



DEPARTMENT OF COMMUNITY DEVELOPMENT SERVICES

Planning Division

m e m o r a n d u m

TO: Mayor Diane Wolfe Marlin and City Council Members

FROM: Sheila Dodd, Interim Community Development Services Director
Marcus Ricci, AICP, Planner II

DATE: April 7, 2022

SUBJECT: **A Resolution to Protest a Proposed Text Amendment to the Champaign County Zoning Ordinance (Data Center – PV Solar Array / CCZBA-030-AT-21)**

Introduction

The Champaign County Zoning Administrator (Zoning Administrator) requests a text amendment to the Champaign County Zoning Ordinance (Ordinance) to add “Data Center” and “Photovoltaic (PV) Solar Array” to Section 5.2 Table of Authorized Principal Uses. Data Center is proposed as a Special Use in the AG-2 Agriculture, B-4 General Business and I-1 Light Industry Zoning Districts. PV Solar Array is proposed as a second Principal Use on a lot with a County Board-Approved Special Use Permit in the AG-2 Agriculture Zoning District, or as a Principal Use with a County Board-Approved Special Use Permit in the AG-2 Agriculture and in all Business and Industrial Zoning Districts.

The proposed text amendment is of interest to the City of Urbana because it may affect zoning and land development decisions within the City’s one-and-a-half mile extraterritorial jurisdiction (ETJ). The City has subdivision and land development jurisdiction within the ETJ, while the County holds zoning jurisdiction in this area.

The City has the right to protest County text amendments by filing a protest by the date the case goes before the Board. Under state law, a municipal protest of the proposed amendment would require three-quarters super-majority of affirmative votes for approval of the request at the County Board; otherwise, a simple majority would be required.

The Plan Commission heard this case on March 24, 2022, and recommends City Council not protest the proposed amendment. Staff agrees with the recommendation because the proposed text amendment would minimize land use incompatibilities and still allow the City to plan and manage development through the County Special Use Permit review process.

Background

Proposed Use

Champaign County Department of Planning & Zoning (CCDPZ) has an applicant interested in establishing a data processing center that includes a two-megawatt (MW) solar array to power the facility. There are different types of data centers; the one proposed has no on-site employees and is essentially one or more 20-foot by 100-foot (2,000 square feet (sf)) storage boxes housing computer

servers and related electronics. A principal use data center is different from the typical business office with a server room, and warrants its own land use category and requirements. The solar array in this situation is also different because it is designed to power the on-site data processing center rather than for wholesale energy sales to the utility grid.

County Timeline

At its December 9, 2021, meeting, the Champaign County Environment and Land Use Committee (ELUC) reviewed a memorandum (Exhibit A, page 5) regarding the proposed addition of Data Center and PV Solar Array land uses. ELUC approved opening a Champaign County Zoning Board of Appeals (ZBA) public hearing for these amendments at its December 9, 2021, meeting. On January 18, 2022, CCDPZ Zoning Administrator John Hall issued a Preliminary Memorandum with the Proposed Amendment and a Preliminary Draft of Finding of Fact and Final Determination (Exhibit A, page 7 and pages 9-27, respectively). On January 27, the CCZBA opened its public hearing, and closed the public hearing at its February 17 meeting. On March 3, Zoning Administrator Hall issued Supplemental Memorandum #1 with additional Special Conditions to address concerns regarding PV solar array interconnection agreements and data center noise (Exhibit B). These additions to the proposed amendment are shown in red ink.

ELUC is scheduled to review the CCZBA's decision at its April 7, 2022, meeting and then make a recommendation to the Champaign County Board at its May 5 meeting. The Board could hear the case at its May 19 meeting, at the earliest.

Proposed Amendment

The proposed amendment would allow two uses that are not listed in Section 5.2 Table of Authorized Principal Uses in the Ordinance: Data Center and PV Solar Array (see Table 1).

First: a Data Center would be permitted as a Special Use in the AG-2 Agriculture (green), B-4 General Business (blue), and I-1 Light Industry (black) Zoning Districts. These allowed areas of the ETJ are shown in Exhibit C.

Second: a PV Solar Array would be permitted under one of three options (Figure 1). First, as a second principal use on a lot in the AG-2 Zoning District (green) as a County Board-approved Special Use. These areas are shown in Exhibit D. Second, as a principal use in the AG-2 (green), and in any Business (blue) or Industrial (black) Zoning Districts. Third, as an Accessory Structure PV Solar Array in any zoning district if it is ***less than 1 MW*** in size, and on the same lot as a principal structure. Accessory Structure PV Solar Arrays must comply with the existing standards for other accessory structures.

Any PV Solar Array ***greater than or equal to 1 MW*** in size would be regulated like a PV Solar Farm under Section 6.1.5., without regard to its relationship to any other use or structure on the property (Figure 1). PV Solar Farms, defined as “for the primary purpose of wholesale sales of generated electricity,” are permitted only in the AG-1 and AG-2 Zoning Districts as a County Board-approved Special Use, which means the site and operations plans must be reviewed and approved by the Champaign County Board. This includes stricter requirements including: decommissioning and site reclamation plans; buffer distances from incorporated municipalities and certain zoning districts; setbacks from streets, non-participating properties, airports, substations, and property lines; protections for agriculture and public streets; screening and fencing; glare minimization; liability insurance; and operational standards.

