S 41 deg. 29' 53" E 280.24 feet, N. 54 deg. 01' 29" E 483.55 feet; N 37 deg. 26' 37" E 95.88 feet; N 16 deg. 22' 43" W 115.23 feet; N 24 deg. 43' 13" W 210.56 feet; N 21 deg. 36' 21" W 340.56 feet; N 46 deg. 40' 11" E, crossing Casey Creek 107.17 feet to a point in the west R/W line of Horan Lane, 15 feet west of the center line;

THENCE with the west r/w line of Horan Lane, S 40 deg. 27' 12" E 53.71 feet; S 38 deg. 06' 06" E 269.09 feet; S 33 deg. 05' 58" E 133.44 feet; S 30 deg. 50' 01" E 143.50 feet; S 37 deg. 47' 22" E 101.38 feet to the beginning. Containing 11.462 acres per survey performed March 7-8, 2007 by L.S. Hardin, Licensed Professional Surveyor No. 527. A plat of this tract is on file at the office of the Marion County Court Clerk in Plat Cabinet 3, Slide 471.

Being the same property conveyed to Clarence W. Murphy, Jr., Trustee, of the Murphy Family Trust, by deed from Elaine G. Murphy, a/k/a Mary Elaine Murphy, dated July 18, 2016, and recorded in [Volume 313, Page 459](#).

Tax Map/Parcel: 063-017

TRACT 3:

Begin at iron post corner Highway 55 Radio Station Road, then with Road S. 63 E. 260 feet to hackberry bush;

THENCE S. 50 E. 336 feet to center of branch below bridge;

THENCE S. 38 degrees 30 minutes E. 675 feet to honey locust bush;

THENCE S. 26 E. 170 feet to small black locust;

THENCE S. 16 degrees 45 minutes E. 782 feet to lower end of culvert;

THENCE S. 19 E. 565 feet to twin ashes southeast side of branch; corner Radio Station lot;

THENCE with same S. 71 W. 355 feet to center of Cartwright Creek;

THENCE leaving creek with Dr. Cook fence N 80 W. 80 feet to post;

THENCE N. 45 W. 214 feet to post; then N. 17 W. 528 feet to post;

THENCE N. 84 W. 167.5 feet to post corner original Dr. Cook tract and recent purchase;

THENCE with old fence line N. 11 degrees 30 minutes W. 813 feet to 3-inch elm in fence;

THENCE N. 18 W. 1,009 feet with fence to beginning, containing 27.37 acres, more or less as surveyed by C. M. Probus, Registered Land Surveyor #727 dated October 10, 1985.

Being a part of the same property conveyed to Clarence W. Murphy, Jr., Trustee, of the Murphy Family Trust, by deed from Elaine G. Murphy, a/k/a Mary Elaine Murphy, dated July 18, 2016, and recorded in [Volume 313, Page 459](#).

Parcel No.: 064-001B

C.W. Murphy, Jr.

Tract 1: Located in Marion County, Kentucky about one mile east of St. Highway #55 on Horan Lane and described as follows:

BEGINNING at a point in the edge of said Horan Lane at a corner to Max Avritt;

THENCE with the fence on the edge of said road S. 49 1/2 E. 10.73 chains, to a point in the fence on the edge of the road;

THENCE leaving the road with a new line of division N. 48 E. 2.45 chains to a locust tree, N. 57 E. 0.83 chains to a locust tree; N. 26 E. 1.28 chains to a locust tree, N. 12 E. 4.33 chains to a locust tree, N. 11 E. 3.78 chains to a walnut tree, N 52 1/2 E. 72.22 chains to a stake, N. 5 E. 3 chains to a stake in line of Max Avritt;

THENCE with the line of Avritt S. 83 1/2 W. 7.60 chains to post, S. 51 W. 5.40 chains to elm tree, S. 44 W. 3.83 chains to post, S. 69 1/2 W. 2.24 chains to the point of beginning.

Containing 15 acres, as surveyed by James Goatley, Registered Land Surveyor No. 1119 on September 19, 1978.

Being the same property conveyed by Deed dated July 26, 2019, and recorded in [Volume 331, Page 506 \(VD\)](#), from Clarence W. Murphy, Jr., and Melissa Murphy, husband and wife, to Clarence W. Murphy, Jr., and Melissa Murphy, husband and wife, jointly and equally, for and during their joint, natural lives, with remainder to the survivor of them, the heirs and assigns of such survivor.

Tax Map/Parcel: 063-007

SNS Rentals

Certain parcels of land located in Marion County, Ky. near the southeast junction of State Road 1404 and State Road 2758, and being more particularly described as follows:

Combined Tracts 11 and 12 (containing a total of 14.70 acres +/-);

Combined Tracts 13 and 14 (containing a total of 19.66 acres +/-);

Combined Tracts 15 and 16 (containing a total of 6.62 acres +/-);

Tract 17 (containing 09.80 acres +/-);

Tract 18 (containing 13.43 acres +/-);

Combined Tracts 19 through 29 (containing 58.94 acres, +/-);

Combined Tracts 30 through 34 (containing 47.08 acres +/-); and

Fox Run Lane (containing 1.54 acres) of the Fox Run Farm Subdivision, a revised plat of which appears in [PC 4, Slide 836](#), Marion County Court Clerk's Office.

LESS AND EXCEPT:

Combined Tracts 11 and 12, containing total of 14.70 acres, more or less; Combined Tracts 13 and 14, containing a total of 19.66 acres, more or less; and Combined Tracts 15 and 16, containing a total of 6.62 acres, more or less, as per the Amended Plat of the Fox Run Subdivision of record in Plat Cabinet 4, Slide 836.

AND BEING the same real estate conveyed to David Paul Sandusky and Rhonda M. Sandusky, his wife, by SNS Rentals, LLC, a Kentucky limited liability company, by Deed dated March 21, 2018, recorded March 22, 2018 in Deed [Book 323, Page 267](#), Office of the Marion County Clerk, Marion County, Kentucky.

Map/Parcel No.: 070-003

Real Estate Property which consists of the surface only of all that certain tract or parcel of land, situate in Marion County, Kentucky, said parcel of land being more particularly bounded and described as follows:

Unless otherwise stated, any monument referred to herein as a "set steel stake" is an eighteen inch, number four rebar with a plastic cap stamped "DABNEY 3319" and any monument referred to herein as a "set steel stake reference monument" is an eighteen inch, number four rebar with a plastic cap stamped "Reference Monument KY PLS 3319". All bearings stated herein are referred to Geodetic North as observed November 26, 2019 by G.P.S. observation.

Beginning at an existing steel stake without an identification cap on the east right of way of Barbers Mill Road (40' right of way based on existing surveys; state road) and being a corner common to Christopher E. Cook and Mary E. Cook (Deed Book 265 Page 561).

THENCE with the east right of way of Barbers Mill Road, North 32 degrees 12 minutes 34 seconds East for a distance of 19.41 feet, North 16 degrees 58 minutes 51 seconds East for a distance of 53.17 feet, North 09 degrees 23 minutes 37 seconds East for a distance of 28.57 feet to a set steel stake.

THENCE dividing the lands of Eugene Campbell and Cynthia Campbell (Deed Book 150 Page 68), South 80 degrees 36 minutes 23 seconds East for a distance of 100.39 feet to a set steel stake, South 07 degrees 21 minutes 39 seconds West for a distance of 278.70 feet to a set steel stake, South 66 degrees 57 minutes 47 seconds East for a distance of 468.91 feet to a set steel stake, North 84 degrees 36 minutes 54 seconds East for a distance of 387.94 feet to a set steel stake, South 31 degrees 59 minutes 04 seconds East for a distance of 502.67 feet to a set steel stake, South 84 degrees 19 minutes 00 seconds East for a distance of 240.45 feet to a set steel stake on the west right of way of Gene Campbell Road.

THENCE with the west right of way of Gene Campbell Road (30' right of way based on existing surveys; county road), South 29 degrees 02 minutes 16 seconds East for a distance of 202.23 feet, South 31 degrees 41 minutes 01 seconds East for a distance of 170.79 feet, South 34 degrees 59 minutes 42 seconds East for a distance of 227.59 feet, South 32 degrees 16 minutes 31 seconds East for a distance of 90.81 feet, South 28 degrees 26 minutes 29 seconds East for a distance of 130.61 feet, South 20 degrees 46 minutes 13 seconds East for a distance of 75.26 feet, South 13 degrees 11 minutes 15 seconds East for a distance of 53.04 feet, South 04 degrees 03 minutes 57 seconds East for a distance of 51.10 feet, South 02 degrees 25 minutes 14 seconds West for a distance of 276.08 feet to a set steel stake and being a corner common to Kevin Leake and Ellen Leake (Deed Book 283 Page 823).

THENCE with the line common to Kevin Leake and Ellen Leake (Deed Book 283 Page 823), North 85 degrees 25 minutes 07 seconds West for a distance of 622.84 feet to an existing steel stake with Plastic Cap Stamped T.A. PHIPPS 2488, South 02 degrees 10 minutes 29 seconds West for a distance of 280.15 feet to an existing steel stake without an identification cap in the line common to William Todd Hardin and Jill Lenora Hardin (Deed Book 208 Page 116).

THENCE with the line common to William Todd Hardin and Jill Lenora Hardin (Deed Book 208 Page 116), North 87 degrees 34 minutes 34 seconds West for a distance of 1043.86 feet to an existing wood gate post.

THENCE continuing with the line common to William Todd Hardin and Jill Lenora Hardin (Deed Book 208 Page 116), North 12 degrees 49 minutes 22 seconds East, passing a set steel stake reference monument at 10.00 feet, for a total distance of 1236.95 feet to an existing steel stake without an identification cap and being a corner common to James Troy Mattingly and Glenda Ann Mattingly (Deed Book 285 Page 816).

THENCE with the line common to James Troy Mattingly and Glenda Ann Mattingly (Deed Book 285 Page 816), North 12 degrees 45 minutes 28 seconds East for a distance of 207.38 feet to an existing steel stake with Plastic Cap Stamped Edwards 2850, North 85 degrees 08 minutes 35 seconds West for a distance of 578.65 feet to an existing steel stake without an identification cap and being a corner common to James E. Tucker Jr. (Deed Book 330 Page 816) and Christopher E. Cook and Mary E. Cook (Deed Book 265 Page 561).

THENCE with the line common to Christopher E. Cook and Mary E. Cook (Deed Book 265 Page 561), North 05 degrees 39 minutes 42 seconds East for a distance of 650.45 feet to a set steel stake, North 06 degrees 28 minutes 03 seconds West for a distance of 17.37 feet to an existing steel post, North 47 degrees 40 minutes 03 seconds West for a distance of 11.52 feet to the Point of Beginning. Together with and subject to covenants, easements and restrictions of record. Said property contains 2,253,296.53 Square Feet, 51.7286 acres more or less, as per survey of Donald A. Dabney, PLS 3319, dated December 9, 2019, and recorded in Plat Cabinet 4, Slide 921, and referenced in Deed Book 333, page 613, in the Marion County Clerk's Office.

Being the same property conveyed by Deed dated December 12, 2019, and recorded in Deed [Book 333, Page 614](#), from Eugene Campbell, a/k/a Robert Eugene Campbell, and Cynthia Campbell, a married couple, to SNS Rentals, LLC, a Kentucky Limited Liability Company.

LESS AND EXCEPT a tract or parcel of land conveyed to Garland Campbell and Ruth Campbell, his wife, jointly, by Deed dated May 19, 1986, recorded May 19, 1986 in [Book 141, Page 72](#), Marion County, Kentucky, and more particularly described as follows:

Located in Marion County, Kentucky about 3 ½ miles Northwest of Lebanon, on the Barbour's Mill Road and BEGINNING at a point in the center of said Barbour's Mills Road,

THENCE with a new line leaving the road N. 89 E. 150 feet to a stake,

THENCE N. 1 W. 150 feet to a stake,

THENCE s. 89 W. 150 feet to a point in the center of the Barbours Mills Road,

THENCE with the center of the road S. 1 E. 150 feet to the point of beginning, containing 22,500 square feet or 0.516 acres as surveyed by James Goatley, Registered Land Survey No. 1119 on June 8, 1977.

AND LESS AND EXCEPT a tract or parcel of land conveyed to Eugene Campbell and Cynthia Campbell, his wife jointly, by Deed dated May 19, 1986, recorded May 19, 1986 in [Book 141, Page 74](#), Marion County, Kentucky, and more particularly described as follows:

Located in Marion County, Kentucky, about 3 ½ miles North of Lebanon on the Bryan Burdette Road about 1,000 feet from the Barbours Mill Road and BEGINNING at a point in the center of the road opposite the end of the yard fence at the North side of the garage,

THENCE leaving the road with the yard fence N. 89 W. 49 feet to post S. 4 W. 57 feet to post, S. 89 W. 59.5 feet to post, S. 4 W. 95.5 feet to post, S. 89 E. 138 feet to point in center of said Bryan Burdette Road and

THENCE with center of said Road N. 7 W. 157 feet to the Point of Beginning, containing 0.44 acres as surveyed by James Goatley, Registered Land Surveyor No. 1119 made May 14, 1986, a plat of survey being attached hereto as a part hereof.

AND LESS AND EXCEPT a tract or parcel of land conveyed to Ruth Campbell, by Deed dated October 18, 1989, recorded October 23, 1989 in [Book 152, Page 412](#), Marion County, Kentucky, and more particularly described as follows:

Tract 1:

A certain tract of land on the Shortline Turnpike in Marion County, Kentucky, BEGINNING at a stake in the center of said pike corner to George Campbell,

THENCE with his line S. 58 E. 14 poles to a double walnut, S. 67 E. 12-1/5 poles to a large elm,

THENCE S. 86 E. 9-1/4 poles to a walnut,

THENCE N. 79 E. 27-1/2 poles to a persimmon,

THENCE S. 7 W. 41-3/4 poles to a stone in George Campbell's line, also Clarence Harmon's corner,

THENCE with his line N. 81 W. 94 poles to the center of the Shortline Turnpike, and with same N. 48 E. 38 poles, N. 42 E. 14 ½ poles to the beginning, containing 17-1/3 acres, more or less.

Tract 2:

A tract parcel of land situated in Marion County, Kentucky about 3 ½ miles North of Lebanon, Marion County, Kentucky, on the Barbours Mill Road and BEGINNING at a point in the center of the said road opposite the end of the yard fence on the South side of the residence;

THENCE leaving the road with the plank fence S. 81 deg. 30 min. E. 254 feet to post N. 8 deg. 30 min. E. 154 feet to post, N. 1 W. 252 feet to post, N. 3 E. 366 feet to post, N. 82 W. 213 feet to a point in the center of the said road,

THENCE with the center line of said road S. 1 W. 216 feet, S. 8 W. 551 feet to the point of beginning, containing 4 acres, more or less as per survey of James Goatley, Registered Land Surveyor No. 1119 made on January 19, 1989.

ALSO LESS AND EXCEPT a tract or parcel of land conveyed to Kevin Leake and Ellen Leake, his wife, by Deed dated October 25, 2010, recorded October 26, 2010 in [Book 283, Page 823](#), Marion County, Kentucky and more particularly described as follows:

A certain parcel of land in the Commonwealth of Kentucky, County of Marion, being a portion of that tract of land conveyed to Eugene Campbell as recorded in Deed Book 150, Page 68. All set re-bars are 5/8" x 18" with a blue identification cap stamped #2488 and being more particularly described as follows:

BEGINNING at a re-bar set on the West side of Gene Campbell Road (30' R/W), a corner with Kevin Leake (Deed Book 139, Page 71), said re-bar is located approximately one half (1/2) of a mile South from the Washington County line, said re-bar is located N 78° 46' 57" E, a distance of 133.31' from the corner of a shop on the Kevin Leake home tract;

THENCE N82°11'50" W, a distance of 208.07' with Leake to set re-bar at a fence corner, corner with William Hardin (Deed Book 208, Page 116);

THENCE N82°11'50"W, a distance of 414.76' with Hardin to a set re-bar;

THENCE N05°23' 46"E, a distance of 280.00' leaving with a new division line to a set re-bar;

THENCE S82°11'50"E, a distance of 622.84' with same to a re-bar set on the West side of Gene Campbell Road;

THENCE S05°23'46" W, a distance of 280.00' with said road to the Point of Beginning, said described tract containing 4.00 acres by a survey performed by T. A. Phipps, completed this 8th day of October, 2010.

Parcel No.: 070-035 and 070-035-01

Thompson

Being Tract 2 of the McMichael Farm Division as per plat thereof of record in [Plat Cabinet 2, Page 308A](#), in the Marion County Court Clerk's Office.

And being a part of the same property conveyed to James W. Thompson and Ailen B. Thompson, his wife (a one-half undivided interest) and Samuel Terry Tatum and Therese B. Tatum, his wife (a one-half undivided interest) by Deed dated January 6, 2003 and of record in Deed Book 233, at Page 321 in the Marion County Court Clerk's Office.

The above described property is subject to the environmental conditions, restrictions, covenants, conditions and right of way agreement for roadway as shown in Deed of record in Deed [Book 233, Page 321](#) in the Marion County Court Clerk's Office.