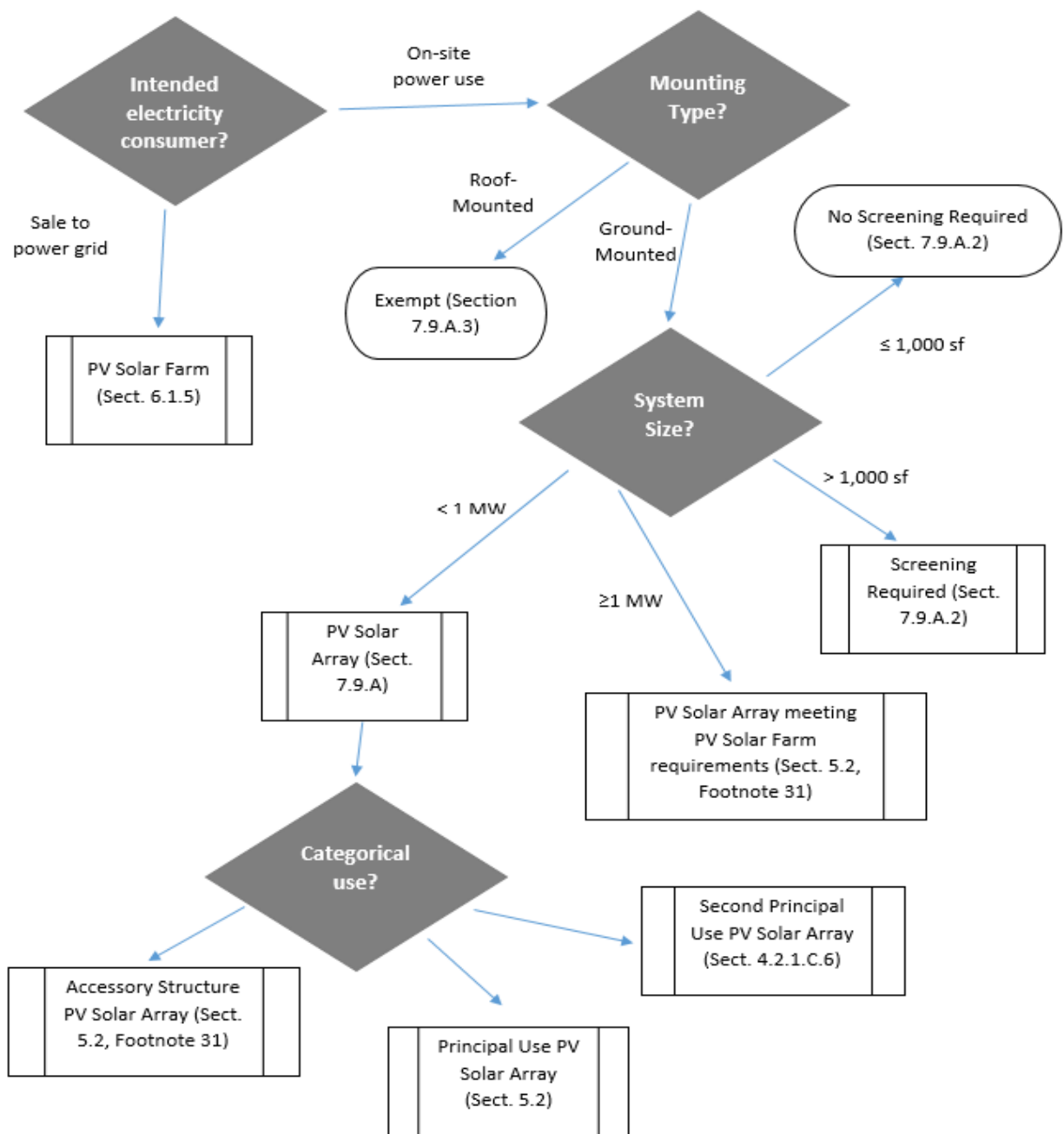


Figure 1. Champaign County Proposed Solar Array Process Flowchart (prepared by City of Urbana)

PV Solar Arrays **greater than 1,000 sf** would be required to be screened, similar to the existing screening requirements for Outdoor Storage or Outdoor Operations (see Figure 1; Sections 7.6.2 and 7.6.3). Both of these screening regulation sections are less strict than the screening standards for a PV Solar Farm, making it easier to site a small solar energy installation. For example, a large PV Solar Array Accessory would require an eight-foot-tall berm, fence, or wall; while a PV Solar Farm would require, specifically, a vegetated buffer that meets Natural Resources Conservation Services Standard 380 for Windbreak/Shelterbreak.

Discussion

County Zoning

The intents of the County’s AG-2, Business, and Industrial districts are defined in the Ordinance (Exhibit E). While the intent of the AG districts is to “preserve the agricultural nature within areas which are predominantly vacant and which presently do not demonstrate any significant potential for development,” the Finding of Fact explains how Data Centers and PV Solar Arrays align with the LRMP Goals. For example: “PV Solar Arrays do not require the permanent conversion of farmland; solar arrays can be removed at the owner’s choosing and the land can be put back into agricultural production.” Another example: “The proposed text amendment will allow development of Data Centers and PV Solar Arrays, which will allow newer technologies to improve Champaign County’s business climate.” County land within the City’s ETJ is dominated by agricultural (81%) zoning, mostly AG-2, with small areas zoned residential (8%) and conservation (7%), with little business (2%), or industrial (3%) zoning. Data Centers would be permitted as a Special Use in the AG-2, B-4 and I-1 districts (Exhibit C). PV Solar Arrays would be permitted as a second principal use in the AG-2 district as a County Board-approved Special Use or as a principal use in the AG-2 Zoning District or in any Business or Industrial Zoning District as a County Board-approved Special Use (Exhibit D).

City Zoning

City staff reviewed the proposed text amendment to identify potential land use conflicts within the City and ETJ, and finds that it would minimize land use incompatibilities and still allow the City to plan and manage development through the County Special Use Permit review process. The configuration of the proposed data center and PV solar array is similar to one approved by the Urbana Zoning Board of Appeals to allow multiple principal structures on a single parcel.¹ The proposed county text amendment uses the same definition of a data center that the City of Urbana used in this case: “a centralized location where computing and networking equipment is concentrated for the purpose of collecting, storing, processing, distributing or allowing access to large amounts of data.”

The City does not list Data Centers or PV Solar Arrays as principal uses in Table V-1 Table of Uses. Planning staff are working on a zoning text amendment to add PV Solar Arrays as a principal use and to allow Accessory PV Solar Arrays as Accessory Structures. The Urbana Zoning Administrator has determined that an Electrical Substation is the most-similar use to a data center; these are permitted in the B-3, B-4, B-4E zoning districts, and in both Industrial districts (see Table 1).² Electrical Substations are also allowed in the B-1, B-2, R-4, R-5, and R-6/B Zoning Districts as a Conditional Use, and in the R-1, R-2, R-3, and AG Zoning Districts as a Special Use. **Currently, the City permits data centers in many more zoning districts (15 districts), with lower levels of permitting and fewer specific conditions than the County’s proposed amendment would allow (3 districts).**

The Zoning Administrator also determined that an Electrical Substation is the most-similar use to a principal-use PV solar array – without regard to size – and permits them in the aforementioned districts. **Currently, the City permits large-scale PV solar arrays in more zoning districts (15 districts) with lower levels of permitting and fewer conditions than the County’s proposed amendment would allow (2 districts).**

¹ Case ZBA-2020-C-03, Anthony Donato.

² City of Urbana Zoning Ordinance, Section V-1.B.

Table 1. Comparison of County and City Zoning Districts

Principal Use	County	City
Data Center - Permitted zoning districts	Special Use: AG-2, B-4, I-1	Treated as an Electrical Substation Permitted Use: B-3, B-4/E, I-1, I-2 Conditional Use: B-1, B-2, R-4, R-5, R-6/B Special Use: R-1, R-2, R-3, AG
PV Solar Array	<1 MW in size; either Principal Use, Second Principal Use, or Accessory Structure	Principal Use PV Solar Arrays are treated as an Electrical Substation. PV Arrays supplying a specific use are treated as a Mechanical.
- Permitted zoning districts	a. Second Principal Use – County Board-Approved Special Use: AG-2 b. Principal Use – County Board-Approved Special Use: AG-2, Business, Industrial c. Accessory Structure: any district	Permitted Use: B-3, B-4/E, I-1, I-2 Conditional Use: B-1, B-2, R-4, R-5, R-6/B Special Use: R-1, R-2, R-3, AG ----- Mechanicals: any district
PV Solar Farm	> 1MW in size	Treated as an Electrical Substation
- Permitted zoning districts	County Board-Approved Special Use: AG-1, AG-2	Permitted Use: B-3, B-4/E, I-1, I-2 Conditional Use: B-1, B-2, R-4, R-5, R-6/B Special Use: R-1, R-2, R-3, AG

The City treats PV solar arrays that supply electricity to on-site uses as a Mechanical, and requires screening for non-residential arrays. Overall, the City already allows small-scale PV solar arrays in all zoning districts, and treats them similarly to how the County currently treats them: some arrays require screening and some do not. This would not change significantly under the proposed amendment.

In the upcoming City solar text amendment, we plan to include the following, which is similar to what the County has proposed in their text amendment:

- PV solar arrays mounted on roofs would be exempt from regulation;
- PV solar arrays primarily intended to generate electricity for sale would be a principal use, and would be treated as a PV Solar Farm, requiring more strict review;
- PV solar arrays primarily intended to power a specific use would be treated as an accessory structure, requiring less strict review; and
- Small-scale PV solar arrays – including small Accessory Structure PV solar arrays – would likely be exempt from landscaping and screening requirements.

Plan Commission

The Urbana Plan Commission discussed the proposed text amendment at its March 24, 2022, meeting. The primary discussion items included how the Illinois Pollution Control Board (IPCB) regulates noise and the dissimilarity between data centers and electrical substations. Mr. Hopkins and Mr. Allred did not agree with the most-similar-use determination because data centers appear to be noisier than electrical substations. Both agreed that the proposed amendment looks good and that the city should not protest the proposed amendment. The city should then finish and pass its solar zoning text amendment and then pass a data center zoning text amendment so that it can regulate both uses as it deems necessary. This might include determining how the IPCB regulations would work in practice. The commission forwarded the case to City Council with a recommendation not to protest the amendment (four ayes, one nay, no abstentions).

Implications for Development Within the City's ETJ

The proposed amendment would still allow the City to plan and manage development within its boundary and ETJ. Under the proposed amendment, Data Centers and PV Solar Arrays less than 1 MW in size would be permitted with a County Board-Approved Special Use Permit in the vast majority of the ETJ. The City's ability to comment on and protest against the proposed amendment is the first important check-and-balance of the County's ability to approve land use on land that is likely to be annexed into the city. A second check-and-balance is the City's authority to review and comment on any proposed Special Use Permits in its ETJ, including those for any future Data Centers or PV Solar Arrays. Finally, if a Data Center or PV Solar Array were permitted under the proposed amendment, it must still comply with the detailed Specific Conditions in the amendment, including Fire Protection District approval, security features, noise minimization design, minimum yards, and noise levels. **As such, staff believes that the proposed amendment would still allow the City to plan and manage development through the County Special Use Permit review process.**

Urbana 2005 Comprehensive Plan

By State law, the City has the ability to review zoning decisions within its ETJ for consistency with the City's comprehensive plan. Therefore, Champaign County's proposed text amendment should be reviewed for consistency with the City of Urbana's 2005 Comprehensive Plan, which includes the following pertinent goals and objectives:

- | | |
|------------------|--|
| Goal 16.0 | Ensure that new land uses are compatible with and enhance the existing community. |
| Objectives | 16.2 Preserve agricultural lands and environmentally sensitive areas outside the growth area of the city. |
| Goal 17.0 | Minimize incompatible land uses. |
| Objectives | 17.1 Establish logical locations for land use types and mixes, minimizing potentially incompatible interfaces, such as industrial uses near residential areas.
17.2 Where land use incompatibilities exist, promote development and design controls to minimize concerns. |
| Goal 21.0 | Identify and address issues created by overlapping jurisdictions in the one-and-one-half mile Extraterritorial Jurisdictional area (ETJ). |
| Objectives | 21.1 Coordinate with Champaign County on issues of zoning and subdivision in the ETJ. |
| Goal 33.0 | Provide maximum service and dependable utilities. |
| Objectives | 33.5 Promote the use of alternative energy sources, such as wind and solar. |

The proposed County zoning ordinance text amendment is generally consistent with these City goals and objectives: encourage a variety of land uses while minimizing the effects of potentially incompatible land uses through design controls.

Summary of Staff Findings

1. The Champaign County Zoning Administrator requests a text amendment to the Champaign County Zoning Ordinance to allow Data Centers as a Special Use in the AG-2 Agriculture, B-4 General Business, and I-1 Light Industry Zoning Districts.

2. The text amendment would also allow Photovoltaic (PV) Solar Arrays as a Second Principal Use as a County Board-Approved Special Use in the AG-2 Agriculture Zoning District or as a Principal Use as a County Board-Approved Special Use in the AG-2 Agriculture, any Business, or any Industrial Zoning District.
3. The proposed text amendment is generally compatible with the land use policy goals and objectives of the 2005 Urbana Comprehensive Plan, which promotes a variety of land uses while minimizing incompatibility.
4. The proposed text amendment would minimize land use incompatibilities and still allow the City to plan and manage development through the County Special Use Permit review process.

Options

City Council has the following options in **CCZBA Case No. 030-AT-21**, a request to amend the Champaign County Zoning Ordinance to allow Data Centers and PV Solar Arrays in the AG-2, various Business, and various Industrial Zoning Districts:

- a. **Not to protest**; or
- b. **Not to protest**, contingent upon specific provisions to be identified; or
- c. **Protest**.

Recommendation

At its March 24, 2022, meeting, the Urbana Plan Commission voted four ayes to one nay to forward Case **CCZBA 030-AT-21 (Data Centers & PV Solar Arrays) to City Council with a recommendation NOT TO PROTEST** the proposed zoning ordinance amendment. Staff concur with the Plan Commission's recommendation.

Attachments: Exhibit A: CCDPZ Preliminary Memo (dated November 29, 2021)
Exhibit B: CCDPZ Supplemental Memo (dated March 3, 2022)
Exhibit C: Proposed Data Center Districts: County AG-2, B-4, I-1
Exhibit D: Proposed PV Solar Array Districts: County AG-2, Business, Industrial
Exhibit E: County Zoning District Descriptions
Exhibit F: Plan Commission Meeting Minutes – DRAFT (dated March 24, 2022)

cc: John Hall, Director, Champaign County Planning and Zoning
Susan Burgstrom, Planner, Champaign County Planning and Zoning.

RESOLUTION NO. _____

**A RESOLUTION TO PROTEST A PROPOSED TEXT AMENDMENT TO THE
CHAMPAIGN COUNTY ZONING ORDINANCE**

(Data Center – PV Solar Array / CCZBA-030-AT-21)

WHEREAS, the City of Urbana ("City") is a home rule unit of local government pursuant to Article VII, Section 6, of the Illinois Constitution of 1970, and may exercise any power and perform any function pertaining to its governmental business and affairs, and the passage of this Resolution constitutes an exercise of the City's home rule powers and functions as granted by the Illinois Constitution of 1970; and

WHEREAS, the Champaign County Zoning Administrator is requesting a text amendment to the Champaign County Zoning Ordinance to allow "Data Center" as a Special Use in the AG-2 Agriculture, B-4 General Business, and I-1 Light Industry Zoning Districts; and to allow "Photovoltaic (PV) Solar Array" as a Second Principal Use as a County Board-Approved Special Use in the AG-2 Agriculture Zoning District, or as a Principal Use as a County Board-Approved Special Use in the AG-2 Agriculture, any Business, or any Industrial Zoning Districts; and

WHEREAS, the proposed text amendment has been submitted to the City of Urbana for review and is being considered by the City of Urbana under the name of "CCZBA-030-AT-21"; and

WHEREAS, pursuant to the provisions of State of Illinois Compiled Statutes 55 ILCS 5/5-12014 that states in cases of any proposed zoning amendment where the land affected lies within one-and-one-half (1-1/2) miles of the limits of a zoned municipality, the corporate authorities of the zoned municipality may by resolution issue written protest against the proposed text amendment; and

WHEREAS, the proposed text amendment is not compatible with the Goals and Objectives and Future Land Use Map of the 2005 City of Urbana Comprehensive Plan; and

WHEREAS, the Urbana Plan Commission met on March 24, 2022, to consider the proposed text amendment and voted with four (4) ayes and one (1) nay to forward to the City Council a

recommendation not to protest the proposed text amendment; and

WHEREAS, the Urbana City Council, having duly considered all matters pertaining thereto, finds and determines that the proposed text amendment is not in the best interest of the City of Urbana.

NOW, THEREFORE, BE IT RESOLVED BY THE CITY COUNCIL OF THE CITY OF URBANA, ILLINOIS, as follows:

Section 1. The City Council finds and determines that the facts contained in the above recitations are true.

Section 2. That the Urbana City Council hereby resolves that the City of Urbana, pursuant to the provisions of 55 ILCS 5/5-12014, does hereby APPROVE a Resolution to Protest a Proposed Text Amendment as presented in CCZBA-030-AT-21.

PASSED BY THE CITY COUNCIL this _____ day of _____, 2022.

AYES:

NAYS:

ABSTAINED:

Phyllis D. Clark, City Clerk

APPROVED BY THE MAYOR this _____ day of _____, 2022.