EXCEPT THEREFROM a parcel or tract of real estate conveyed to George W. Glazebrook, Sr., single, and David C. Clark and Maura H. Clark, his wife by Deed dated January 6, 2003, recorded January 7, 2003 in [Book 233, Page 273](#), Marion County, Kentucky, and more particularly described as follows:

Being Tracts 3 & 4 of the McMichael Farm Division as per plat thereof of record in Plat Book 2 at Slide 308, in the Marion County Court Clerk's Office.

And being a part of the same property acquired by Harold D. McMichael and Janice A. McMichael, jointly and equally, with right of survivorship, by Deed dated May 23, 1977 of record in Deed [Book 110, Page 511](#) in the Marion County Court Clerk's Office. The said Harold D. McMichael died January 20, 2002, whereupon title to said property vested solely in the said Janice A. McMichael.

ALSO EXCEPT THEREFROM a parcel or tract of real estate conveyed to Ricky Bradshaw, Sr., and Loretta T. Bradshaw, his wife, and Charles H. Bradshaw, single, and Patrick Michael Bradshaw, single, by Deed dated January 6, 2003, recorded January 8, 2003 in [Volume 233, Page 280](#), Marion County, Kentucky and more particularly described as follows:

Being Tract 1 of the McMichael Farm Division as per plat thereof of record in Plat Book 2 at Slide 308, in the Marion County Court Clerk's Office.

And being a part of the same property acquired by Harold D. McMichael and Janice A. McMichael, jointly and equally, with right of survivorship, by Deed dated May 23, 1977 of record in Deed Book 110 at Page 511 in the Marion County Court Clerk's Office. The said Harold D. McMichael died January 20, 2002, whereupon title to said property vested solely in the said Janice A. McMichael.

AND ALSO EXCEPT THEREFROM a parcel or tract of real estate conveyed to Clarence W. Murphy and Elaine G. Murphy, his wife, by Deed dated May 30, 1997, recorded June 2, 1997 in [Volume 193, Page 24](#), Marion County, Kentucky, and more particularly described as follows:

Being Tracts 3 and 4 of the Harold McMichael Property Division as per Plat thereof of record in Plat Cabinet 1, Slide 130, in the Marion County Court Clerk's Office.

And being a part of the same property acquired by Harold D. McMichael and Janice A. McMichael, his wife, by Deed dated May 23, 1977 of record in Deed Book 110 at Page 511 in the Marion County Court Clerk's Office.

Parcel No.: 064-002

Blair

Subject Property consists of the surface only of all that certain tract or parcel of land, situate in Madison County, Kentucky, more particularly bounded and described as follows:

Being Tract 4 of the McMichael Farm Division as per plat thereof of record in Plat Cabinet 2, Slide 308, in the Marion County Court Clerk's office.

Being the same real property conveyed by deed dated February 7, 2004, and recorded in Deed [Book 242, Page 137](#), from George W. Glazebrook, Sr., single, and David C. Clark and Maura H. Clark, his wife, unto Mollie Sullivan and Jeremy Blair, jointly and equally, their heirs and assigns, forever.

EXCEPT THEREFROM a parcel or tract of real estate conveyed to Clarence W. Murphy and Elaine G. Murphy, his wife, recorded in [Volume 193, Page 24](#), Marion County, KY, and more particularly described as follows:

Being Tract 3 and 4 of the Harold McMichael Property Division as per Plat thereof of record in Plat Cabinet 1, Page 130, in the Marion County Court Clerk's Office.

And being a part of the same property acquired by Harold D. McMichael and Janice A. McMichael, his wife, by Deed dated May 23, 1977 of record in Deed [Book 110, Page 511](#), in the Marion County Court Clerk's Office.

ALSO EXCEPT THEREFROM a parcel or tract of real estate conveyed to Charles R. Goodin, Jr. and J. Don Goodin, recorded June 2, 1997 in [Book 193, Page 2](#), Marion County, Kentucky, and more particularly described as:

Being Tract 1 and 2 of the Harold McMichael Property Division as per plat, thereof of record in Plat Cabinet 1, Slide 130, in the Marion County Court Clerk's Office.

And being a part of the same property acquired by Harold D. McMichael and Janice A. McMichael, his wife, by Deed dated May 23, 1977 of record in Deed [Book 110, Page 511](#) in said Clerk's Office, and a part of the same property acquired by them by Deed dated May 16, 1997 of record in Deed Book 192, Page 693 therein.

Parcel No.: 064-002-03-04

Grubbs

Real Estate Property which consists of the surface only of all those certain tracts or parcels of land, situate in Marion County, Kentucky, said parcels of land or property hereinafter conveyed includes three tracts or parcels of land located

on Barbour Mill Pike, about 5 miles North of Lebanon in Marion County, Kentucky and near the Marion/Washington County line, and containing 122 acres, more or less, bounded and described as follows:

Tract One:

BEGINNING at a point, corner to land retained by A.T. and J.I. Sanders on the West side of the Barbour Mill Pike, at a fence post, same being the Northeast corner of property now or formerly belonging to Everett Grubbs; thence running South 85 degrees 25' West along a fence and with line of said Grubbs a distance of 527.97 feet to a fence post; thence turning and running South 67 degrees 44' West along a fence a distance of 216.13 feet to fence post; thence turning and running South 79 degrees 57' West along a fence a distance of 277.55 feet to a fence post; thence turning and running South 82 degrees 08' West along a fence a distance of 309.09 feet to a fence post; thence turning and running North 56 degrees 01' West along a fence a distance of 315.12 feet to a fence post; thence turning and running North 88 degrees 31' West along a fence a distance of 381.89 feet to a fence post; thence turning and running South 77 degrees 59' West along a fence a distance of 481.42 feet to a fence post; thence turning and running North 52 degrees 34' West along a fence a distance of 253.62 feet to a 30 inch sycamore, same being a corner to A.T. Sanders and others; thence turning and running North 87 degrees 22' East with line of said Sanders a distance of 2608.88 feet to a fence on the West side of Barbour Mill Pike; thence turning and running South 6 degrees 48' East along a fence on the West side of said Pike a distance of 145.71 feet to the point of beginning.

Tract Two:

BEGINNING at a point at a fence post at the Northwest corner of property now or formerly belonging to Everett Grubbs; thence running North 75 degrees 07' West along a fence and with line of A.T. Sanders and others, a distance of 883.33 feet to a fence; thence turning and running North 71 degrees 08' West with line of said Sanders a distance of 1019.00 feet to a fence on the South bank of a branch; thence turning and running North 82 degrees 55' West with line of said Sanders a distance of 261.36 feet to a stake; thence turning and running South 0 degrees 40' East with line of said Sanders a distance of 640 feet to a fence; thence turning and running South 82 degrees 55' East a distance of 715.36 feet to a fence corner; thence turning and running South 4 degrees 50' West along a fence a distance of 562.65 feet to a fence post at property now or formerly belonging to Hardin; thence turning and running S 72 degrees 42' East along a fence with line of said Hardin a distance of 1028.16 feet to a fence post at South-West corner of property now or formerly belonging to Everett Grubbs; thence turning and running North 22 degrees 50' East along a fence and with line of said Grubbs a distance of 1091.71 feet to the point of beginning.

Tract Three:

BEGINNING at a walnut near fork of branch in field West of Pike, corner to A.T. Sanders and J.I. Sanders; running thence South 64 degrees West 16 1/5 poles to small hickory; thence South 76 degrees West 13 1/2 poles to elm; thence South 63 1/2 degrees West 10 1/2 poles to walnut on West side of branch; thence along the West side of same, North 56 1/2 degrees West 33 poles to buckeye; thence North 89 degrees West 21 1/5 poles to scaly bark hickory; thence South 75 1/2 degrees West 27 poles to forked walnut; thence North 50 1/2 degrees West, East side of branch crossing to West side, 44 1/5 poles to stone; thence South 87 degrees West 26 poles to black oak at edge of woods; thence South 22 degrees West 59 poles, more or less, to stone in line of Hardin; thence with the fence and Hardin's line, South 73 1/4 degrees East 80 1/5 poles to post on West bank of creek at water gap; thence South 79 1/4 degrees East 146 poles, more or less, to center of Barbour's Mill Pike; thence about with the center of same, North 23 degrees West 11 poles; North 4 degrees East 80 poles to point in center of pike; thence leaving the pike, South 86 1/2 degrees West 33 poles to the beginning.

THERE IS FURTHER EXCEPTED a house and lot and a portion of Mrs. Arthur Grubbs 120+-acre farm located at 3585 Barbers Mill Road, Lebanon, Marion County, Kentucky, and being more particularly described as follows:

BEGINNING at a yard fence post on the west side of Barbers Mill Road (20 feet from centerline and 0.25 mile south of Simstown Road junction), and corner to remaining farm. Thence with R.O.W., S 00 degrees 00' 43" E 138.55 feet to a rebar (set) 20 feet west of center line and corner to remaining farm. Thence leaving R.O.W. and with new lines, N 75 degrees 12' 17" W. 384.37 feet to a corner rebar (set); N 17 degrees 43' 54" E 151.29 feet to a corner rebar (set) in yard fence line. Thence with yard fence line, S 69 degrees 13' 56" E 197.00 feet to a post; N 73 degrees 12' 59" E

14.78 feet to a post, and S 73 degrees 18' 40" E 132.75 feet to the beginning. Containing 01.15 acres by survey of Reed Spaulding III, PLS #3066, dated 1/16/1996, with a copy of the plat attached hereto as a part hereof.

Being the same property conveyed to Arthur K. Grubbs and Nannie B. Grubbs in survivorship by deeds of record in Deed [Book 72, Page 54](#), and Deed [Book 79, Page 600](#), both records of the Marion County Court Clerk. The said Arthur K. Grubbs died a resident citizen of Marion County, Kentucky on June 19, 1995, and Nannie B. Grubbs acquired title to said property by virtue of the terms of said survivorship deeds.

Being the same property conveyed by Deed dated January 2, 1996, and recorded in Deed [Book 184, Page 191](#), from Nannie B. Grubbs, widow, to Billy S. Grubbs and Marlene K. Grubbs, his wife, jointly, for and during their natural lives, and at the death of either, remainder to the survivor and his or her heirs and assigns forever (undivided 1/2 interest), and Alice A. Clark and Andrew Charles Clark, her husband, jointly for and during their joint natural lives and at the death of either, remainder the survivor and his or her heirs and assigns forever (undivided 1/2 interest).

SAVE AND EXCEPTING the following described property:

A tract of land fifty feet (50') in width located about 325 feet northwest of Barber Mill-Campbell Road junction on the west right-of-way of Barbers Mill SR 1404, and described as follows: BEGINNING at rebar (set) at pull post on west r/w of Barbers Mill SR 1404; northeast corner to Mary Sexton lot (DB 210, PG 427) and southeast corner to Grubbs and Clark Farm (DB 184, PG 191). Thence leaving SR r/w and with Sexton, N. 71 degrees 38' 46" W. 179.60 as fenced to rebar (found) and corner to retained Robert S. Harmon 05.973-acre tract. Thence leaving Sexton and with Harmon as fenced, N. 72 degrees 13' 51" W. 798.27 feet to rebar (found) and corner to Charles Clark (formerly Harmon DB 178, PG 691). Thence with Clark, N. 72 degrees 01' 07" W. 1044.29 feet to corner rebar (set) at pull post. Thence leaving Clark and with new lines to Grubbs and Clark Farm, N. 27 degrees 43' 39" E. 51.49 feet to corner rebar (set); S. 72 degrees 02' 03" E. 1971.58 feet to corner rebar (set) on west r/w of Barbers Mill SR 1404. Thence leaving remaining Grubbs and Clark farm and with SR r/w S. 22 degrees 05' 09" E. 64.66 feet to the beginning, containing 02.30 acres, as per the attached survey of Reed Spaulding, PLS #3066, dated November 24, 2001.

Being the same property an undivided one-half interest in which was conveyed by deed dated December 11, 2001, and recorded in Deed [Book 226, Page 320](#), from Billy S. Grubbs and Marlene K. Grubbs, his wife, unto Alice A. Clark and Andrew Charles Clark, her husband, jointly and equally, for and during their joint, natural lives, with remainder to the survivor of them, the heirs and assigns of such survivor forever. The remaining undivided one-half interest in such property was conveyed by deed dated January 2, 1996, and recorded in Deed [Book 184, Page 191](#), from Nannie B. Grubbs, widow, to Alice A. Clark and Andrew Charles Clark, her husband, jointly, for and during their joint natural lives and at the death of either, remainder to the survivor and his or her heirs and assigns forever.

Parcel No.: 070-001

Clark, Andrew

Tract 1:

A certain tract of land situated about 2 1/2 miles from Sims-town and on the W. side of the Lebanon and Pleasant Run Turnpike in Marion County Kentucky and bounded as follows:

BEGINNING at a stone 15 feet W. from a large hickory tree, corner of former land of Harvey McElroy and John Horn;

THENCE S. 1 E. in said Horan's line 75.2 poles to a stone in said line, corner to Burdette, later Hill;

THENCE S. 53 E. 93 1/2 poles with Hill's line to a stone, corner to Scantling, later Wade;

THENCE N. 16 E. 61.36 poles to a stone;

THENCE S. 80 E. 77.88 poles to a hickory;

THENCE S. 47 E. 53.72 poles to a walnut;

THENCE S. 88 E. 97 poles to a stone on the E. side of the Lebanon and Pleasant Run Pike;

THENCE with said Pike N. 23 1/2 E. 45 poles to a point in said Pike at the mount of a lane;

THENCE N. 26 W. 20 poles to a stone on the E. side of said pike, corner to Wallace McElroy, thence with his line N. 77 W. 325.6 poles to the beginning, containing 124-3/4 acres, more or less.

LESS AND EXCEPTED from the above and not conveyed hereby is a tract or parcel of land, previously conveyed to Vernon Hardin dated January 23, 1971 of record in the Office of the Marion County Clerk in [Volume 90, Page 601](#), and more particularly described as follows:

Situated about 5 1/2 miles northeast of Lebanon Marion County, Kentucky, near the Barbour's Mill Road in Marion County, Kentucky and bounded and described as follows:

BEGINNING at a large sugar tree at a corner to Yocum Gordon, Virgil Ray Tatum and Sylvester Brown;

THENCE with line of Brown, N. 49 1/2 W 23.76 chains to a stone at corner to Sylvester Brown and Vernon Hardin;

THENCE with line of Hardin N. 2 E 18.47 chains to a post at a corner to Vernon Hardin and Arthur Grubbs;

THENCE with line of Grubbs S. 73 1/2 E. 18.34 chains to a small ash tree at a corner to Arthur Grubbs and J. D. Harmon;

THENCE with line of Harmon S. 15 E. 14.56 chains to a post at a corner to J.D. Harmon and Yocum Gordon;

THENCE with line of Gordon S. 16 W. 15.30 chains to a point of beginning, containing 48.46 acres, as surveyed by James Goatley registered survey No. 1119, on January 18, 1971.

ALSO, LESS AND EXCEPTED from the above and not conveyed hereby is a tract or parcel of land, previously conveyed to Eddie O'Bryan and Tammy O'Bryan, his wife dated April 25, 1990 of record in the Office of the Marion County Court Clerk in [Volume 154, Page 208](#), and more particularly described as follows:

Situated in Marion County, Kentucky about four miles Northeast of Lebanon on the Barbours Mill Road and BEGINNING at a point in the center of Barbours Mill Road, which point is as measured along the road 683 feet from the corner to Arthur Grubbs;

THENCE leaving the road with a new line N. 63 deg. 30 min. W. 395 feet to utility pole, S. 63 W 510 feet to a hedge iron tree;

THENCE S. 79 E. 415 feet to a point in the center of the Barbours Mill Road;

THENCE with the center of said Road N. 38 E. 233 feet, N. 34 deg. 30 min. E. 166 feet to the beginning, containing 4.02 acres, more or less, as surveyed by James Goatley, Registered Surveyor No. 1119, on April 19, 1990.

LESS AND EXCEPTED AND NOT CONVEYED HEREIN is the following described property:

A part of the Robert E. Harmon Farm located at 3325 Barbers Mill road at junction of Campbell CR from [Volume 178, Page 691](#) in Marion County, Kentucky and more particularly described as follows:

All reference to rebar found or set, is 1/2 X 18" rebar, I.D. capped Spaulding PLS #3066.

BEGINNING at rebar (found) and southwest corner to Mary Sexton 2.82 ACRE Tract (DB 210 PG 427);

THENCE leaving Sexton and with remaining Harmon as fenced, N44°31'06"W 33.38 feet to rebar (set) at pull post; N70°55'33"W 232.48 feet to rebar (set) at pull post; N54°11'10"W 249.99 feet to rebar (set) at pull post; N54°32'43"W 234.77 feet to rebar (set) at pull post; N18°32'40"W 119.10 feet to rebar (set) at pull post, and N21°26'18"E 140.36 feet to rebar (set) at pull post in line of Billy Grubbs and Others (DB 184 PG 191);

THENCE leaving remaining Harmon and with Grubbs as fenced, S72°13'51"E 798.27 feet to rebar (found) and northwest corner to Mary Sexton;

THENCE leaving Grubbs and with Sexton as fenced, S19°39'31"W 405.87 feet to the beginning, containing 05.973 ACRES by survey of Reed Spaulding PLS #3066 performed 5/31/01 and as shown on plat of Survey by same entitled "05.973 A Part of Robert E. Harmon Farm dated 6/7/01.

ALSO LESS AND EXCEPTED AND NOT CONVEYED HEREIN is a certain tract of land, containing 2.82 acres, sold to Mary G. Sexton, by deed dated 5 April 1999, and of record with the Marion County Court Clerk in [Volume 210, Page 427](#), and more particularly described as follows:

A CERTAIN TRACT OF LAND located at 3325 Barbers Mill Road at Campbell Road junction, in Marion County, Kentucky, and more particularly described as follows:

BEGINNING at a steel post 20 feet west of centerline of Barbers Mill road and corner to Billy Grubbs & Alice Clark Farm (DB 184, PG 191);

THENCE leaving Grubbs & Clark and with west R.O.W., S21°06'18"E 235.73 feet; S 11°05'36"E 81.69 feet, and S05°37'07"W 72.33 feet to a rebar (set) and corner to remaining Robert E. Harmon Farm;

THENCE leaving R.O.W. and with remaining Harmon on the north side of existing farm road, S77°37'48"W 138.20 feet to a rebar (set); N73°48'08"W 272.80 feet to a corner rebar (set) 15 feet south of and 10 feet west of stock barn; N19°39'31"E 405.87 feet as fenced to a corner rebar (set) in fence line of Grubbs & Clark;

THENCE leaving remaining Harmon and with Grubbs & Clark, S71°15'18"E 176.25 feet to the beginning. Containing 02.82 ACRES by survey of Reed Spaulding III, PLS #3066, dated December 16, 1996 with plat attached. ATTACHED TO the above described 02.82 ACRE Tract is a R.O.W. easement with existing farm road over the remaining Land of Robert E. Harmon. Said easement is 25 feet in width at all points and parallel to the south line of 02.82 ACRE Tract from Barbers Mill Road bearing S77°37'48"W 138.20 feet, and N73°48'08"W 272.80 feet.

Being the same property conveyed by Deed dated July 12, 2001, and recorded in Deed Book 222, page 254, from Robert E. Harmon, single, to Andrew Charles Clark and Alice Ann Clark, for their joint lives and at the death of either of them, to the survivor in fee simple, their heirs and assigns forever.

Tract 2:

Lot 10 of the Division of remaining D.H. and Kathy Mattingly Farm located off Horan Lane at the end of Patriots Way, per Plat of record in [PC 3, Slide 436](#), in the office of the Marion County Clerk's office.

Being the same property conveyed by Deed dated July 28, 2006, and recorded in Deed Book 259, Page 158, from Patriots Pointe Development, LLC, a Kentucky limited liability company, to Andrew C. Clark and Alice A. Clark, husband and wife, jointly and equally, for and during their joint, natural lives, with remainder to the survivor of them, the heirs and assigns of such survivor forever.

Tract 3:

Lot 10A of the Division of remaining D.H. and Kathy Mattingly Farm located off Horan Lane at the end of Patriots Way, per Plat of record in Plat Cabinet 3, Slide 436, in the office of the Marion County Clerk's Office.

Being the same property conveyed by Deed dated July 28, 2006, and recorded in Deed Book 259, page 155, from Patriots Pointe Development, LLC, a Kentucky limited liability company, to Andrew C. Clark and Alice A. Clark, husband and wife, jointly and equally, for and during their joint, natural lives, with remainder to the survivor of them, the heirs and assigns of such survivor forever.

Tract 4:

Lot 17 of the Division of remaining D.H. and Kathy Mattingly Farm located off Horan Lane at the end of Patriots Way, per Plat of record in Plat Cabinet 3, Slide 436, in the office of the Marion County Clerk's Office.

Being the same property conveyed by Deed dated July 28, 2006, and recorded in Deed Book 259, page 152, from Damien H. Mattingly, single, and Kathy W. Mattingly, single, to Andrew C. Clark and Alice A. Clark, husband and wife, jointly and equally, for and during their joint, natural lives, with remainder to the survivor of them, the heirs and assigns of such survivor forever.

Tract 5:

A tract of land fifty feet (50') in width located about 325 feet northwest of Barber Mill-Campbell Road junction on the west right-of-way of Barbers Mill SR 1404, and described as follows: BEGINNING at rebar (set) at pull post on west r/w of Barbers Mill SR 1404; northeast corner to Mary Sexton lot (DB 210, PG 427) and southeast corner to Grubbs and Clark Farm (DB 184, PG 191). Thence leaving SR r/w and with Sexton, N. 71 degrees 38' 46" W. 179.60 as fenced to rebar (found) and corner to retained Robert S. Harmon 05.973 acre tract. Thence leaving Sexton and with Harmon as fenced, N. 72 degrees 13' 51" W. 798.27 feet to rebar (found) and corner to Charles Clark (formerly Harmon DB 178, PG 691). Thence with Clark, N. 72 degrees 01' 07" W. 1044.29 feet to corner rebar (set) at pull post. Thence leaving Clark and with new lines to Grubbs and Clark Farm, N. 27 degrees 43' 39" E. 51.49 feet to corner rebar (set); S. 72 degrees 02' 03" E. 1971.58 feet to corner rebar (set) on west r/w of Barbers Mill SR 1404. Thence

leaving remaining Grubbs and Clark farm and with SR r/w S. 22 degrees 05' 09" E. 64.66 feet to the beginning, containing 02.30 acres, as per the attached survey of Reed Spaulding, PLS #3066, dated November 24, 2001.

Being the same property in which a one-half interest was conveyed by Deed dated January 2, 1996, and recorded in Deed Book 184, Page 191, from Nannie B. Grubbs, widow, to Billy S. Grubbs and Marlene K. Grubbs, his wife, jointly, for and during their joint natural lives, and at the death of either, remainder to the survivor and his or her heirs and assigns forever (undivided 1/2 interest) and to Alice A. Clark and Andrew Charles Clark, her husband, jointly, for and during their joint natural lives, and at the death of either, remainder to the survivor and his or her heirs and assigns forever (undivided 1/2 interest), and the remaining one-half interest in which was conveyed by Deed dated December 14, 2001, and recorded in Deed Book 226, Page 320, from Billy S. Grubbs and Marlene K. Grubbs, his wife, to Alice A. Clark and Andrew Charles Clark, her husband, jointly and equally, for and during their joint, natural lives, with remainder to the survivor of them, the heirs and assigns of such survivor forever;

Tract 6:

Tract 1 of the Nettie Harmon Estate Farm Division as per plat thereof of record in [PC 2, Slide 201](#) in the Marion County Court Clerk's Office.

Being the same property conveyed by Deed dated August 26, 2010, and recorded in Deed Book 283, Page 190, from William R. Dunn and Rita F. Dunn, husband and wife, and Keith L. Cornish and Janet R. Cornish, husband and wife, to Charles Clark and Alice A. Clark, husband and wife, jointly and equally, for and during their joint, natural lives, with remainder to the survivor of them, the heirs and assigns of each survivor forever.

Map/Parcel No.: 070-007

GOODIN FAMILY FARMS, LLLP

All that portion of Tract 5 of the McMichael Farm Division as per plat thereof of record in Plat Book 2, Slide 308, in the Marion County Court Clerk's office that lies Northeasterly of a line described as follows:

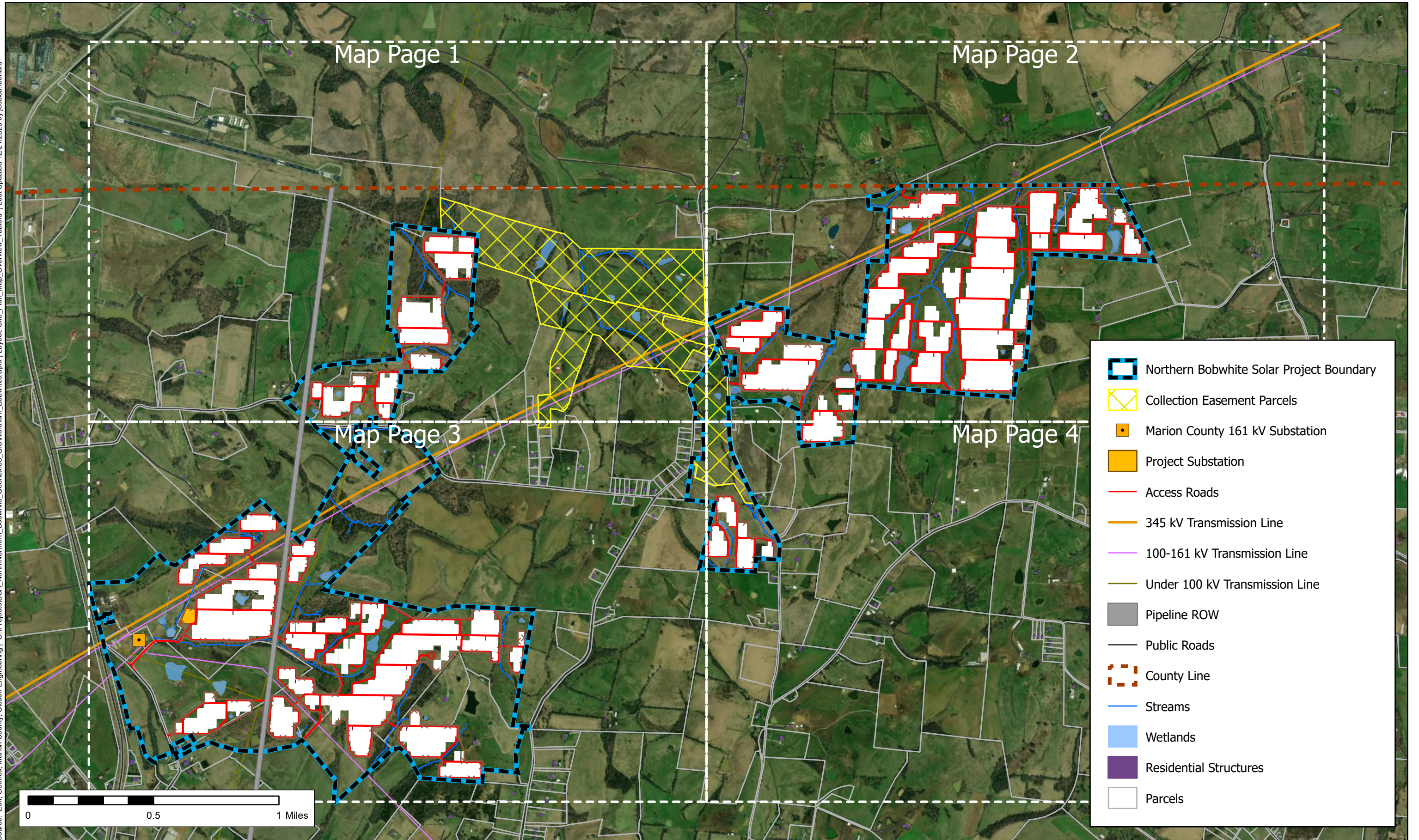
Beginning at the most Easterly point of Tract 2 of the McMichael Farm Division as per plat thereof of record in Plat Book 2, Slide 308, in the Marion County Court Clerk's office and also being the northeasterly terminus point of the line shown on said Plat with a bearing of N30°19'30"W and a distance of 345.99' thence continuing N30°19'30"W to the point of the most northerly corner of Tract 5 of said Plat, said point also being the northeasterly terminus point of the line shown on said Plat with a bearing of N85°20'40"E with a distance of 219.46'.

Being a portion of Parcel 2 conveyed by Deed dated October 1, 2019, and recorded November 10, 2020 in Deed Book 339, Page 109 from Charles R. Goodin, Jr. and J. Don Goodin, a/k/a Joseph Donald Goodin to Goodin Family Farms, LLLP, a Kentucky limited liability limited partnership.

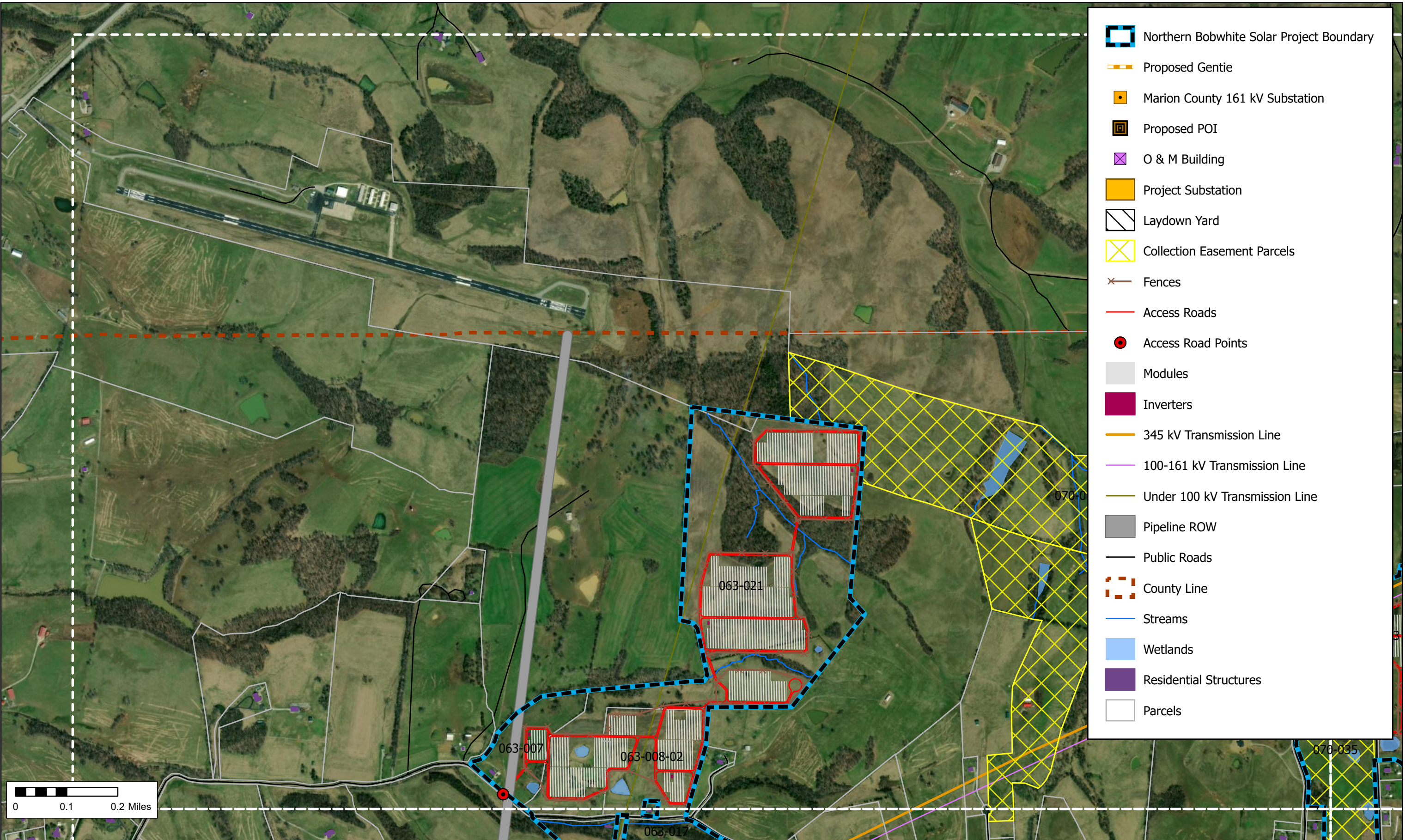
Map/Parcel No.: 064-001 (Portion)

Appendix C
Site Plans

Source: Esri, Geenex, Marion County, Olsson Engineering | G:\Projects\USA_North\Northern_Bobwhite_Geenex05_GIS\Northern_Bobwhite.aprx | Layout: Site_Plan_Map_Overview_Tabloid | Last Updated 12/21/2020 by jessica.leonard



Source: Esri, Geonex, Marion County, Ventex, Olsson Engineering | G:\Projects\USA_North\Northern_Bobwhite_GIS\Northern_Bobwhite.aprx | Layout: Site_Plan_Map_Series_Tableid | Last Updated 12/21/2020 by jessica.leonard