Diane Wolfe Marlin, Mayor

Exhibit A: CCDPZ Preliminary Memorandum

Champaign County
Department of

**PLANNING &
ZONING**

Brookens Administrative
Center

1776 E. Washington Street
Urbana, Illinois 61802

(217) 384-3708

zoningdept@co.champaign.il.us

www.co.champaign.il.us/zoning

CASE 030-AT-21

PRELIMINARY MEMORANDUM

JANUARY 18, 2022

Petitioner: Zoning Administrator

Request: Amend the Champaign County Zoning Ordinance as follows:

1. Amend Section 3.0 Definitions by adding a definition for “DATA CENTER” and “PV SOLAR ARRAY.”
2. Add new paragraph 4.2.1 C.6. that authorizes a PV SOLAR ARRAY as a County Board SPECIAL USE Permit in the AG-2 Agriculture Zoning District as a second PRINCIPAL USE on a LOT with another PRINCIPAL USE.
3. Amend Section 5.2 Table of Authorized Principal Uses by adding DATA CENTER as a Special Use in the AG-2 Agriculture, B-4 General Business and I-1 Light Industry Zoning Districts, and by adding PV SOLAR ARRAY as a County Board Special Use Permit in the AG-2 Agriculture and all Business and Industrial Zoning Districts.
4. Add footnote 31 to Section 5.2 Table of Authorized Principal Uses for classifying the requirements for PV SOLAR ARRAYS with an output of one megawatt or more as a County Board Special Use Permit and PV solar arrays with an output of less than one megawatt as an ACCESSORY PV SOLAR ARRAY.
5. Add standard conditions to Section 6.1.3 Schedule of Standard Conditions for Specific Types of Special Uses as follows:
 - A. The location of the DATA CENTER must be approved in writing by the relevant Fire Protection District.
 - B. The petitioner shall provide the P&Z Department with a written explanation of security features for the DATA CENTER.
 - C. DATA CENTERS constructed with PV SOLAR ARRAYS shall be located adjacent to the solar inverter and as far as possible from property lines and adjacent DWELLINGS consistent with good engineering practice.
6. Add new Section 7.9 Accessory PV SOLAR ARRAY, with new requirements including but not limited to the following:
 - A. A PV SOLAR ARRAY with an output of less than one megawatt shall be permitted as an ACCESSORY STRUCTURE subject to the following standards:
 1. An accessory ground-mounted PV SOLAR ARRAY with less than one megawatt on contiguous lots under common ownership shall require compliance with minimum zoning requirements in Section 7.2 YARDS for DETACHED ACCESSORY BUILDINGS and STRUCTURES.
 2. For an accessory ground-mounted PV SOLAR ARRAY greater than 1,000 square feet in area, screening requirements shall apply per Sections 7.6.2 and 7.6.3.

Exhibit A: CCDPZ Preliminary Memorandum

2

Case 030-AT-21
Zoning Administrator
JANUARY 18, 2022

3. No permit is required for roof-mounted PV SOLAR ARRAYS.
4. Loading berths and parking spaces are not required for accessory ground-mounted PV SOLAR ARRAYS.

Location: Unincorporated Champaign County

Time Schedule for Development: As soon as possible

Prepared by: Susan Burgstrom, Senior Planner
John Hall, Zoning Administrator

BACKGROUND

At its December 9, 2021 meeting, ELUC reviewed a memorandum dated November 29, 2021 regarding the proposed addition of “Data Center” and “Photovoltaic Solar Array” land uses. ELUC approved opening a ZBA public hearing for these amendments at its December 9, 2021 meeting.

Planning & Zoning has a client who is interested in establishing a data processing center that includes a 2 MW solar array to power the facility. There are different types of data centers, and the one being proposed has no on-site employees and is essentially one or more 20 feet by 100 feet (2,000 square feet) storage boxes. This design differs from other data centers that might have a server room that is part of a business office. A standalone data center is unique and therefore warrants its own land use category and requirements. The solar array in this situation is also unique because they do not propose selling the energy; it would only be used to power the onsite data processing center.

The City of Urbana defines a data center as “a centralized location where computing and networking equipment is concentrated for the purpose of collecting, storing, processing, distributing or allowing access to large amounts of data.” This definition would be part of the proposed amendment.

ELUC MEMBER CONCERNS

ELUC member Jacob Paul said he was concerned about security and the risk of fire due to overheated computers. A data center used for crypto mining uses high-power computers that must be kept in cool conditions, usually by fans integrated into the facility.

In response to this concern, three standard conditions have been added to the Data Center land use in Section 6.1.3.

ATTACHMENTS

- A Legal advertisement
- B ELUC Memorandum dated November 29, 2021, with attachments:
 - Exhibit A: Proposed Amendment
- C Land Resource Management Plan (LRMP) Goals & Objectives
(*provided on the ZBA meetings website*)
- D Preliminary Finding of Fact, Summary Finding of Fact, and Final Determination for Case 030-AT-21 dated January 27, 2022, with attachment:
 - Exhibit A: Proposed Amendment dated January 27, 2022

LEGAL PUBLICATION: WEDNESDAY, JANUARY 12, 2022**CASE: 030-AT-21****NOTICE OF PUBLIC HEARING IN REGARD TO AN AMENDMENT TO THE TEXT OF THE CHAMPAIGN COUNTY ZONING ORDINANCE**

CASE 030-AT-21

The Champaign County Zoning Administrator, 1776 East Washington Street, Urbana, has filed a petition to amend the text of the Champaign County Zoning Ordinance. The petition is on file in the office of the Champaign County Department of Planning and Zoning, 1776 East Washington Street, Urbana, IL.

A public hearing will be held **Thursday, January 27, 2022 at 6:30 p.m.** prevailing time in the Shields-Carter Meeting Room, Brookens Administrative Center, 1776 East Washington Street, Urbana, IL, at which time and place the Champaign County Zoning Board of Appeals will consider a petition for the following:

Amend the Champaign County Zoning Ordinance as follows:

1. Amend Section 3.0 Definitions by adding a definition for “DATA CENTER” and “PV SOLAR ARRAY.”
2. Add new paragraph 4.2.1 C.6. that authorizes a PV SOLAR ARRAY as a County Board SPECIAL USE Permit in the AG-2 Agriculture Zoning District as a second PRINCIPAL USE on a LOT with another PRINCIPAL USE.
3. Amend Section 5.2 Table of Authorized Principal Uses by adding DATA CENTER as a Special Use in the AG-2 Agriculture, B-4 General Business and I-1 Light Industry Zoning Districts, and by adding PV SOLAR ARRAY as a County Board Special Use Permit in the AG-2 Agriculture and all Business and Industrial Zoning Districts.
4. Add footnote 31 to Section 5.2 Table of Authorized Principal Uses for classifying the requirements for PV SOLAR ARRAYS with an output of one megawatt or more as a County Board Special Use Permit and PV solar arrays with an output of less than one megawatt as an ACCESSORY PV SOLAR ARRAY.
5. Add standard conditions to Section 6.1.3 Schedule of Standard Conditions for Specific Types of Special Uses as follows:
 - A. The location of the DATA CENTER must be approved in writing by the relevant Fire Protection District.
 - B. The petitioner shall provide the P&Z Department with a written explanation of security features for the DATA CENTER.
 - C. DATA CENTERS constructed with PV SOLAR ARRAYS shall be located adjacent to the solar inverter and as far as possible from property lines and adjacent DWELLINGS consistent with good engineering practice.
6. Add new Section 7.9 Accessory PV SOLAR ARRAY, with new requirements including but not limited to the following:
 - A. A PV SOLAR ARRAY with an output of less than one megawatt shall be permitted as an ACCESSORY STRUCTURE subject to the following standards:
 1. An accessory ground-mounted PV SOLAR ARRAY with less than one megawatt on contiguous lots under common ownership shall require compliance with

minimum zoning requirements in Section 7.2 YARDS for DETACHED ACCESSORY BUILDINGS and STRUCTURES.

2. For an accessory ground-mounted PV SOLAR ARRAY greater than 1,000 square feet in area, screening requirements shall apply per Sections 7.6.2 and 7.6.3.
3. No permit is required for roof-mounted PV SOLAR ARRAYS.
4. Loading berths and parking spaces are not required for accessory ground-mounted PV SOLAR ARRAYS.

All persons interested are invited to attend said hearing and be heard. Please wear a mask. If you would like to submit comments or questions before the meeting, please call the P&Z Department at 217-384-3708 or email zoningdept@co.champaign.il.us no later than 4:30 pm the day of the meeting. The hearing may be continued and reconvened at a later time.

Ryan Elwell, Chair
Champaign County Zoning Board of Appeals

TO BE PUBLISHED: WEDNESDAY, JANUARY 12, 2022, ONLY

Send bill and one copy to: Champaign County Planning and Zoning Dept.
Brookens Administrative Center
1776 E. Washington Street
Urbana, IL 61802
Phone: 384-3708

Our News Gazette account number is 99225860.