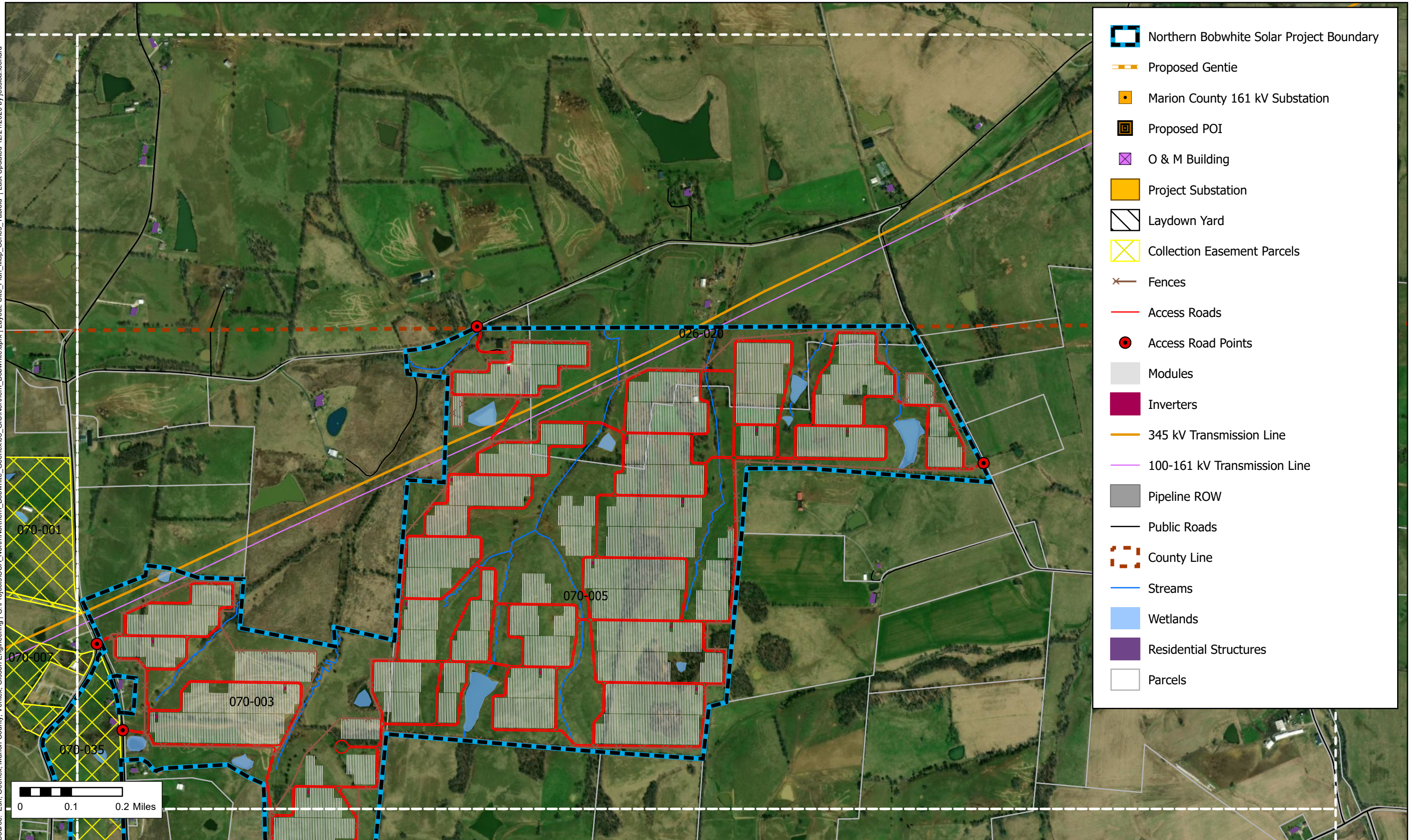


- Northern Bobwhite Solar Project Boundary
- Proposed Gentie
- Marion County 161 kV Substation
- Proposed POI
- O & M Building
- Project Substation
- Laydown Yard
- Collection Easement Parcels
- Fences
- Access Roads
- Access Road Points
- Modules
- Inverters
- 345 kV Transmission Line
- 100-161 kV Transmission Line
- Under 100 kV Transmission Line
- Pipeline ROW
- Public Roads
- County Line
- Streams
- Wetlands
- Residential Structures
- Parcels

0 0.1 0.2 Miles



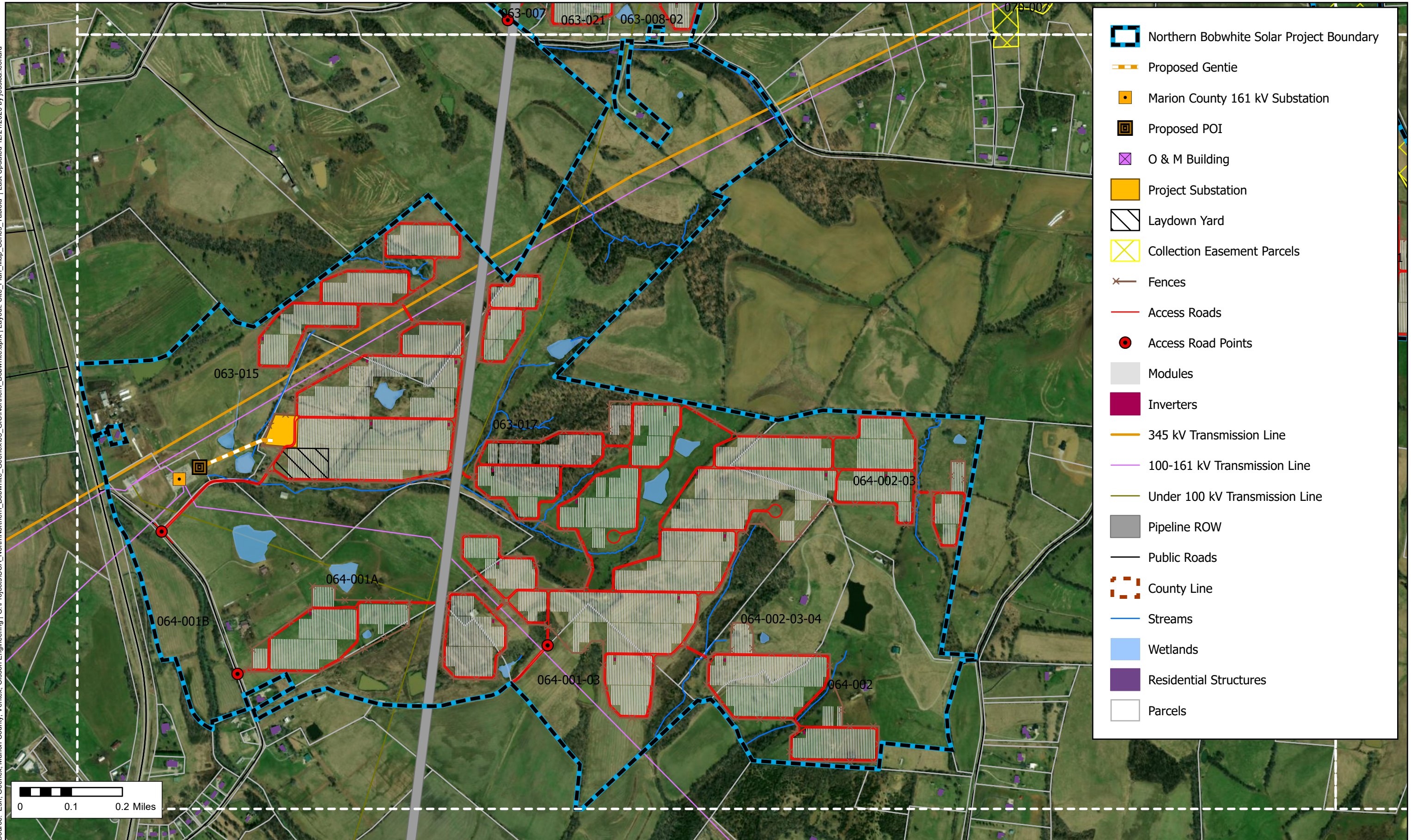
Source: Esri, Geenex, Marion County, Ventex, Olsson Engineering | G:\Projects\USA_North\Northern_Bobwhite_Geenex05_GIS\Northern_Bobwhite.aprx | Layout: Site_Plan_Map_Series_Tableoid | Last Updated 12/21/2020 by jessica.leonard



- Northern Bobwhite Solar Project Boundary
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- County Line
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- Residential Structures
- Parcels



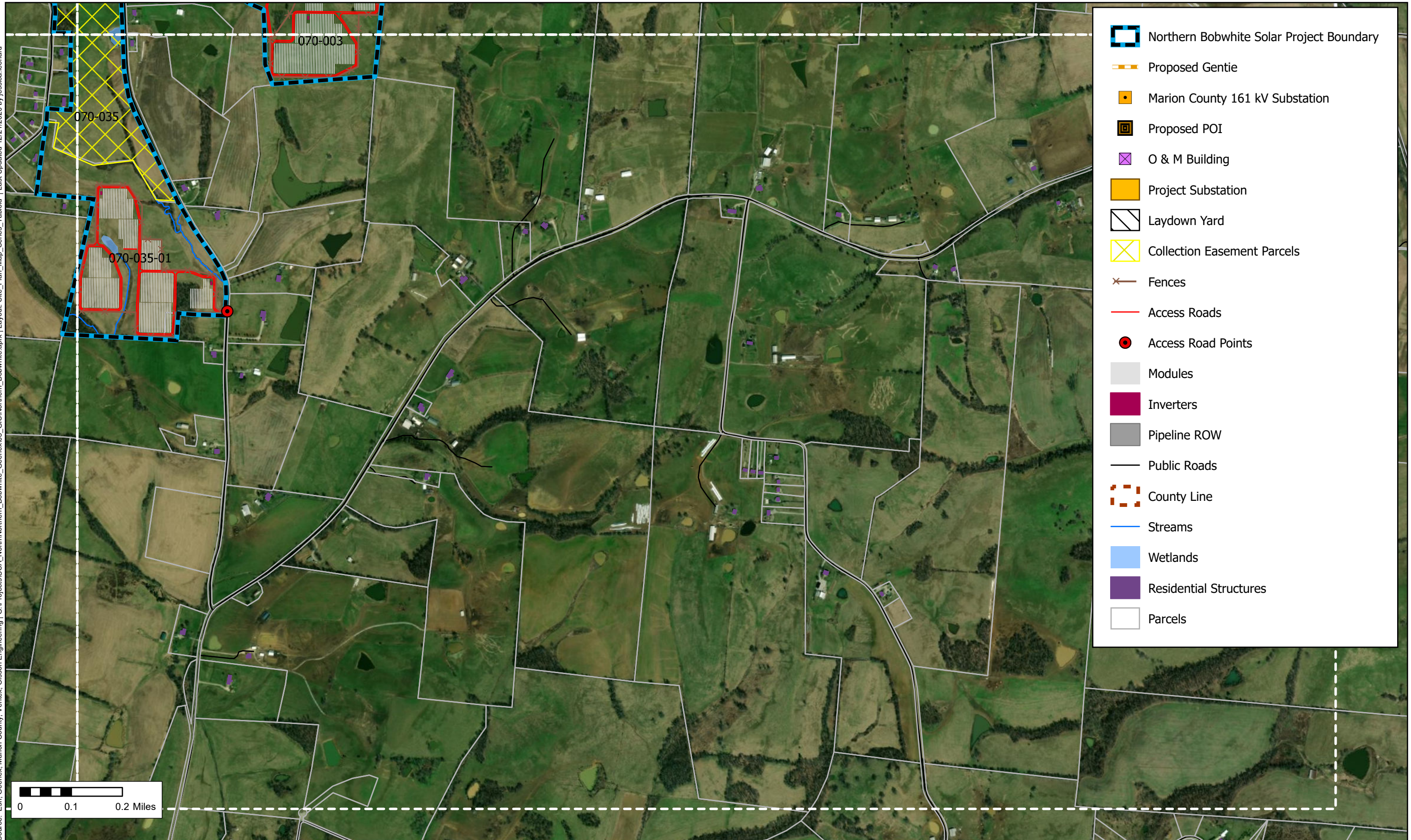
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- Northern Bobwhite Solar Project Boundary
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- Public Roads
- County Line
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- Wetlands
- Residential Structures
- Parcels



Source: Esri, Geenex, Marion County, Ventex, Olsson Engineering | G:\Projects\USA_North\Northern_Bobwhite_GIS\Northern_Bobwhite.aprx | Layout: Site_Plan_Map_Series_Tableid | Last Updated 12/21/2020 by Jessica Leonard

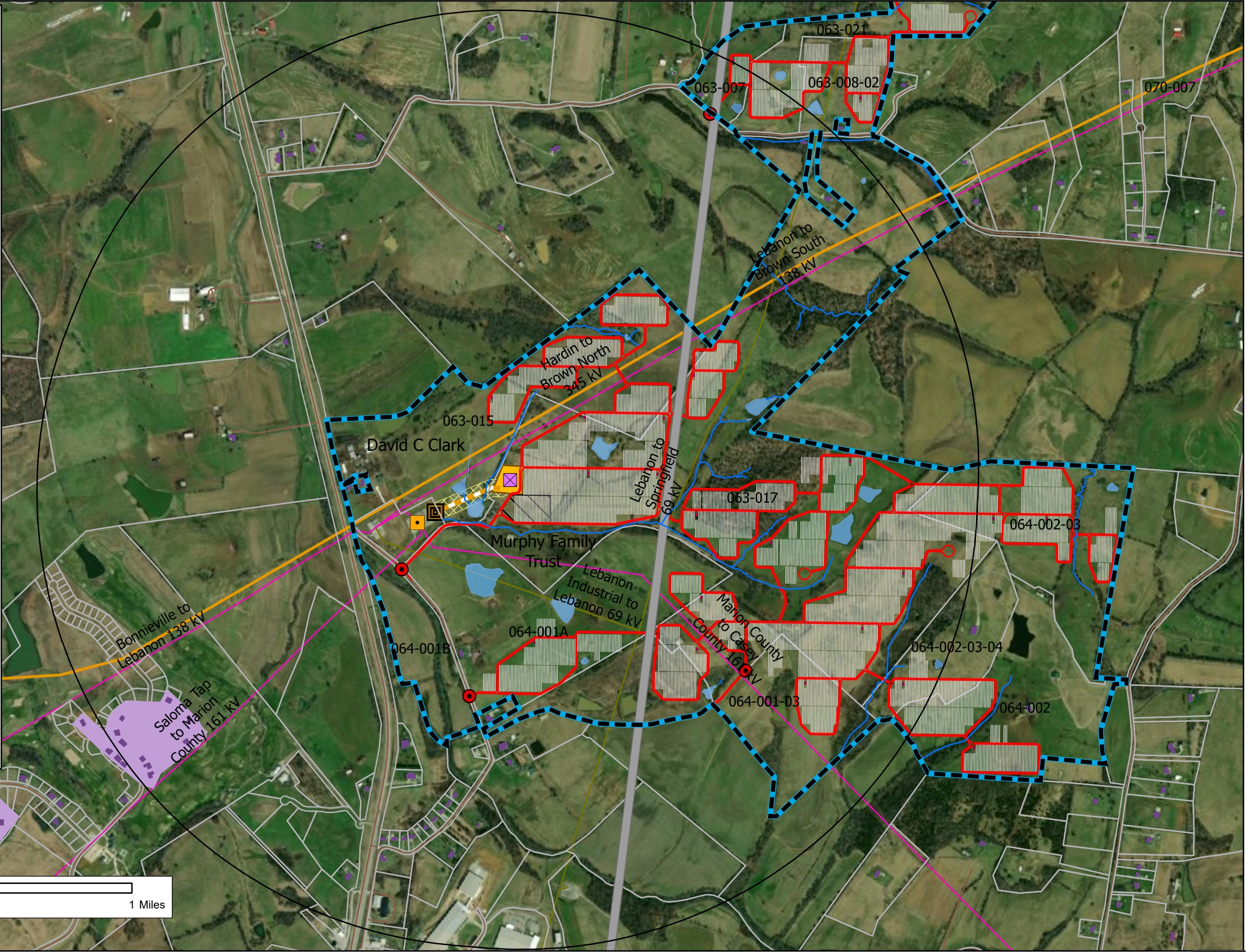
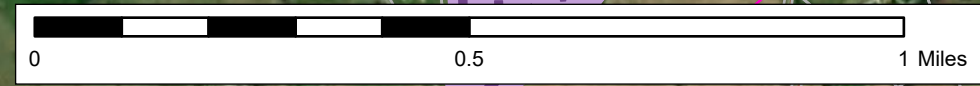


- Northern Bobwhite Solar Project Boundary
- Proposed Gentie
- Marion County 161 kV Substation
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- Project Substation
- Laydown Yard
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- Access Road Points
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- County Line
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- Residential Structures
- Parcels

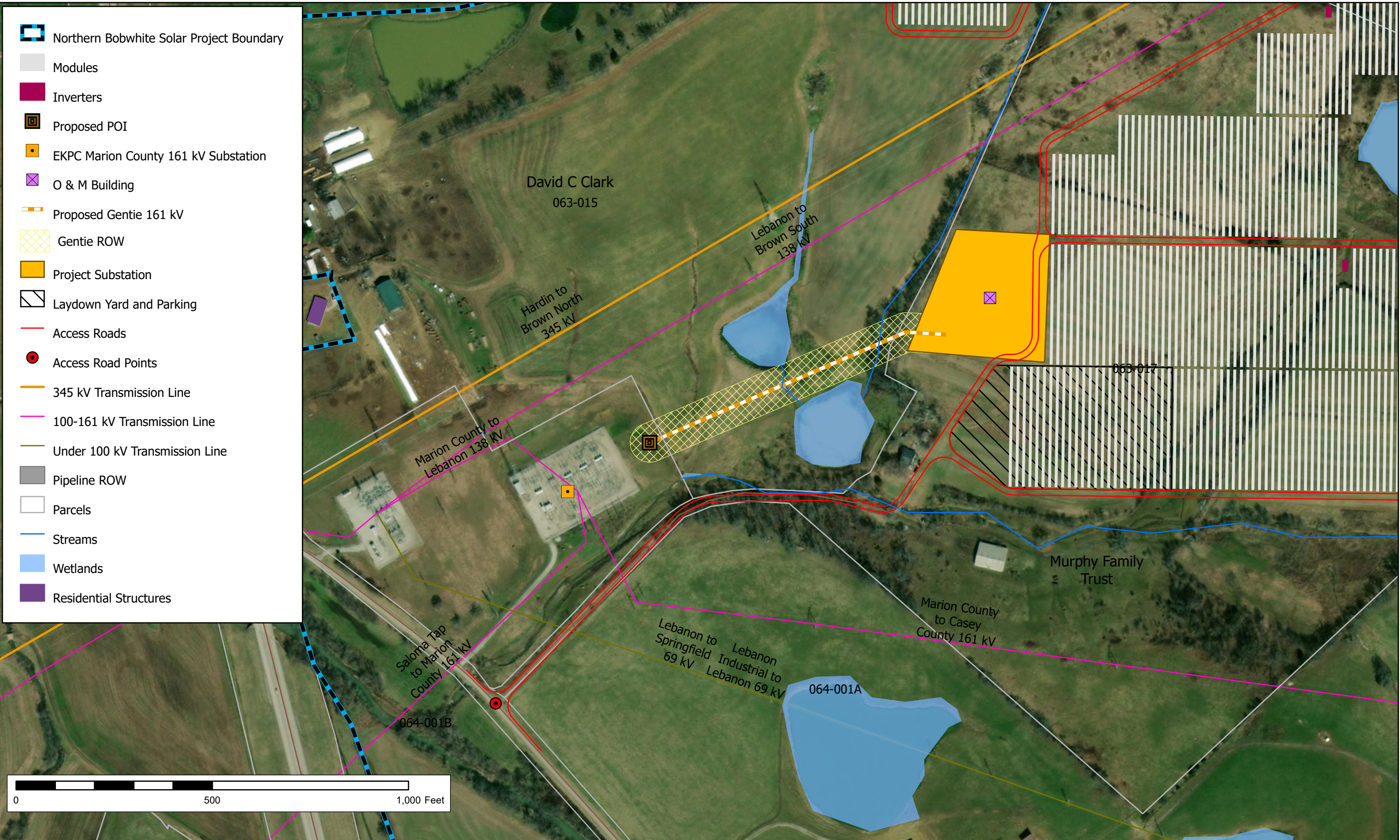


Source: Esri, Ventex, Geenex | G:\Projects\USA_North\Northern_Bobwhite_GIS\Northern_Bobwhite.aprx | Layout: Substation_Area_Tableoid | Last Updated 12/21/2020 by jessica.leonard

- Northern Bobwhite Solar Project Boundary
- Modules
- Inverters
- Proposed POI
- EKPC Marion County 161 kV Substation
- O & M Building
- Proposed Gentie 161 kV
- Gentie ROW
- Project Substation
- Laydown Yard and Parking
- Access Roads
- Access Road Points
- 345 kV Transmission Line
- 100-161 kV Transmission Line
- Under 100 kV Transmission Line
- Pipeline ROW
- Parcels
- Streams
- Wetlands
- Residential Structures
- Residential Neighborhoods
- 1 mile radius



Source: Esri, Ventex, Geenex | G:\Projects\USA_North\Northern_Bobwhite_GIS\Northern_Bobwhite.aprx | Layout: Substation_Area_Zoom_Tableoid | Last Updated 12/21/2020 by jessica.leonard



Appendix D
Noise Assessment

**NOISE ASSESSMENT
NORTHERN BOBWHITE SOLAR, LLC PROJECT
MARION COUNTY, KENTUCKY**

December 2020



Smith Management Group
a division of ALL4

**1405 Mercer Road
Lexington, KY 40511
859-231-8936**

**NOISE ASSESSMENT
NORTHERN BOBWHITE SOLAR, LLC PROJECT
MARION COUNTY, KENTUCKY**

December 2020

Prepared for:

NORTHERN BOBWHITE SOLAR LLC

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TABLES

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Table 3: Anticipated Noise Produced by Very Loud Construction Equipment (Pile Driver)

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Table 5: Anticipated Noise produced by the panel tracking motors (NexTracker or equivalent)

Table 6: Anticipated Noise Produced by the SMA Sunny Central UP (or similar) central inverter

Table 7: Anticipated Noise Produced by the Project Substation's Main Power Transformer

APPENDICES

Appendix A- Site Plan

Appendix B – Site Plan - Propagated Noise Levels

1. Introduction

1.1. Project Description

Northern Bobwhite Solar LLC (“Bobwhite”) is developing a solar facility (“Project”). The Project will be a 96-megawatt alternating current (“MWac”) photovoltaic (“PV”) electric generating facility. The proposed Project is to be in unincorporated Marion County, KY, north of the City of Lebanon, KY and east of Highway 55 at approximate coordinates 37°36’56.80” N, - 85°13’45.57” W. The Project will be situated on up to 1300 acres, which has historically been used for agriculture and farming. Project components will include PV solar panels and the associated ground-mounted racking structure, access roads, inverters, medium voltage transformers, buried electrical collection cabling, a step-up substation, a short 161-kilovolt (“kV”) transmission line, security fencing, laydown areas, and an operations and maintenance (“O&M”) building.

The final design of the Project has not been completed. The solar panels could be designed with a fixed tilt or tracking system. The inverters could be small string inverters or large central inverters. This noise study was conservatively based on the potential components that generate the most noise.

The Project will consist of a construction phase lasting approximately 12-18 months. This will include site grading and construction of the solar panel arrays. Upon completion of the construction phase, ongoing operations of the Project will last for approximately 35 years. The solar panels are self-sufficient in operation and will only require periodic maintenance, repair, and groundskeeping activities.

1.2. Existing Land Use and Site Conditions

The proposed site consists of multiple parcels of cultivated and uncultivated farmland located in Marion County, Kentucky. The site is currently farmland for pastures and row crops. Surrounding land is primarily agricultural farmland with some residential properties. Appendix A provides the proposed Site plan.

2. Noise Assessment

Smith Management Group a division of ALL4 LLC (“SMG”) completed a noise assessment of the proposed Project site and equipment to determine potential noise impacts to adjacent residents.

2.1. Nearest Receptor Sites

The nearest noise receptors identified on the site plan are limited to low-density, scattered, single-family homes. There are no noise-sensitive facilities (hospitals, schools, etc.) in the vicinity of the Project site and limited commercial operations outside of agriculture and farming activities.

2.2. Sound Levels of Common Noise Sources

Typical A-Weighted (average weighted) Sound Levels (reported as “dBA”) of Common Noise Sources are provided.

Table 1: Sound Levels of Common Noise Sources

Source	Typical Noise Level (dB)
Jet aircraft takeoff at 100 ft.	120
Riveting machine at operator’s position	110
Woodworking machinery	100
Bulldozer at 50 ft.	90
Traffic noise	80
Commercial jet aircraft interior during flight	70
Normal conversation speech at 5-10 ft.	60
Open office background level	50
Background level within a residence	40

2.2.1. Existing On-Site Noise

Existing noise sources at the proposed Project site consist of two-lane rural roadways and larger two-lane State Routes that include State Route 55 to the west State Route 150 to the north and State Route 1195 to the east. Rural roads bordering the site include Simstown Road and Gene Campbell Road. The identified roads receive local traffic noise as well as noise typical of rural farming and agricultural activities (farming equipment, trucks, tractors, etc.). There are

cattle farms around the Project site which is a source of cattle noise and additional noise sources (typical for a rural farming location) include insects, dogs, birds and other wildlife. Near the proposed facility, there is a municipal airport to the north which is a current noise source, and an industrial park approximately one mile east of the site which has significant heavy truck traffic moving materials and product.

2.3. Construction Noise

2.3.1. Equipment and Machinery

As the proposed site is rural and open farmland, the need for heavy equipment for earthmoving or the removal of trees would be minimal. Typical construction activities will take place for site development and construction of the solar panels. The U.S. Department of Transportation Federal Highway Administration (“FHWA”) publishes noise levels for typical construction equipment as provided in Table 2 below.

Table 2: Equipment Noise Levels

Equipment	Typical Noise Level (dBA) 50 feet from Source
Air Compressor	81
Backhoe	80
Ballast Tamper	83
Chainsaw	85
Compactor	82
Crane Derrick	88
Crane Mobile	83
Dozer	85
Generator	81
Grader	85
Impact Wrench	85
Jack Hammer	88
Loader	85
Pickup Truck	55
Pile Driver (Impact)	101
Pile Driver (Sonic)	96
Pneumatic Tool	85
Rock Drill	98
Roller	74
Saw	76

Equipment	Typical Noise Level (dBA) 50 feet from Source
Scraper	89
Shovel	82
Tie Cutter	84
Tie Handler	80
Tie Inserter	85
Tractor	84
Truck	88
Welder/Torch	73

Source: FHWA Roadway Construction Noise Model User Guide, 2017. Table based on EPA Report and measured data. Exact noise levels may vary depending on manufacturer and model.

For this report the anticipated noise levels generated by construction activities were addressed utilizing the typical noise levels generated by construction equipment as published by the FHWA. The following outlines the anticipated noise expected at potential receptors (primarily residential) based upon the noise produced by the loudest equipment likely to be used during construction. The table provided below highlights the distance attenuation expected during operation of the pile driver in a free field (no reflected sound waves) assuming no barriers, obstructions, or additional forms of sound attenuation.

Table 3: Anticipated Noise Produced by Very Loud Construction Equipment (Pile Driver)

Distance from Noise Source to Receptor (feet)	Projected Noise Level at Noise Receptor (dB)
50	101.00
100	94.98
200	88.96
300	85.44
500	81.00
1,000	74.98
1,500	71.46

For every doubling of distance, the sound level reduces by 6 dB, (e.g., moving from 50 to 100 feet away from a noise source). The next 6 dB reduction would require the distance to double again from 100 to 200 feet for a further 6 dB reduction.

According to the calculations above the loudest anticipated construction noise source (operation of a pile driver) will be reduced as the distance from the source to the receptor increases. Based on the current site plans, a majority of the identified residential receptors are located at distances greater than 500 feet from

the closest planned construction activities. Even when pile driving briefly occurs at the closest distance anticipated between construction activities and neighboring receptors, those receptors would experience approximately the same decibel levels as one would experience adjacent to heavy traffic or running a vacuum cleaner or hair dryer (**See Appendix B – Propagated Noise Levels**). In addition, these construction noise sources are temporary and intermittent by nature and will subside as construction progresses and distance increases. Topography and existing vegetation on the site would further reduce the realized noise at receptors below these modeled maximums.

2.3.2. Roadway Noise During Construction

A temporary increase in traffic is anticipated during the construction phase which will impact noise levels during the delivery of construction equipment, construction materials and solar panel components to the project laydown area. A conservative noise source level of 88 dB at 50 feet was utilized for calculating the potential noise impact of heavy truck (Semi- trailer trucks) traffic and frequency over time during a typical workday. The propagated noise levels take into effect the distance from the truck access road to the nearest residential receptors.

Table 4: Anticipated Noise Produced by Very Loud Construction Equipment (Semi-Trucks)

Distance from Noise Source to Receptor (feet)	Projected Noise Level at Noise Receptor (dB)
50	88
100	81.98
200	75.96
300	72.44
500	68.0
1,000	61.98
1,500	58.46

The calculated noise levels are based upon truck traffic on the access road between 1.5 hours and 5 hours daily, 7 days per week. For every doubling of distance, the sound level reduces by 6 dB, (e.g., moving from 50 to 100 feet away from a noise source). The next 6 dB reduction would require the distance to double again from 100 to 200 feet for a further 6 dB reduction. Based on **Table 4**, the closest resident would experience sound levels below normal traffic levels during deliveries at the laydown area (or below normal conversation speech at 5-10 ft.), and the average noise levels would be much lower.

2.3.3. Assembly of Solar Array and Construction Facilities

Installation of the solar panels and inverters or any other electrical equipment associated with the solar facility and substation will likely involve the use of typical manual power tools or hand tools. These operations will occur at hundreds to thousands of feet from the property boundary and even farther from any nearby residential receptors. The work will occur during the hours of 7 am to 10 pm.

For every doubling of distance, the sound level reduces by 6 dB, (e.g., moving from 50 to 100 feet away from a noise source). The next 6 dB reduction would require the distance to double again from 100 to 200 feet for a further 6 dB reduction.

According to the calculations above the loudest anticipated construction noise source (operation of a pile driver) will be reduced as the distance from the source to the receptor increases. Based on the current site plans, a majority of the identified residential receptors are located at distances greater than 500 feet from planned construction activities. Even at the closest receptors the distance alone would reduce the highest expected noise levels (from the pile driver) down to the same decibel levels as one would experience adjacent to heavy traffic or running a vacuum cleaner or hair dryer. In addition, the noise sources are temporary and intermittent by nature based on typical construction activities.

2.4. Operational Noise Conditions

2.4.1. Solar Array and Potential Tracking System

The solar array associated with this Project includes photovoltaic panels potentially on tracking systems distributed evenly across the site. Tracking systems involve the panels being driven by small, 24-volt brushless motors to track the arc of the sun to maximize each panel's potential for solar absorption. Panels would turn no more than five degrees every 15 minutes and would operate no more than one minute out of every 15-minute period. These tracking motors are a potential source of mechanical noise and are included in this assessment. The sound typically produced by panel tracking motors (NexTracker or equivalent) is approximately 78 dB at the source. At a distance just beyond 200 feet from the source, the sound from the tracking motor would be similar to indoor residence noise levels.

Table 5: Anticipated Noise produced by the panel tracking motors (NexTracker or equivalent)

Distance from Noise Source to Receptor (feet)	Noise Experienced at Noise Receptor (dB)
3.3	78
6.6	72
13.1	66
26.2	60

Distance from Noise Source to Receptor (feet)	Noise Experienced at Noise Receptor (dB)
32.8	58.5
52.5	54
105	48
210	42
300	39.5
419.9	36

2.4.2. Inverters and Transformers

The solar facility will employ inverters scattered evenly across the Project site. The inverters could be small string inverters or large central inverters. The potential central inverters used for the Project are proposed to be SMA Sunny Central UP inverters (or similar), which includes a separate voltage supply and cooling system. According to the manufacturer's specifications, the noise emission produced by this inverter is rated at 67.0 dBA at an approximate distance of 33 feet. Utilizing the inverse square law for acoustics to calculate the distance attenuation (for every doubling of distance the sound level is reduced by 6 dB.) the noise levels and distances provided below show how little impact the operational noise of the inverters will have on residential receptors at distances greater than 200 feet from the source.

Table 6: Anticipated Noise produced by the SMA Sunny Central UP (or similar) Central Inverter

Distance from Noise Source to Receptor (feet)	Noise Experienced at Noise Receptor (dB)
3.28 (1 meter)	97.32
25	69.36
32.8 (10 meters)	67.00
50	63.00
100	57.32
150	53.80
200	51.30
300	47.78

Based on current site plans with projected inverter locations, the closest inverter to a residential receptor is approximately 300 feet in distance. The distance attenuation for the noise produced from the SMA Sunny Central UP Inverters at 300 feet is approximately 48 dB which is less than normal conversation speech at 5-10 feet (60 dB) and less than an open office background level (50 dB).

Bobwhite anticipates installing Eaton Cooper Power Series medium-voltage transformers, or an equivalent. These transformers are self-cooling and produce noise emissions of 56-68 dB at the source, depending on model unit and rating. This is approximately equivalent to the noise produced from a household air

conditioning unit. The medium-voltage transformers are co-located on a skid with each inverter and are not expected to be a significant source of noise for neighboring receptors.

The Project’s proposed electrical substation will utilize a Main Power Transformer (“MPT”) that is designed with an expected noise level of less than or equal to 77 dB at the source. SMG calculated the anticipated noise level at the nearest residential receptor assuming the transformer registered 77 dB at 20 feet from the transformer (noise source), this is a conservative assessment.

Table 7: Anticipated Noise Produced by the Project Substation’s Main Power Transformer

Distance from Noise Source to Receptor (feet)	Noise Experienced at Noise Receptor (dB)
20 (6 meters)	77
40	71
80 (24.4 meters)	65
160	59
320	53
640	47

The nearest residential receptor to the proposed Project’s electrical substation is approximately 300 feet to the south. The projected noise at the property line of the residence at this distance would be between 53-55 dB which is less than the noise levels generated during a normal conversation at 5-10 feet and just above what is typical for a quiet suburb (50 dB). This residence is adjacent to a major road and the existing Marion County 161-kV substation, which are both contributors of existing noise levels.

Bobwhite’s design configuration assumes inverters, medium-voltage transformers and the substation MPT are located 300 feet or more from what would be the closest residential receptor. The attenuation calculations demonstrate that the Project’s equipment at the distances proposed would not be a significant contributor of noise or have a materially different magnitude of impact on adjacent residential receptors. The noise levels generated from this type of equipment operation at the planned distances would be similar to background or common noise levels in a residential environment.

2.4.3. Site Operation and Maintenance

2.4.3.1. Vehicular Traffic

During regular operation Northern Bobwhite expects to have one technician driving in and out of the project up to 365 days a year and two or three technicians up to

100 days a year. Employees will be in mid- or full-sized trucks and will contribute less to traffic noise than a typical single-family home.

2.4.4. Maintenance Activities

Typical maintenance activities on the solar facilities will be minor repair and maintenance on the solar panels, tracking systems, electrical wiring, or maintenance and inspections of the inverters. Grounds maintenance will be performed through mechanical control of vegetation, and, if necessary, with herbicide applications as appropriate to control regulated noxious weeds per local, state, and federal regulations. These activities will be infrequent and would not be a significant contributor to noise in the surrounding area. Any sounds produced would be similar in magnitude and nuisance to what is experienced typically in residential areas from lawn mowing and similar activities.