Champaign County
Department of

**PLANNING &
ZONING**

Brookens Administrative
Center
1776 E. Washington Street
Urbana, Illinois 61802

(217) 384-3708
zoningdept@co.champaign.il.us
www.co.champaign.il.us/zoning

TO: Environment and Land Use Committee
FROM: John Hall, Zoning Administrator
DATE: November 29, 2021
RE: Authorization for Public Hearing on Proposed Zoning Ordinance Text Amendment to add requirements for “DATA CENTER” and “PV SOLAR ARRAY”

BACKGROUND

Planning & Zoning has a client who is interested in establishing a data processing center that includes a 2 MW solar array to power the facility. There are different types of data centers, and the one being proposed has no on-site employees and is essentially one or more 20 feet by 100 feet (2,000 square feet) storage boxes. This design differs from other data centers that might have a server room that is part of a business office. A standalone data center is unique and therefore warrants its own land use category and requirements. The solar array in this situation is also unique because they do not propose selling the energy; it would only be used to power the onsite data processing center.

The City of Urbana defines a data center as “a centralized location where computing and networking equipment is concentrated for the purpose of collecting, storing, processing, distributing or allowing access to large amounts of data.” This definition would be part of the proposed amendment.

PROPOSED TEXT AMENDMENT

An outline of the proposed amendment is attached.

TEXT AMENDMENT PUBLIC HEARING TIMELINE

The public hearing requires a legal advertisement in the newspaper and notice provided to all relevant municipalities. If the public hearing is authorized by ELUC on December 9, the anticipate timeline (*earliest possible dates) is as follows:

- | | |
|--|--------------------------------------|
| 1. Public Hearing opens at the Champaign County Zoning Board of Appeals (CCZBA) | *Thursday, January 27, 2022 |
| 2. Public Hearing closes at CCZBA and the CCZBA makes recommendations to the Champaign County Board | **Thursday, February 17, 2022 |
| 3. Environment and Land Use Committee of the Champaign County Board (ELUC) affirms or amends CCZBA’s recommendation | *Thursday, March 10, 2022 |
| 4. Environment and Land Use Committee of the Champaign County Board makes a recommendation to the Champaign County Board | *Thursday, April 7, 2022 |
| 5. Champaign County Board makes a final determination | *Thursday, April 21, 2022 |

*earliest anticipated dates of action

ATTACHMENTS

- A Outline of Proposed Amendment

EXHIBIT A: PROPOSED AMENDMENT

1. Add the following to Section 3. Definitions:

DATA CENTER: A centralized location where computing and networking equipment is concentrated for the purpose of collecting, storing, processing, distributing or allowing access to large amounts of data.

PV SOLAR ARRAY: a collection of multiple photovoltaic solar panels that convert sunlight to electricity as a system primarily to be used onsite.

2. Revise Section 5.2 as follows:

SECTION 5.2 TABLE OF AUTHORIZED PRINCIPAL USES

- DATA CENTER would be a new by right land use in the B-4 General Business and I-1 Light Industry Zoning Districts, as shown in the table below.
- PV SOLAR ARRAY would be allowed by a COUNTY BOARD Special Use Permit in all Business and Industrial Zoning Districts with this amendment, as shown in the table below.

Principal USES	Zoning DISTRICTS															
	CR	AG-1	AG-2	R-1	R-2	R-3	R-4	R-5	B-1	B-2	B-3	B-4	B-5	I-1	I-2	
DATA CENTER																
PV SOLAR ARRAY ³¹									B	B	B	B	B	B	B	



= Permitted by right



= Permitted by COUNTY BOARD Special Use Permit

3. Add new Footnote 31 under Section 5.2 as follows:

31. A PV SOLAR ARRAY with one megawatt or more is permitted by a COUNTY BOARD Special Use Permit, subject to the requirements of Sections 6.1.1 and 6.1.5 of the Zoning Ordinance and shall also be a second PRINCIPAL USE requiring a Special Use Permit per Section 4.2.1 F. A PV SOLAR ARRAY with less than one megawatt is permitted under the terms of Section 7.9 ACCESSORY PV SOLAR ARRAY.

4. Add new Section 7.9 ACCESSORY PV SOLAR ARRAY as follows:

A. A PV SOLAR ARRAY with an output of less than one megawatt shall be permitted as an ACCESSORY STRUCTURE subject to the following standards:

1. An accessory ground-mounted PV SOLAR ARRAY with less than one megawatt on contiguous lots under common ownership shall require compliance with minimum zoning requirements in Section 7.2 YARDS for DETACHED ACCESSORY BUILDINGS and STRUCTURES.

EXHIBIT A: PROPOSED AMENDMENT FOR CASE 008-AT-21

2. For an accessory ground-mounted PV SOLAR ARRAY greater than 1,000 square feet in area, screening requirements shall apply per Sections 7.6.2 and 7.6.3.
3. No permit is required for roof-mounted PV SOLAR ARRAYS.
4. Loading berths and parking spaces are not required for accessory ground-mounted PV SOLAR ARRAYS.

Attachment C: LRMP Goals, Objectives and Policies

can be found online at: http://www.co.champaign.il.us/CountyBoard/meetings_ZBA.php

PRELIMINARY DRAFT

030-AT-21

**FINDING OF FACT
AND FINAL DETERMINATION**

**of
Champaign County Zoning Board of Appeals**

Final Determination: ***{RECOMMEND ENACTMENT/RECOMMEND DENIAL}***

Date: ***{January 27, 2022}***

Petitioner: **Zoning Administrator**

Request: **Amend the Champaign County Zoning Ordinance as follows:**

- 1. Amend Section 3.0 Definitions by adding a definition for “DATA CENTER” and “PV SOLAR ARRAY.”**
 - 2. Add new paragraph 4.2.1 C.6. that authorizes a PV SOLAR ARRAY as a County Board SPECIAL USE Permit in the AG-2 Agriculture Zoning District as a second PRINCIPAL USE on a LOT with another PRINCIPAL USE.**
 - 3. Amend Section 5.2 Table of Authorized Principal Uses by adding DATA CENTER as a Special Use in the AG-2 Agriculture, B-4 General Business and I-1 Light Industry Zoning Districts, and by adding PV SOLAR ARRAY as a County Board Special Use Permit in the AG-2 Agriculture and all Business and Industrial Zoning Districts.**
 - 4. Add footnote 31 to Section 5.2 Table of Authorized Principal Uses for classifying the requirements for PV SOLAR ARRAYS with an output of one megawatt or more as a County Board Special Use Permit and PV solar arrays with an output of less than one megawatt as an ACCESSORY PV SOLAR ARRAY.**
 - 5. Add standard conditions to Section 6.1.3 Schedule of Standard Conditions for Specific Types of Special Uses as follows:**
 - A. The location of the DATA CENTER must be approved in writing by the relevant Fire Protection District.**
 - B. The petitioner shall provide the P&Z Department with a written explanation of security features for the DATA CENTER.**
 - C. DATA CENTERS constructed with PV SOLAR ARRAYS shall be located adjacent to the solar inverter and as far as possible from property lines and adjacent DWELLINGS consistent with good engineering practice.**
 - 6. Add new Section 7.9 Accessory PV SOLAR ARRAY, with new requirements including but not limited to the following:**
-

- A. A PV SOLAR ARRAY with an output of less than one megawatt shall be permitted as an ACCESSORY STRUCTURE subject to the following standards:**
- 1. An accessory ground-mounted PV SOLAR ARRAY with less than one megawatt on contiguous lots under common ownership shall require compliance with minimum zoning requirements in Section 7.2 YARDS for DETACHED ACCESSORY BUILDINGS and STRUCTURES.**
 - 2. For an accessory ground-mounted PV SOLAR ARRAY greater than 1,000 square feet in area, screening requirements shall apply per Sections 7.6.2 and 7.6.3.**
 - 3. No permit is required for roof-mounted PV SOLAR ARRAYS.**
 - 4. Loading berths and parking spaces are not required for accessory ground-mounted PV SOLAR ARRAYS.**

CONTENTS

Finding of Fact 2 - 17

Summary Finding of Fact 18

Documents of Record..... 19

Final Determination..... 20

Proposed Amendment 21 - 22

FINDING OF FACT

From the documents of record and the testimony and exhibits received at the public hearing conducted on **January 27, 2022**, the Zoning Board of Appeals of Champaign County finds that:

1. The petitioner is the Zoning Administrator.
2. The proposed amendment is intended to establish the requirements for Data Centers and PV Solar Arrays in the Zoning Ordinance.
3. Municipalities with zoning and townships with planning commissions have protest rights on all text amendments and they are notified of such cases.