3. Summary and Conclusions

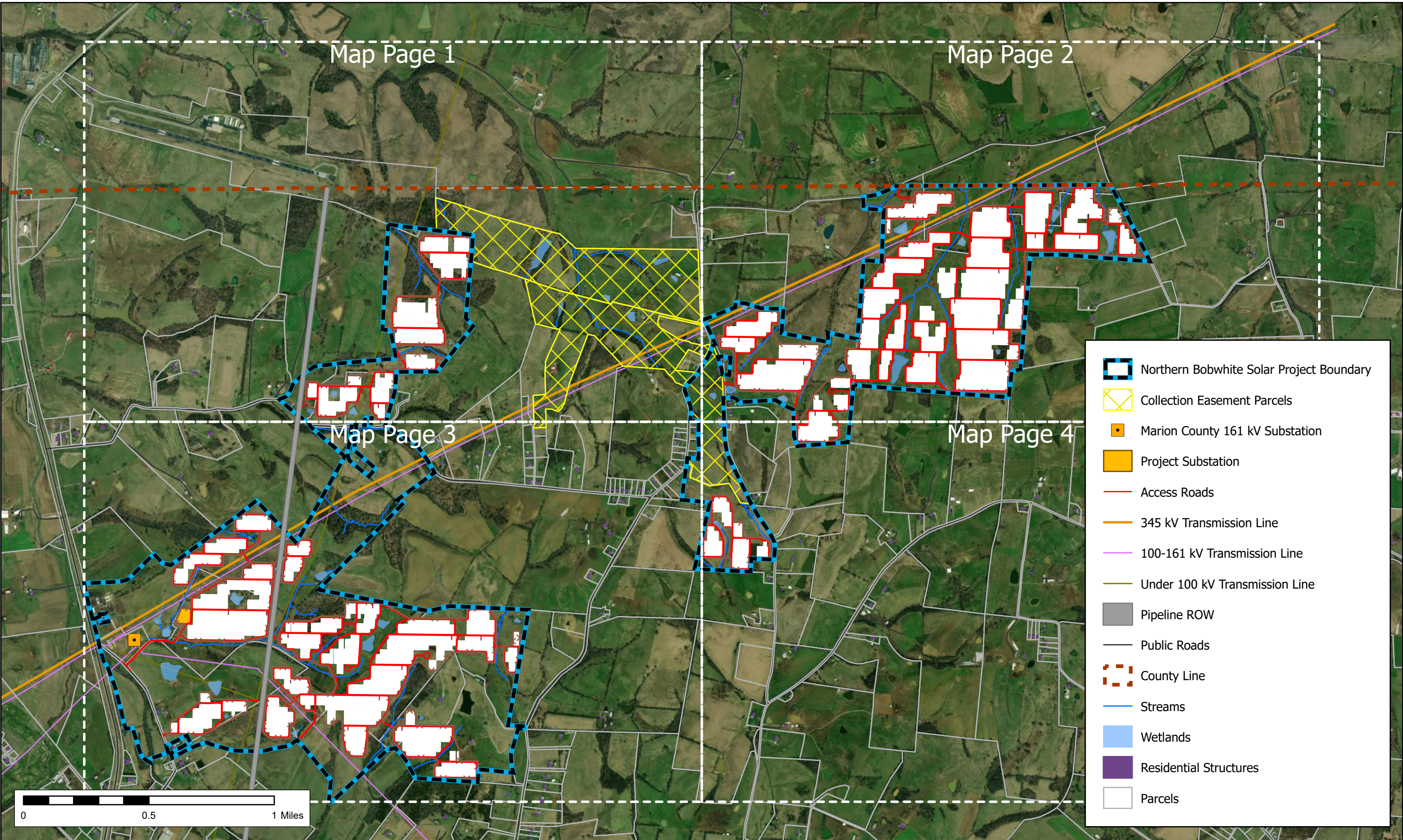
The impact on community noise levels can be evaluated with respect to the increase which the noise source would impose on this background level of noise. To our knowledge, there are no current Federal, State or locally applicable industrial noise statutes or regulations that are applicable to this Project. In the absence of regulations or city ordinances, there are guidelines which can be applied to understand the relative sound levels experienced at the sampling locations.

The US Environmental Protection Agency (“USEPA”) identifies residential areas as those areas where human beings live, including apartments, seasonal residence, mobile homes, and year-round residences. The USEPA states that a quiet environment is necessary in both urban and rural residential areas in order to prevent activity interference and annoyance, and to permit the hearing mechanism to recuperate if it is exposed to higher levels of noise during other periods of the day. According to the USEPA, yearly levels are sufficient to protect public health and welfare if they do not exceed a L_{dn} (Equivalent A-weighted sound level exposure over a 24-hour period- day and night) of 55 dBA outdoors in sensitive areas such as residences, schools, and hospitals. The day-night sound level (“ L_{dn} ”) is the 24-hour average sound level with a 10 dB penalty applied to the nighttime sound levels (10:00 PM to 7:00 AM) to account for increased sensitivity to noise during nighttime hours. Likewise, levels of 55 dB outdoors and 45 dB indoors are identified as preventing activity interference and annoyance. These levels of noise are considered those which will permit spoken conversation and other activities such as sleeping, working and recreation, which are part of the daily human condition. The EPA emphasizes that since the protective sound levels were derived without concern for technical or economic feasibility and contain a margin of safety to ensure their protective value, they must not be viewed as standards, criteria, regulations, or goals. EPA views these as levels which there is no reason to suspect that the general population will be at risk from any of the identified effects of noise at these levels. The EPA currently has no authority to regulate ambient noise levels.

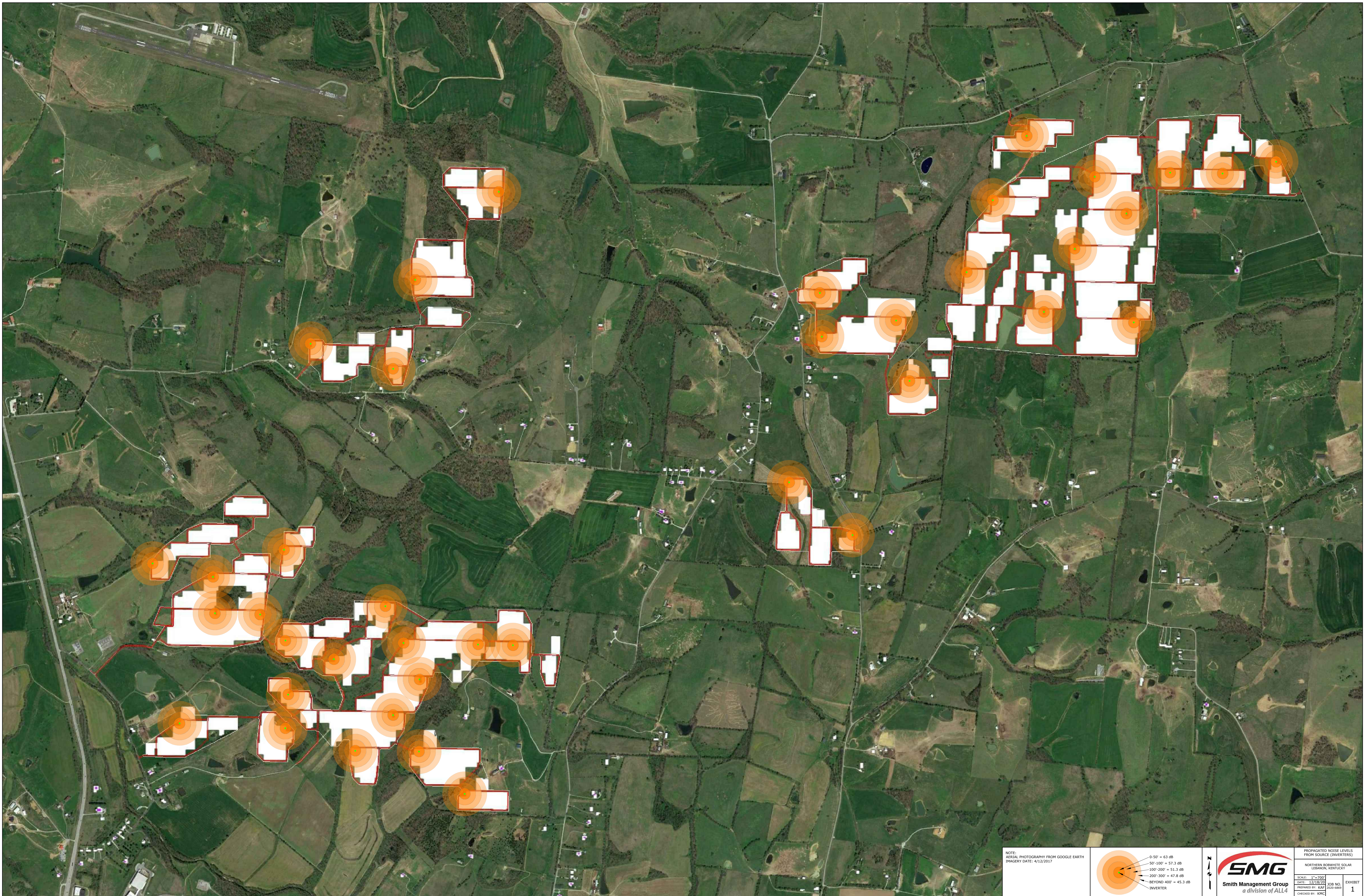
The project is expected to contribute below 55 dB outdoors measured at the receptor during operation from trackers, inverters and transformers (sounds measured indoors would be well below that). Normal home insulation and windows in residential buildings would provide further reduction in the noise levels measured inside the home by 10 dBA. Traffic during construction will be temporary and for the most part confined to daytime deliveries, which would not exceed the EPA 24 Hour Acceptable Noise Levels. The majority of construction activities will take place far away from residential areas. As the activities move further away from the site of the work being performed, noise measurements at the receptors will decrease.

Appendix A- Site Plan

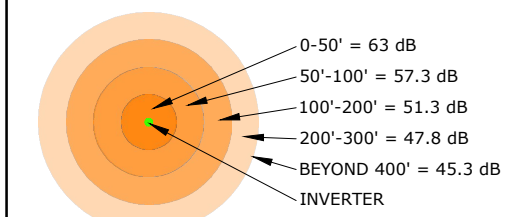
Source: Esri, Geenex, Marion County, Olsson Engineering | G:\Projects\USA_North\Northern_Bobwhite_Geenex05_GIS\Northern_Bobwhite.aprx | Layout: Site_Plan_Map_Overview_Tabloid | Last Updated 12/21/2020 by jessica.leonard



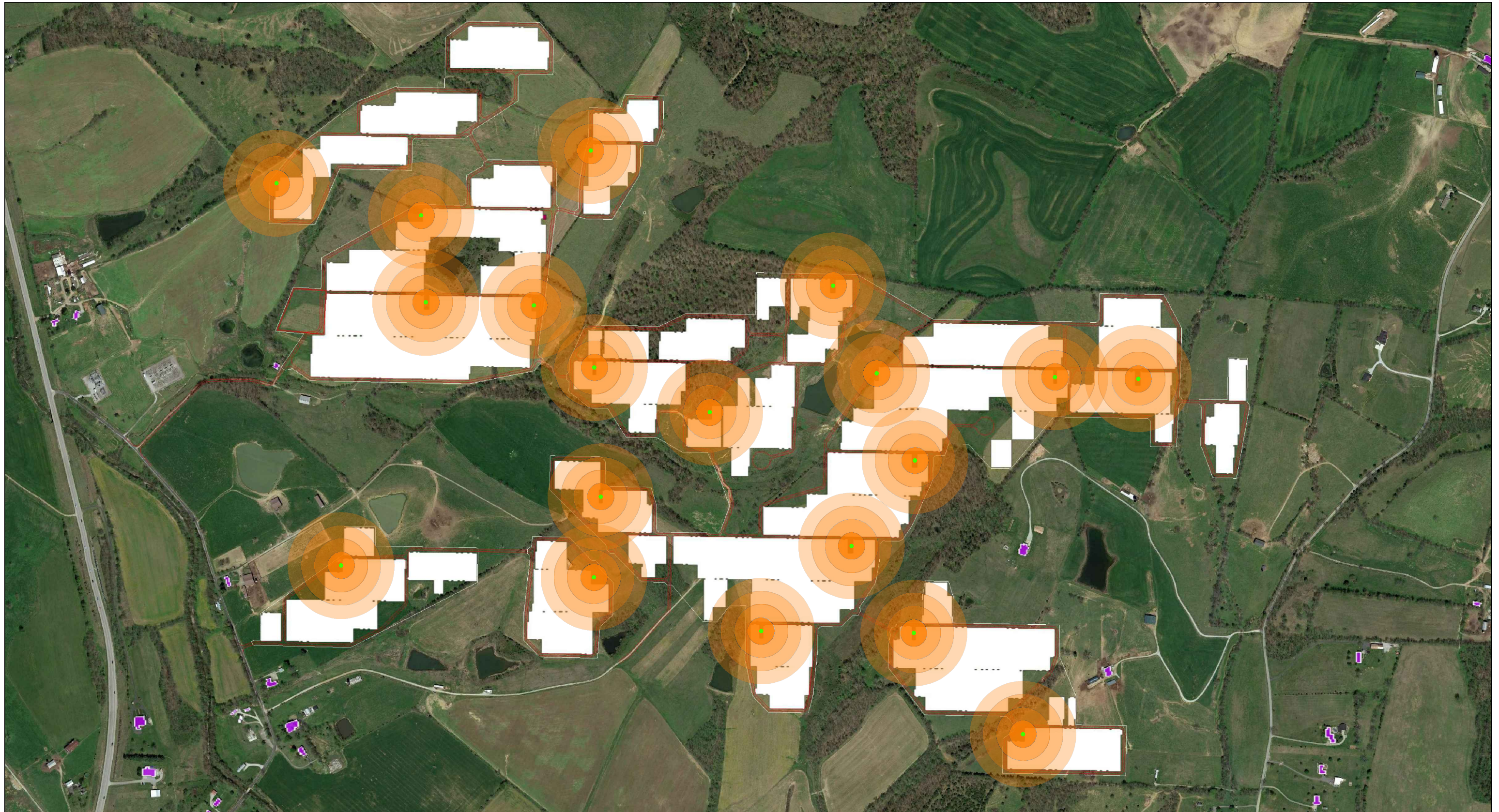
Appendix B- Site Plan with Propagated Noise Levels



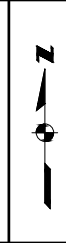
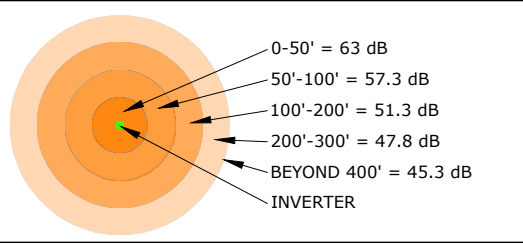
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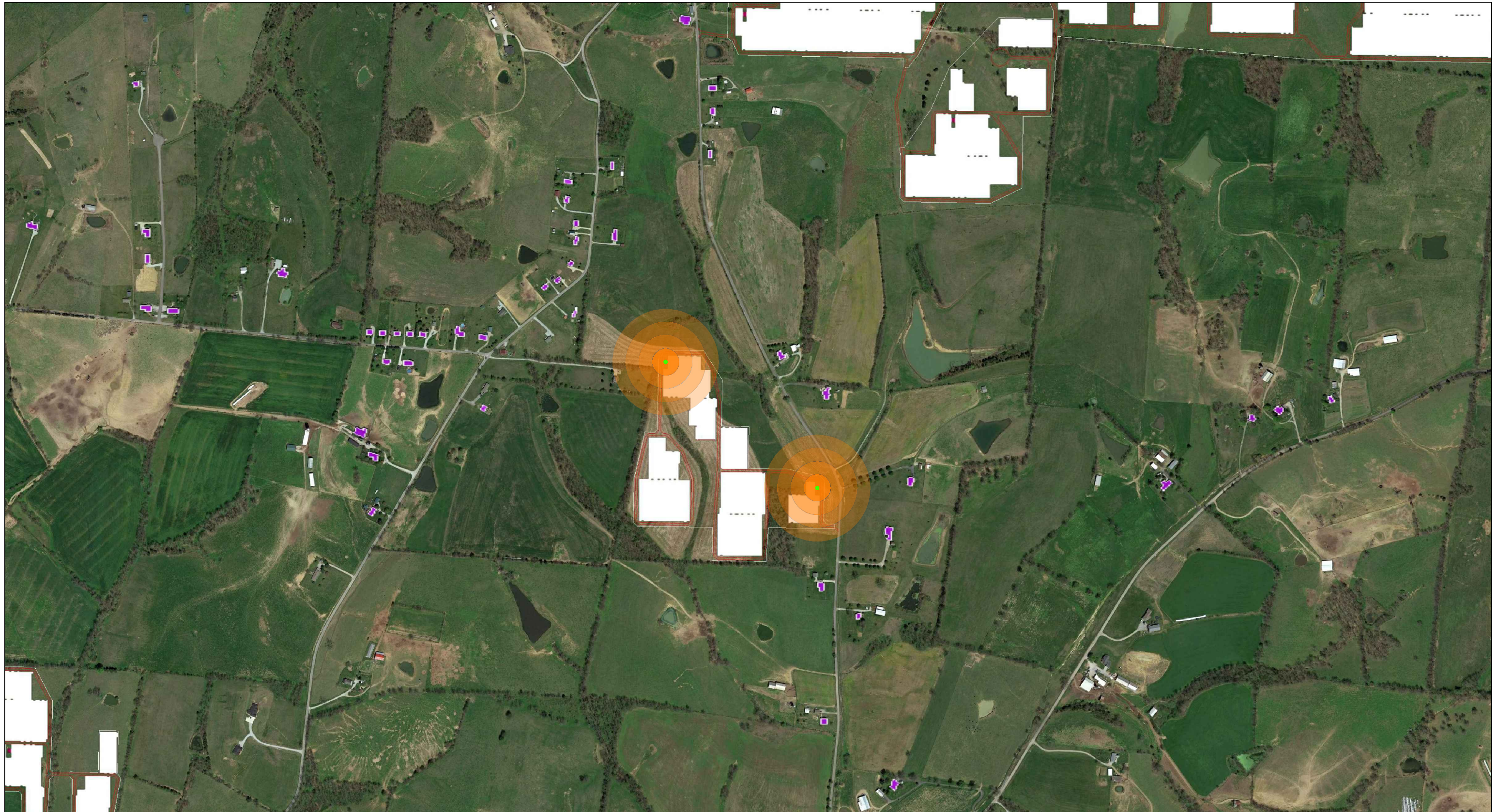
PROPAGATED NOISE LEVELS
 FROM SOURCE (INVERTERS)
 NORTHERN BOWWHITE SOLAR
 LEBANON, KENTUCKY
 SCALE: 1"=700'
 DATE: 12/18/20
 JOB NO. 2020-0869
 PREPARED BY: KAF
 CHECKED BY: KNC
 EXHIBIT 1



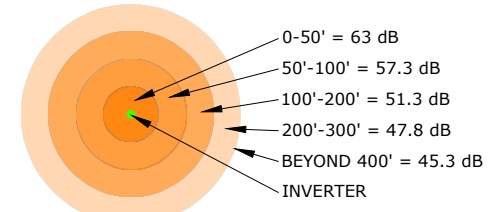
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PROPAGATED NOISE LEVELS FROM SOURCE (INVERTERS)	
NORTHERN BOBWHITE SOLAR LEBANON, KENTUCKY	
SCALE: 1"=700'	JOB NO. 2020-6869
DATE: 12/18/20	
PREPARED BY: KAF	
CHECKED BY: KMC	EXHIBIT A

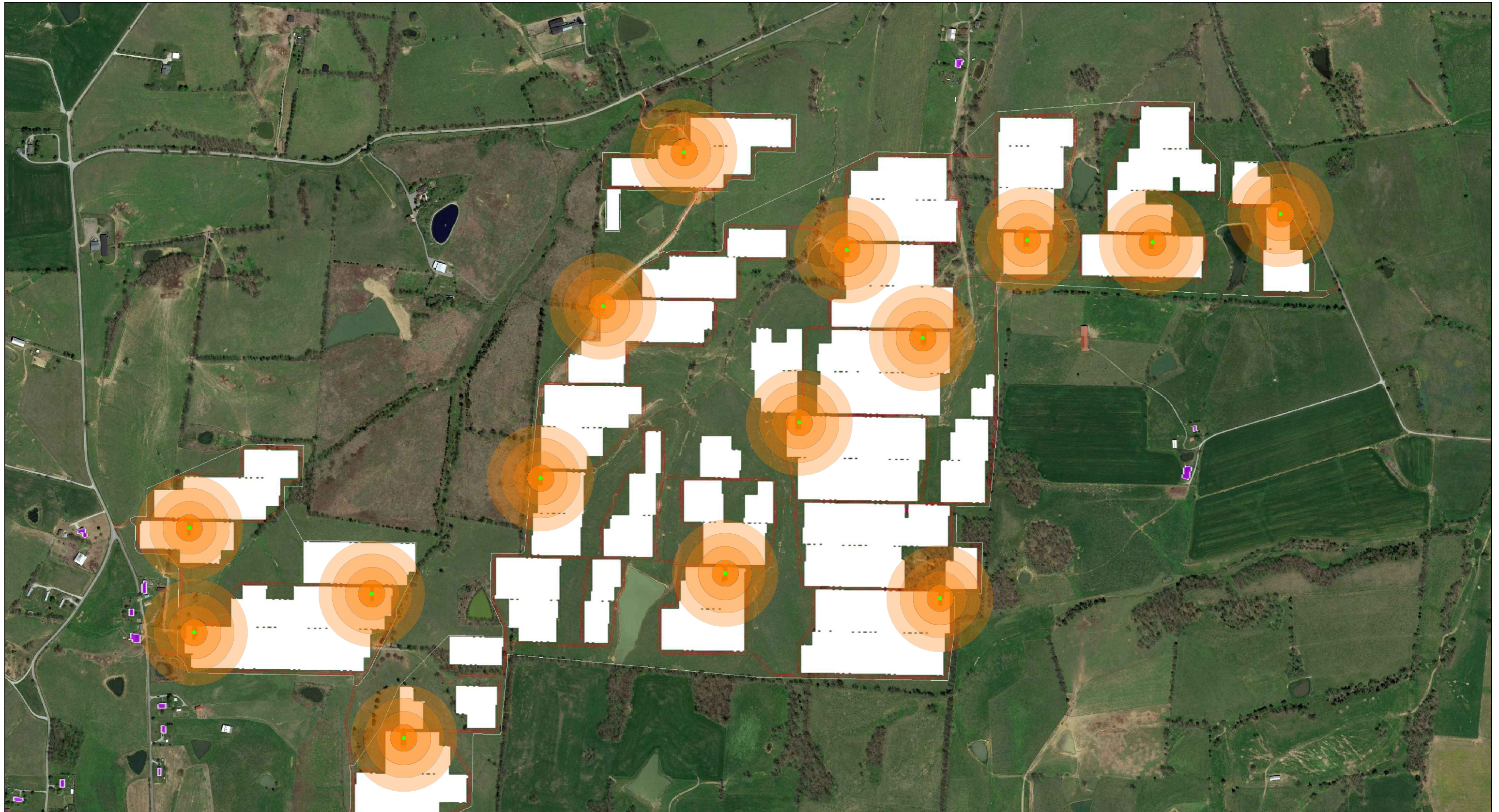


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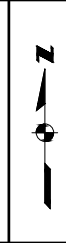
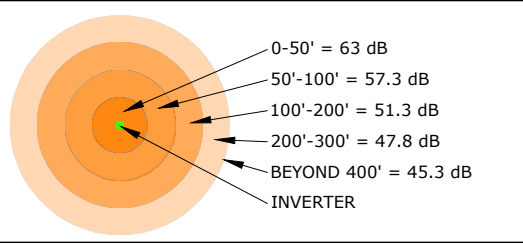


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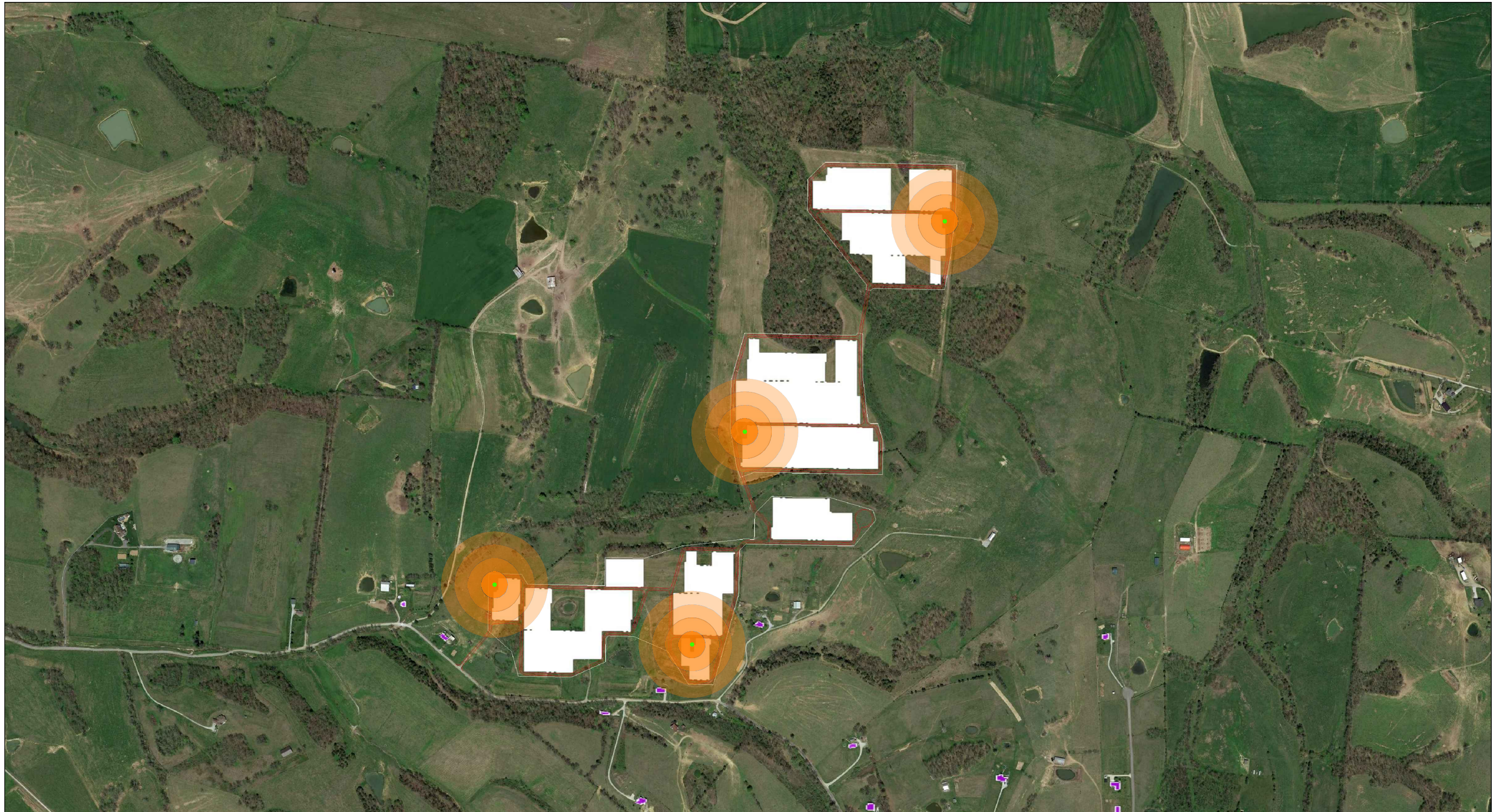
PROPAGATED NOISE LEVELS FROM SOURCE (INVERTERS)	
NORTHERN BOBWHITE SOLAR LEBANON, KENTUCKY	
SCALE: 1"=700'	JOB NO. 2020-6869
DATE: 12/18/20	
PREPARED BY: KAF	
CHECKED BY: KMC	EXHIBIT B



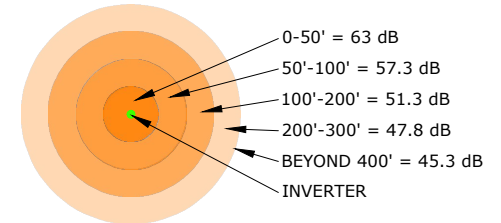
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 IMAGERY DATE: 4/12/2017



PROPAGATED NOISE LEVELS FROM SOURCE (INVERTERS)		
NORTHERN BOBWHITE SOLAR LEBANON, KENTUCKY		
SCALE: 1"=700'	DATE: 12/18/20	JOB NO. 2020-6869
PREPARED BY: KAF	CHECKED BY: KMC	
EXHIBIT C		



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PROPAGATED NOISE LEVELS FROM SOURCE (INVERTERS)	
NORTHERN BOBWHITE SOLAR LEBANON, KENTUCKY	
SCALE: 1"=700'	JOB NO. 2020-6869
DATE: 12/18/20	
PREPARED BY: KAF	
CHECKED BY: KMC	EXHIBIT D

Appendix E
Traffic Assessment

**TRAFFIC ASSESSMENT
NORTHERN BOBWHITE SOLAR, LLC PROJECT
MARION COUNTY, KENTUCKY**

December 2020



Smith Management Group
a division of ALL4

**1405 Mercer Road
Lexington, KY 40511
859-231-8936**

**TRAFFIC ASSESSMENT
NORTHERN BOBWHITE SOLAR, LLC PROJECT
MARION COUNTY, KENTUCKY**

December 2020

Prepared for:

NORTHERN BOBWHITE SOLAR LLC

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 - 1.1. Project Description 1
 - 1.2. Existing Land Use and Site Conditions..... 1
- 2. Traffic Study 2
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Table 1: Existing Road Network Classification

Table 2: ADT Monitoring Station Data

Table 3: Daily Site Access

APPENDICES

Appendix A- ADT Monitoring Station Data

1. Introduction

1.1. Project Description

The proposed Northern Bobwhite Solar Facility (“the Project”) will be a 96-megawatt alternating current (“MWac”) photovoltaic (“PV”) electric generating facility. The proposed project is to be located in unincorporated Marion County, KY, north of the City of Lebanon, KY and east of Highway 55 at approximate coordinates 37°36’56.80” N, -85°13’45.57” W. The project will be situated on up to 1300 acres, which has historically been used for agriculture and farming. Project components will include PV solar panels and the associated ground-mounted racking structure, access roads, inverters, medium voltage transformers, buried electrical collection cabling, a step-up substation, a short 161-kilovolt (“kV”) transmission line, security fencing, laydown areas, and an operations and maintenance (“O&M”) building.

The project will consist of a construction phase lasting approximately 12-18 months. This will include site grading and constructions of the solar panel arrays. Upon completion of the construction phase, ongoing operations of the project will last for approximately 20 - 40 years. The solar panels are self-sufficient in operation and will only require periodic maintenance and repair activities as well as regular groundskeeping.

1.2. Existing Land Use and Site Conditions

The proposed site consists of multiple parcels of cultivated and uncultivated farmland located in Marion County, Kentucky. The site is currently farmland for pastures and row crops. Surrounding land is primarily agricultural farmland with some residential properties.

2. Traffic Study

2.1. Existing Road Network and Traffic Conditions

Roadways located in the vicinity of the project are; one (1) Arterial Road, two (2) Collector Roads, and six (6) Local Roads listed in the **Table 1** below. KY-55 is a Principal Arterial, two-lane paved roadway connecting Lebanon, Kentucky to Springfield, Kentucky immediately West of the project. Collector Roads, KY-1195 and KY-1406 are both two-lane paved roadways. KY-1195 is located South-East of the project and passes closest to the project near the intersection of KY-1195 and Gene Campbell Road at approximately one-half mile from the project. KY-1406 runs South-East to North West near the center of the project and borders two (2) sections of the project near the intersections of Horace Lane and Gene Campbell Road. Local Roads are a combination of single-lane, two-lane, paved and gravel roads adjacent and in the vicinity of the Project. Figure 1 provides an overview of the main traffic routes.

Table 1: Existing Road Network Classification

Roadway	Classification
KY-55 Springfield Road	Principal Arterial
KY-1195 Shortline Pike	Minor Collector
KY-1406 Barbers Mill Road	Minor Collector
Gene Campbell Road	Local Road
Green Valley Road	Local Road
Horace Lane	Local Road
Radio Station Road	Local Road
Saint Ives Road	Local Road
Simstown Road	Local Road

The Average Daily Traffic (“ADT”) is defined as the average number of vehicles traveling two-way passed a specific point or monitoring station in a 24-hour period. There are six ADT monitoring stations in the project vicinity summarized in the table below. ADT Monitoring Station reports obtained from KYTC Traffic Count Reporting System are included in **Appendix A- ADT Monitoring Station Data**.

Table 2: ADT Monitoring Station Data

Station ID	Roadway	Location and Distance (feet) and Direction from the Nearest Property Boundary	ADT (average number of vehicles/ 24-hour period)	Year Assessed	% Single	% Combo	K Factor	D Factor
078786	KY-55 Springfield Road	MP 3.0 80 feet East	10,015	2019	5.464	2.298	6.5	58
078019	KY-1195 Short Line Pike	MP 1.5 3,400 feet North	467	2019	-	-	9.9	58
078022	Simstown Road	MP 0.0 2,600 feet South	121	2019	-	-	14.9	58
078024	KY-1406 Barbers Mill Road	MP 3.0 20 feet east	337	2018	-	-	11	57
078023	Horan Lane	MP 1.85 1,800 feet East	214	2009	-	-	-	-
078025	Radio Station Road	MP 0.491 20 feet East	138	2009	-	-	-	-

Sta. ID - Three-digit county number + station number

MP – mile point

AADT – Annual Average Daily Traffic – the annualized average 24-hour volume of vehicles on a segment of roadway

% Single – single unit truck volume as a percentage of the AADT

% Combo – combination truck volume as a percentage of the AADT

K Factor – peak hour volume as a percentage of the AADT

D Factor – percentage of peak hour volume flowing in the peak direction

2.2. Construction Traffic

Primary access to the Project site for all personnel and deliveries will be via KY-55. The Project will have a primary material laydown area located within the project perimeter off Radio Station Road. Internal gravel roads will be utilized to move equipment and materials throughout the project when possible. KY-1195 and KY-1406 will be used to move equipment and materials from the laydown area to other project areas when internal roads cannot be used. When possible, equipment and materials will be coordinated to be delivered to the respective areas at which they will be used to minimize traffic between project areas. A site plan showing preliminary internal roadway is included as **Appendix C of the Exhibit O Site Assessment Report**.