SUMMARY OF THE PROPOSED AMENDMENT

4. The proposed amendment is attached to this Finding of Fact as it will appear in the Zoning Ordinance.

GENERALLY REGARDING THE LRMP GOALS, OBJECTIVES, AND POLICIES

5. The *Champaign County Land Resource Management Plan* (LRMP) was adopted by the County Board on April 22, 2010. The LRMP Goals, Objectives, and Policies were drafted through an inclusive and public process that produced a set of ten goals, 42 objectives, and 100 policies, which are currently the only guidance for amendments to the *Champaign County Zoning Ordinance*, as follows:
 - A. The Purpose Statement of the LRMP Goals, Objectives, and Policies is as follows:

“It is the purpose of this plan to encourage municipalities and the County to protect the land, air, water, natural resources and environment of the County and to encourage the use of such resources in a manner which is socially and economically desirable. The Goals, Objectives and Policies necessary to achieve this purpose are as follows:...”
 - B. The LRMP defines Goals, Objectives, and Policies as follows:
 - (1) Goal: an ideal future condition to which the community aspires
 - (2) Objective: a tangible, measurable outcome leading to the achievement of a goal
 - (3) Policy: a statement of actions or requirements judged to be necessary to achieve goals and objectives
 - C. The Background given with the LRMP Goals, Objectives, and Policies further states, “Three documents, the *County Land Use Goals and Policies* adopted in 1977, and two sets of *Land Use Regulatory Policies*, dated 2001 and 2005, were built upon, updated, and consolidated into the LRMP Goals, Objectives and Policies.

REGARDING LRMP GOALS

6. LRMP Goal 1 is entitled “Planning and Public Involvement” and states that as follows:

Champaign County will attain a system of land resource management planning built on broad public involvement that supports effective decision making by the County.

Goal 1 has 4 objectives and 4 policies. The proposed amendment ***WILL NOT IMPEDE*** the achievement of Goal 1.

7. LRMP Goal 2 is entitled “Governmental Coordination” and states as follows:

Champaign County will collaboratively formulate land resource and development policy with other units of government in areas of overlapping land use planning jurisdiction.

Goal 2 has two objectives and three policies. The proposed amendment ***WILL NOT IMPEDE*** the achievement of Goal 2.

8. LRMP Goal 3 is entitled “Prosperity” and states as follows:

Champaign County will encourage economic growth and development to ensure prosperity for its residents and the region.

Goal 3 has three objectives and no policies. Objective 3.1 is most relevant to the proposed text amendment. The proposed amendment will ***HELP ACHIEVE*** Goal 3 as follows:

- A. Objective 3.1 states, “Champaign County will seek to ensure that it maintains comparable tax rates and fees, and a favorable business climate relative to similar counties.”

The proposed amendment will ***HELP ACHIEVE*** Objective 3.1 as follows:

- (1) The proposed text amendment will allow development of DATA CENTERS and PV SOLAR ARRAYS, which will allow newer technologies to improve Champaign County’s business climate.

9. LRMP Goal 4 is entitled “Agriculture” and states as follows:

Champaign County will protect the long-term viability of agriculture in Champaign County and its land resource base.

Goal 4 has 9 objectives and 22 policies. Objectives 4.4, 4.5, 4.7, 4.8 and their policies do not appear to be relevant to the proposed text amendment. The proposed amendment will ***HELP ACHIEVE*** Goal 4 for the following reasons:

- A. Objective 4.1 states as follows: “**Champaign County will strive to minimize the fragmentation of the County’s agricultural land base and conserve farmland, generally applying more stringent development standards on *best prime farmland*.**”

The proposed amendment will ***HELP ACHIEVE*** Objective 4.1 for the following reasons:

- (1) The proposed amendment ***WILL NOT IMPEDE*** the achievement of Policies 4.1.2, 4.1.3, 4.1.4, 4.1.5, 4.1.7, 4.1.8, and 4.1.9.
- (2) Policy 4.1.1 states: “**Commercial agriculture is the highest and best use of land in the areas of Champaign County that are by virtue of topography, soil and drainage, suited to its pursuit. The County will not accommodate other land uses except under very restricted conditions or in areas of less productive soils.**”

The proposed amendment will **HELP ACHIEVE** Policy 4.1.1 for the following reasons:

- a. For a PV SOLAR ARRAY with an output of one megawatt or greater, the standard conditions for a PV SOLAR FARM are very restrictive and will ensure the following:
 - (a) Section 6.1.5 D. requires minimum separations between any PV SOLAR FARM and existing adjacent use to minimize issues of land use compatibility.
 - (b) No PV SOLAR FARM shall interfere with agricultural operations (see Objective 4.2).
 - (c) No PV SOLAR FARM shall be located at any location that is not well-suited for that PV SOLAR FARM (see Objective 4.3).
 - (d) Section 6.1.5 E. requires minimum standard conditions for any PV SOLAR FARM related to building codes, electrical components, maximum height, and warning signs.
 - (e) Section 6.1.5 I. establishes standard conditions to ensure that the allowable noise level created by a PV SOLAR FARM is consistent with the Illinois Pollution Control Board regulations that are the same for all rural land uses, including wind farms.
 - (f) Section 6.1.5 N. establishes minimum standard conditions to ensure that glare is minimized at any PV SOLAR FARM and to establish a process to resolve any complaints about glare that may arise regarding a PV SOLAR FARM.
 - (g) Section 6.1.5 O. requires a PV SOLAR FARM to carry minimum liability insurance to protect landowners.
 - (h) Section 6.1.5 P. requires operational standard conditions intended to ensure that nuisance conditions are not allowed to exist at a PV SOLAR FARM.
 - (i) Section 6.1.5 Q. requires any PV SOLAR FARM to have an approved Decommissioning and Site Reclamation Plan to ensure that funds will be available to remove a PV SOLAR FARM if the SOLAR FARM ever becomes non-functional.
 - b. The proposed amendment will require any PV SOLAR ARRAY with an output of one megawatt or greater to be authorized by a County Board Special Use Permit (which is a discretionary development as defined in the Land Resource Management Plan) which will allow for site specific review.
- (3) Policy 4.1.6 states: **“Provided that the use, design, site and location are consistent with County policies regarding:**
- i. **Suitability of the site for the proposed use;**

- ii. Adequacy of infrastructure and public services for the proposed use;
 - iii. Minimizing conflict with agriculture;
 - iv. Minimizing the conversion of farmland; and
 - v. Minimizing the disturbance of natural areas; then
- a) On best prime farmland, the County may authorize discretionary residential development subject to a limit on total acres converted which is generally proportionate to tract size and is based on the January 1, 1998 configuration of tracts, with the total amount of acreage converted to residential use (inclusive of by-right development) not to exceed three acres plus three acres per each 40 acres (including any existing right-of-way), but not to exceed 12 acres in total; or
 - b) On best prime farmland, the County may authorize non-residential discretionary development; or
 - c) The County may authorize discretionary review development on tracts consisting of other than best prime farmland.”