Construction traffic to the site will take place during normal operating hours between 7:00AM and 10:00PM, and the majority of traffic will occur during hours of daylight. Construction workers will travel to the project site using Class 2 & 3 commuter vehicles arriving at the site

around 7:00AM and departing typically by 6:00PM and no later than 10:00PM daily. Deliveries of equipment and materials will normally take place throughout the operating hours of 7:00AM-6:00PM. Some evening deliveries may occasionally be required.

Most equipment and material deliveries will be by Class 9 freight trucks. Several oversized vehicles will deliver heavy machinery to the project site for grading and solar panel construction. Grading machinery will be delivered to the site at the project commencement and will remain on site until grading has been completed. Telehandler lifts will remain on site for the duration of the project once delivered. The largest vehicle expected on site will be used for the delivery of the substation transformer. The expected weight is approximately 60 tons. **Table 3** below shows the anticipated average and peak traffic to the site by vehicle class.

Table 3: Daily Site Access

Daily Vehicle Site Access			
Class 2 & 3 Commuter Vehicles		Class 9 Freight Trucks	
Average	Peak	Average	Peak
250	350	6	20

An anticipated 100 local workers and 150 non-local workers will commute to the site each day and park within the project boundaries avoiding parking on roads, public lots and private lots. Local workers will commute from their homes while non-local workers will commute from hotels, rentals, and extended stay facilities. No temporary housing facilities will be located on site. When possible, workers will carpool to the site. Local construction labor will generally be recruited from within a 60-minute driving radius of the site.

2.2.1. Traffic Safety Precautions

There are no anticipated lane closures or changes to existing traffic patterns resulting from the construction of the solar facility. Signage will be placed along roadways to notify drivers of trucks leaving and entering the roadways to reduce the risk of accidents. If necessary, flaggers will be used to temporarily stop traffic to allow for delivery trucks to enter and exit the roadways safely in any areas that may pose a concern to local traffic. On smaller local roads, signage will be placed along the roadways to notify drivers of the presence of trucks.

2.2.2. Impact on Road Infrastructure

Significant degradation to the existing roadways is not anticipated for the proposed project. The increase in localized traffic and the continued entry and exit of heavy trucks or equipment has potential to result in additional wear of the existing roadway or shoulders. Any damage to public roads resulting from project construction will be rectified.

Access drives and internal roads will be constructed or improved as needed to accommodate appropriate vehicles and equipment to construct the proposed solar facility. Internal roads will be compacted gravel and water will be used to minimize dust when necessary.

2.3. Operational and Maintenance Traffic

The operation of the facility will mostly be un-manned with approximately two employees making site visits three times a week to inspect the site, ensure proper equipment operation, and note any maintenance needs. Maintenance will occur periodically and will be limited to typical working hours Monday through Friday. Access to the site for both operation and maintenance activities will use Class 2 or Class 3 vehicles and will not contribute to a substantial traffic increase.

2.4. Traffic Summary and Conclusions

Traffic in the project vicinity is expected to temporarily increase during the construction phase of the Project. The largest increase in traffic will occur in mornings and evenings when construction workers are arriving and departing from the site during project construction. There will be an increase of Class 9 freight trucks in the project vicinity as deliveries are made to the site. Most of the traffic will travel via, KY-55, KY-1195 and KY-1406 which are principal arterial and minor collector roads and designed to handle high levels of traffic. Local roads will experience the most significant changes in traffic volumes. Based on ADT data, the existing traffic on these roads is low and the increase in construction traffic will not cause any significant issues. Appropriate signage and traffic control will be implemented to increase driver safety and reduce the risk of accidents on all roads that will be used for construction traffic. Upon the completion of the construction phase of the project, traffic levels will return to their pre-construction levels for the operational phase. Traffic for operation and maintenance of the facility will typically be less than a typical single-family home and will have little to no effect to traffic.

3. 3.0 Fugitive Dust Impacts

Land disturbing activities associated with the proposed project may temporarily contribute to airborne materials, which could reduce visibility for drivers. To reduce wind erosion of recently disturbed areas, appropriate revegetation measures, application of water, or covering of spoil piles may occur. In addition, any open-bodied truck transporting dirt will be covered when the vehicle is in motion. The size of the project site, distance to nearby structures and roadways, combined with vegetated buffers and fencerows will aid in managing off-site dust impacts. Internal roads will be compacted gravel, which may result in an increase in airborne dust particles during dry conditions with heavy internal road traffic. During construction activities, water may be applied to internal road systems to reduce dust generation. Water used for dust control is authorized under the Kentucky Pollutant Discharge Elimination System (“KPDES”) as a non-stormwater discharge activity, which will be required for the proposed project.

4. Impact to Rail

There are no railroads, spurs, or other rail facilities in the project area. The proposed solar facility project will have no effect on rail.

Figure 1- Site Plan - Primary Traffic Routes



NOTE:
 AERIAL PHOTOGRAPHY FROM GOOGLE EARTH
 IMAGERY DATE: 4/12/2017

— TRAFFIC



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PRIMARY ROADS		
NORTHERN BOBWHITE SOLAR LEBANON, KENTUCKY		
SCALE: AS SHOWN	JOB NO. 2020-6869	FIGURE 1
DATE: 12/18/20		
PREPARED BY: KAF		
CHECKED BY: KMC		

Appendix A- ADT Monitoring Station Data

Historical Traffic Volume Summary

Station Details:

Sta ID:	078786
Sta Type:	Full Coverage
Map:	MapIt
District:	4
County:	Marion
Route:	078-KY-0055 -000
Route Desc:	SPRINGFIELD HWY

Begin MP:	1.8660
Begin Desc:	KY 2154
End Mp:	4.6690
End Desc:	WASHINGTON COUNTY LINE
Impact Year:	
Year Added:	

Newest Count:

AADT:	10015
Year:	2019
% Single:	5.4640
% Combo:	2.2980
K Factor:	9.50
D Factor:	58

Definitions:

Sta. ID - Three digit county number + station number

MP - milepoint

Impact Year – year of significant change to traffic pattern within station segment

AADT – Annual Average Daily Traffic – the annualized average 24-hour volume of vehicles on a segment of roadway

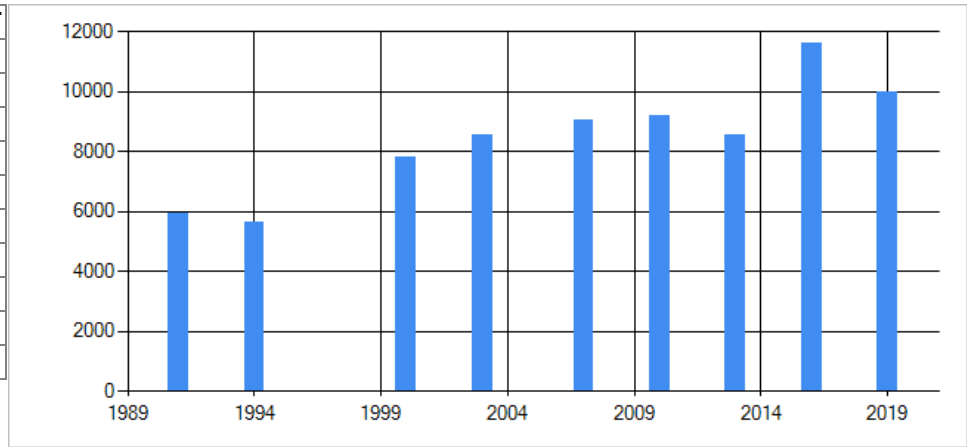
% Single – single unit truck volume as a percentage of the AADT

% Combo – combination truck volume as a percentage of the AADT

K Factor – peak hour volume as a percentage of the AADT

D Factor – percentage of peak hour volume flowing in the peak direction

ear	AA T	ear	AA T	ear	AA T
2020		2010	9220	2000	7810
2019	10015	2009		1999	
2018		2008		1998	
2017		2007	9070	1997	
2016	11617	2006		1996	
2015		2005		1995	
2014		2004		1994	5650
2013	8548	2003	8550	1993	
2012		2002		1992	
2011		2001		1991	5950



Historical Traffic Volume Summary

Station Details:

Sta ID:	078019
Sta Type:	Full Coverage
Map:	MapIt
District:	4
County:	Marion
Route:	078-KY-1195 -000
Route Desc:	SHORTLINE PIKE

Begin MP:	0
Begin Desc:	US 68
End Mp:	3.03
End Desc:	HUNDLEY LANE
Impact Year:	
Year Added:	

Newest Count:

AADT:	467
Year:	2019
% Single:	
% Combo:	
K Factor:	9.90
D Factor:	58

Definitions:

Sta. ID - Three digit county number + station number

MP - milepoint

Impact Year – year of significant change to traffic pattern within station segment

AADT – Annual Average Daily Traffic – the annualized average 24-hour volume of vehicles on a segment of roadway

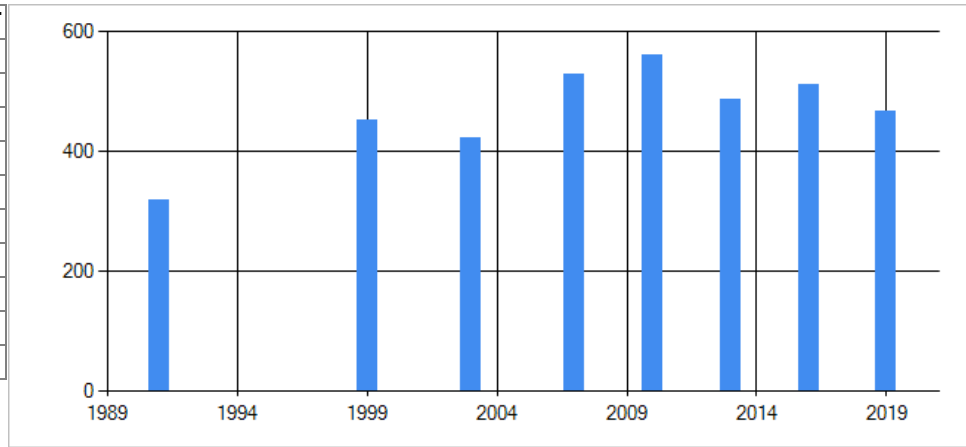
% Single – single unit truck volume as a percentage of the AADT

% Combo – combination truck volume as a percentage of the AADT

K Factor – peak hour volume as a percentage of the AADT

D Factor – percentage of peak hour volume flowing in the peak direction

ear	AA T	ear	AA T	ear	AA T
2020		2010	562	2000	
2019	467	2009		1999	452
2018		2008		1998	
2017		2007	529	1997	
2016	512	2006		1996	
2015		2005		1995	
2014		2004		1994	
2013	487	2003	424	1993	
2012		2002		1992	
2011		2001		1991	319



Historical Traffic Volume Summary

Station Details:

Sta ID:	078022
Sta Type:	Full Coverage
Map:	MapIt
District:	4
County:	Marion
Route:	078-KY-2758 -000
Route Desc:	SIMMSTOWN RD

Begin MP:	0
Begin Desc:	KY 1404
End Mp:	0.8260
End Desc:	WASHINGTON COUNTY LINE
Impact Year:	
Year Added:	

Newest Count:

AADT:	121
Year:	2019
% Single:	
% Combo:	
K Factor:	14.90
D Factor:	58

Definitions:

Sta. ID - Three digit county number + station number

MP - milepoint

Impact Year – year of significant change to traffic pattern within station segment

AADT – Annual Average Daily Traffic – the annualized average 24-hour volume of vehicles on a segment of roadway

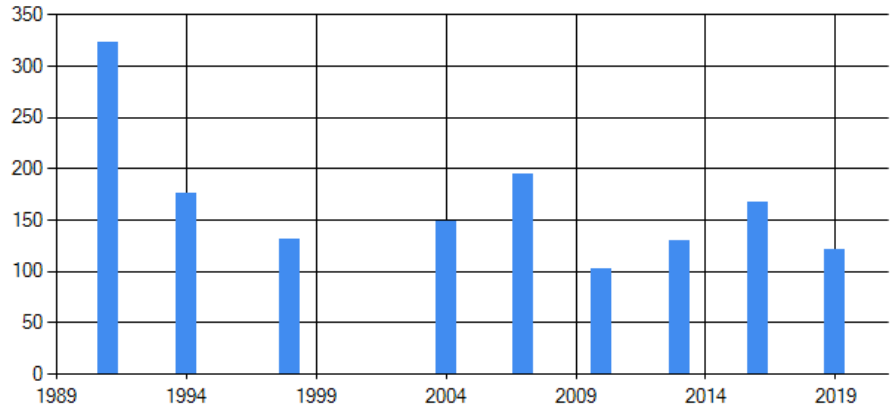
% Single – single unit truck volume as a percentage of the AADT

% Combo – combination truck volume as a percentage of the AADT

K Factor – peak hour volume as a percentage of the AADT

D Factor – percentage of peak hour volume flowing in the peak direction

ear	AA T	ear	AA T	ear	AA T
2020		2010	102	2000	
2019	121	2009		1999	
2018		2008		1998	131
2017		2007	195	1997	
2016	167	2006		1996	
2015		2005		1995	
2014		2004	148	1994	176
2013	130	2003		1993	
2012		2002		1992	
2011		2001		1991	323



Historical Traffic Volume Summary

Station Details:

Sta ID:	078024
Sta Type:	Full Coverage
Map:	MapIt
District:	4
County:	Marion
Route:	078-KY-1404 -000
Route Desc:	BARBERS MILL RD

Begin MP:	0
Begin Desc:	US 68
End Mp:	4
End Desc:	WASHINGTON COUNTY LINE
Impact Year:	
Year Added:	

Newest Count:

AADT:	337
Year:	2018
% Single:	
% Combo:	
K Factor:	11
D Factor:	57

Definitions:

Sta. ID - Three digit county number + station number

MP - milepoint

Impact Year – year of significant change to traffic pattern within station segment

AADT – Annual Average Daily Traffic – the annualized average 24-hour volume of vehicles on a segment of roadway

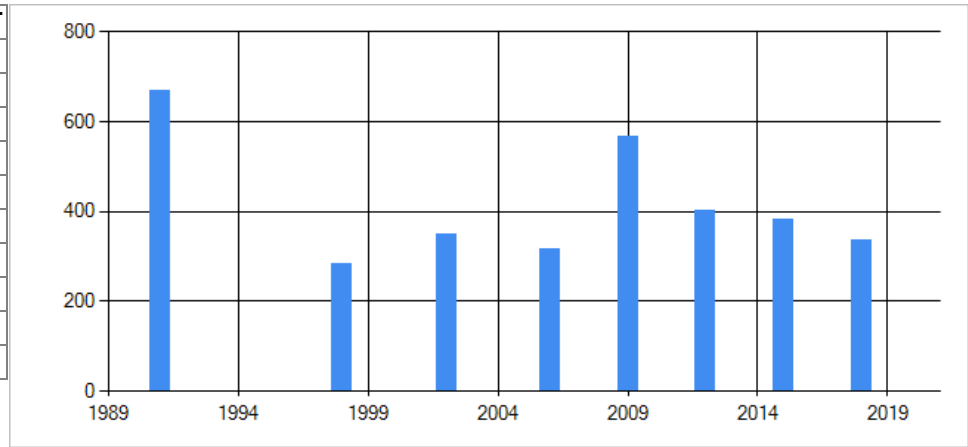
% Single – single unit truck volume as a percentage of the AADT

% Combo – combination truck volume as a percentage of the AADT

K Factor – peak hour volume as a percentage of the AADT

D Factor – percentage of peak hour volume flowing in the peak direction

ear	AA T	ear	AA T	ear	AA T
2020		2010		2000	
2019		2009	566	1999	
2018	337	2008		1998	283
2017		2007		1997	
2016		2006	318	1996	
2015	384	2005		1995	
2014		2004		1994	
2013		2003		1993	
2012	403	2002	349	1992	
2011		2001		1991	670



Historical Traffic Volume Summary

Station Details:

Sta ID:	078023
Sta Type:	Local Road Bridge
Map:	MapIt
District:	4
County:	Marion
Route:	078-CR-1038 -000
Route Desc:	HORAN LN

Begin MP:	1.7770
Begin Desc:	
End Mp:	1.9770
End Desc:	
Impact Year:	
Year Added:	

Newest Count:

AADT:	214
Year:	2009
% Single:	
% Combo:	
K Factor:	
D Factor:	

Definitions:

Sta. ID - Three digit county number + station number

MP - milepoint

Impact Year – year of significant change to traffic pattern within station segment

AADT – Annual Average Daily Traffic – the annualized average 24-hour volume of vehicles on a segment of roadway

% Single – single unit truck volume as a percentage of the AADT

% Combo – combination truck volume as a percentage of the AADT

K Factor – peak hour volume as a percentage of the AADT

D Factor – percentage of peak hour volume flowing in the peak direction

ear	AA T	ear	AA T	ear	AA T
2020		2010		2000	
2019		2009	214	1999	
2018		2008		1998	
2017		2007		1997	
2016		2006		1996	
2015		2005		1995	
2014		2004		1994	
2013		2003		1993	
2012		2002		1992	
2011		2001		1991	