The proposed amendment will *HELP ACHIEVE* Policy 4.1.6 for the following reasons:

- a. The ZBA has recommended that the proposed amendment will *HELP ACHIEVE* Objective 4.3 regarding location at a suitable site and adequacy of infrastructure and public services.
- b. The ZBA has recommended that the proposed amendment will *HELP ACHIEVE* Objective 4.2 regarding no interference with agricultural operations.
- c. The ZBA has recommended that the proposed amendment will *HELP ACHIEVE* Goal 8 regarding conserving and enhancing the County’s landscape and natural resources.
- d. The proposed amendment will *HELP ACHIEVE* the County’s policies regarding minimizing the conversion of best prime farmland as follows:
 - (a) The only policy regarding conversion of best prime farmland by non-residential discretionary development is Policy 4.1.6b., which states, “On best prime farmland the County may authorize non-residential development.” Policy 4.1.6.b. has no limit on the conversion of best prime farmland for non-residential discretionary development and is merely a statement of fact and therefore, the proposed amendment does help achieve Policy 4.1.6b.
 - (b) Best prime farmland to be developed as a PV SOLAR ARRAY with an output of one megawatt or greater will be 100% converted. However, there is a distinction between conversion of best prime farmland and actual disturbance of best prime farmland. An analysis of the actual disturbance of best prime farmland for two proposed PV SOLAR FARMS in Champaign County revealed that the actual land disturbance (not merely the conversion of use) that would result from the construction of the two PV SOLAR FARMS may be no more than the land disturbance that would result from by-

right residential development and in some cases the disturbance may be far less, as follows:

- i. The land disturbed by the construction of the PV SOLAR FARMS including by the installation of supports for the proposed single axis tracking PV SOLAR ARRAYS and the construction of the gravel and/or compacted earth access roads and the installation of underground trenching for medium-voltage underground wiring and the installation of electrical inverters and the construction of any required electrical substation, will total between 0.25 acres (0.44%) for a COMMUNITY PV SOLAR FARM proposed on a single 57.84 acre parcel and 37.7 acres (2.9%) of 1,299.1 acres for a utility scale PV SOLAR FARM proposed on 38 existing parcels.
- ii. The amount of land that would be disturbed under “by-right” residential development on the same tracts would be about 1.00 acres (1.73%) for the COMMUNITY PV SOLAR FARM proposed on the single 57.84-acre parcel and 28.4 acres (2.2%) of the 1,299.1 acres for the utility scale PV SOLAR FARM proposed on 38 existing parcels.

- e. PV SOLAR ARRAYS do not require the permanent conversion of farmland; solar arrays can be removed at the owner’s choosing and the land can be put back into agricultural production.
- f. DATA CENTERS utilize PV SOLAR ARRAYS for energy; therefore, they are generally located within the confines of a PV SOLAR FARM.

B. Objective 4.2 is entitled “Development Conflicts with Agricultural Operations” and states, “Champaign County will require that each *discretionary review* development will not interfere with agricultural operations.”

The proposed amendment will **HELP ACHIEVE** Objective 4.2 because of the following:

- (1) **Policy 4.2.1 states, “The County may authorize a proposed business or other non-residential *discretionary review* development in a rural area if the proposed development supports agriculture or involves a product or service that is better provided in a *rural* area than in an urban area.”**

The proposed amendment will **HELP ACHIEVE** Policy 4.2.1 for the following reasons:

- a. The Land Resource Management Plan (LRMP) provides no guidance regarding what products or services are better provided in a rural area and therefore that determination must be made in each zoning case.
- b. A PV SOLAR ARRAY with an output of one megawatt or greater **IS** a service better provided in a rural area as evidenced by the following:

- (a) A PV SOLAR FARM requires a large land area that generally makes it uneconomical for a PV SOLAR FARM to be located inside a municipality.
 - (b) A PV SOLAR ARRAY with an output of one megawatt or greater must be located where there is an adequate and proper connection to the electrical grid, which generally will be either near an electrical substation with adequate capacity (which is generally near to but outside of a municipality) or near a three-phase electrical distribution line with adequate capacity.
 - c. Even though a PV SOLAR ARRAY does not serve the surrounding agricultural uses directly, the land owner receives an annual payment from the PV SOLAR FARM operator far in excess of the value of a crop from that land.
 - d. The proposed amendment will require any PV SOLAR ARRAY with an output of one megawatt or greater to be authorized by a County Board Special Use Permit, which will allow for site specific review.
- (2) **Policy 4.2.2 states, “The County may authorize *discretionary review* development in a rural area if the proposed development:**
- a) **is a type that does not negatively affect agricultural activities; or**
 - b) **is located and designed to minimize exposure to any negative affect caused by agricultural activities; and**
 - c) **will not interfere with agricultural activities or damage or negatively affect the operation of agricultural drainage systems, *rural* roads, or other agriculture-related infrastructure.”**

The proposed amendment will **HELP ACHIEVE** Policy 4.2.2 for the following reasons:

- a. Section 6.1.5 F. details standard conditions to mitigate damage to farmland, including agricultural drainage tile and soil disturbance.
- b. Section 6.1.5 D. requires the perimeter fencing to be a minimum of 10 feet from the lot line. This minimum separation is intended to minimize interference with adjacent agricultural operations.
- c. Section 6.1.5 R. requires that an applicant shall enter into an Agricultural Impact Mitigation Agreement with the Illinois Department of Agriculture, including the following:
 - (a) The Applicant shall bear full responsibility for coordinating any special conditions required in the SPECIAL USE Permit in order to ensure compliance with the signed Agricultural Impact Mitigation Agreement with the Illinois Department of Agriculture.
 - (b) All requirements of the signed Agricultural Impact Mitigation Agreement with the Illinois Department of Agriculture shall become requirements of the County Board SPECIAL USE Permit.

- (c) Champaign County shall have the right to enforce all requirements of the signed Agricultural Impact Mitigation Agreement with the Illinois Department of Agriculture.
 - d. DATA CENTERS utilize PV SOLAR ARRAYS for energy; therefore, they are generally located within the confines of a PV SOLAR FARM.
- (3) Policy 4.2.3 states, **“The County will require that each proposed discretionary development explicitly recognize and provide for the right of agricultural activities to continue on adjacent land.”**

The proposed amendment will *HELP ACHIEVE* Policy 4.2.3 for the following reason:

- a. Section 6.1.5 B.(4) creates a standard condition requiring compliance with the Right to Farm Resolution 3425.
- (4) Policy 4.2.4 states, **“To reduce the occurrence of agricultural land use and non-agricultural land use nuisance conflicts, the County will require that all discretionary review consider whether a buffer between existing agricultural operations and the proposed development is necessary.”**

The proposed amendment will *HELP ACHIEVE* Policy 4.2.4 for the following reason:

- a. Section 6.1.5 D.(3)a.(b) requires perimeter fencing to be at least 10 feet from a SIDE or REAR LOT LINE for any adjacent LOT that is five acres or more in area; this serves as a buffer between the SOLAR ARRAYS and adjacent properties.
- C. Objective 4.3 is entitled “Site Suitability for Discretionary Review Development” and states: “Champaign County will require that each discretionary review development is located on a suitable site.”

The proposed amendment will *HELP ACHIEVE* Objective 4.3 because of the following:

- (1) **Policy 4.3.1 states “On other than best prime farmland, the County may authorize a discretionary review development provided that the site with proposed improvements is suited overall for the proposed land use.”**

The proposed amendment will *HELP ACHIEVE* Policy 4.3.1 for the following reasons:

- a. See the discussion under Policy 4.3.2 regarding achievement of Policy 4.3.2. If the proposed amendment achieves Policy 4.3.2, it will also achieve Policy 4.3.1.
- (2) **Policy 4.3.2 states, “On best prime farmland, the County may authorize a discretionary review development provided the site with proposed improvements is well-suited overall for the proposed land use.**

The proposed amendment will *HELP ACHIEVE* Policy 4.3.2 for the following reasons:

- a. Because so much of Champaign County consists of best prime farmland soils, any development of a PV SOLAR ARRAY with an output of one megawatt or greater is likely to be on best prime farmland.
 - b. Section 6.1.5 C.(2) exempts a PV SOLAR FARM from the maximum lot area requirement on best prime farmland. This exemption means that the presence of best prime farmland should not be the cause for denial of any proposed PV SOLAR ARRAY. Other proposed standard conditions for a PV SOLAR FARM will ensure that a PV SOLAR ARRAY with an output of one megawatt or greater shall not be approved on any location that is not well-suited as follows:
 - (a) Section 6.1.5 B.(2) identifies areas where a PV SOLAR FARM should not be located.
 - (b) Section 6.1.5 F. details standard conditions to mitigate damage to farmland including underground agricultural drainage tile.
 - (c) Section 6.1.5 J. requires and Endangered Species Consultation with the IDNR and IDNR recommendations will be included in the Agency Action Report submitted with the Special Use Permit Application.
 - (d) Section 6.1.5 K. requires consultation with the State Historic Preservation Officer of IDNR and IDNR recommendations will be included in the Agency Action Report submitted with the Special Use Permit Application.
 - (e) Section 6.1.5 L. requires that the PV SOLAR FARM shall be located, designed, constructed, and operated so as to avoid and, if necessary, mitigate impacts to wildlife.
 - (f) Section 6.1.5 M. requires that a visual screen shall be provided for any part of a PV SOLAR FARM that is visible to and located within 1,000 feet of a dwelling.
 - c. The proposed amendment will require any PV SOLAR ARRAY with an output of one megawatt or greater to be authorized by a County Board Special Use Permit (which is a discretionary development as defined in the Land Resource Management Plan) which will allow for site specific review, including the determination of whether a proposed site is well suited overall for a proposed PV SOLAR ARRAY.
- (3) **Policy 4.3.3 states, “The County may authorize a discretionary review development provided that existing public services are adequate to support to the proposed development effectively and safely without undue public expense.”**

The proposed amendment will *HELP ACHIEVE* Policy 4.3.3 for the following reasons:

- a. Section 6.1.5 H. requires the applicant for any PV SOLAR ARRAY one megawatt or greater to submit a copy of the site plan to the relevant Fire

Protection District and to cooperate with the Fire Protection District to develop the Fire Protection District's emergency response plan for the proposed PV SOLAR FARM.

- b. The proposed amendment will require any PV SOLAR ARRAY one megawatt or greater to be authorized by a County Board Special Use Permit (which is a discretionary development as defined in the Land Resource Management Plan) which will allow for site specific review.
- (4) **Policy 4.3.4 states, "The County may authorize a discretionary review development provided that existing public infrastructure, together with proposed improvements, is adequate to support the proposed development effectively and safely without undue public expense."**

The proposed amendment will *HELP ACHIEVE* Policy 4.3.4 for the following reasons:

- a. Section 6.1.5 G. requires a Roadway Upgrade and Maintenance agreement with the relevant highway authority.
 - b. The proposed amendment will require any PV SOLAR ARRAY with an output of one megawatt or greater to be authorized by a County Board Special Use Permit (which is a discretionary development as defined in the Land Resource Management Plan) which will allow for site specific review.
- (5) **Policy 4.3.5 states, "On best prime farmland, the County will authorize a business or other non-residential use only if:**
- a. **It also serves surrounding agricultural uses or an important public need; and cannot be located in an urban area or on a less productive site; or**
 - b. **the use is otherwise appropriate in a rural area and the site is very well suited to it."**

The proposed amendment will *HELP ACHIEVE* Policy 4.3.5 for the following reasons:

- a. As reviewed for Policy 4.2.1 in this Finding of Fact:
 - (a) A PV SOLAR ARRAY *IS* a service better provided and therefore *IS* appropriate in a rural area.
 - (b) A PV SOLAR ARRAY with an output of one megawatt or greater requires a large land area that generally makes it uneconomic for it to be located inside a municipality.
- b. Regarding location of a PV SOLAR FARM on a less productive site, the following is reviewed under Policy 4.3.2 in this Finding of Fact:
 - (a) It is unlikely that a PV SOLAR ARRAY with an output of one megawatt or greater in Champaign County will be located on less than best prime farmland.

- (b) Section 6.1.5 C.(2) exempts a PV SOLAR FARM from the maximum lot area requirement on best prime farmland. This exemption means that the presence of best prime farmland should not be the cause for denial of any proposed PV SOLAR ARRAY.
- c. The proposed amendment will require any PV SOLAR ARRAY one megawatt or greater to be authorized by a County Board Special Use Permit, which will allow for site specific review.

10. LRMP Goal 5 is entitled “Urban Land Use” and states as follows:

Champaign County will encourage urban development that is compact and contiguous to existing cities, villages, and existing unincorporated settlements.

Goal 5 has 3 objectives and 15 policies. The proposed amendment is **NOT RELEVANT** to Goal 5 in general.

11. LRMP Goal 6 is entitled “Public Health and Safety” and states as follows:

Champaign County will ensure protection of the public health and public safety in land resource management decisions.

Goal 6 has 4 objectives and 7 policies. Objectives 6.2, 6.3, and 6.4 are not relevant to the proposed amendment. The proposed amendment will **HELP ACHIEVE** Goal 6 for the following reasons:

- A. Objective 6.1 states, “**Champaign County will seek to ensure that development in unincorporated areas of the County does not endanger public health or safety.**” Objective 6.1 has four subsidiary policies; policy 6.1.3 is the only relevant policy, and it states the following:
 - (1) Policy 6.1.3 states, “**The County will seek to prevent nuisances created by light and glare and will endeavor to limit excessive night lighting, and to preserve clear views of the night sky throughout as much of the County as possible.**” The proposed amendment will **HELP ACHIEVE** Objective 6.1.3 as follows:
 - a. PV SOLAR ARRAYS are made with non-reflective glass so there should be minimum glare.
 - b. Section 6.1.2 A. of the Zoning Ordinance requires that any SPECIAL USE Permit with exterior lighting shall be required to minimize glare onto adjacent properties by the use of full-cutoff type lighting fixtures with maximum lamp wattages.
 - c. For proposed PV SOLAR ARRAYS with an output of one megawatt or greater, Section 6.1.5 N. of the Zoning Ordinance requires the following:
 - (a) The design and construction of the PV SOLAR FARM shall minimize glare that may affect adjacent properties and the application shall include an explanation of how glare will be minimized.
 - (b) After construction of the PV SOLAR FARM, the Zoning Administrator shall take appropriate enforcement action as

necessary to investigate complaints of glare in order to determine the validity of the complaints and take any additional enforcement action as proves warranted to stop any significant glare that is occurring, including but not limited to the following:

- i. The Zoning Administrator shall make the Environment and Land Use Committee aware of complaints about glare that have been received by the Complaint Hotline, and
- ii. If the Environment and Land Use Committee determines that the glare is excessive, the Environment and Land Use Committee shall require the Owner or Operator to take reasonable steps to mitigate the excessive glare such as the installation of additional screening.

12. LRMP Goal 7 is entitled “Transportation” and states as follows:

Champaign County will coordinate land use decisions in the unincorporated area with the existing and planned transportation infrastructure and services.

Goal 7 has 2 objectives and 7 policies. Objective 7.2 and its policies do not appear to be relevant to the proposed text amendment. The proposed amendment will *HELP ACHIEVE* Goal 7 for the following reasons:

- A. Objective 7.1 states, “**Champaign County will consider traffic impact in all land use decisions and coordinate efforts with other agencies when warranted.**”

The proposed amendment will *HELP ACHIEVE* Objective 7.1 for the following reasons:

- (1) Policy 7.1.1 states, “**The County will include traffic impact analyses in discretionary review development proposals with significant traffic generation.**”

The proposed amendment will *HELP ACHIEVE* Policy 7.1.1 for the following reasons:

- a. For proposed PV SOLAR ARRAYS with an output of one megawatt or greater, Section 6.1.5 G.(2) requires the applicant to provide a Transportation Impact Analysis prepared by an independent engineer.
- b. DATA CENTERS do not have employees and therefore little traffic will be generated by the proposed use.

13. LRMP Goal 8 is entitled “Natural Resources” and states as follows:

Champaign County will strive to conserve and enhance the County’s landscape and natural resources and ensure their sustainable use.

Goal 8 has 9 objectives and 36 policies. Objectives 8.1, 8.3, 8.4, 8.5, 8.6, 8.7, 8.9 and their policies do not appear to be relevant to the proposed text amendment. The proposed amendment will *HELP ACHIEVE* Goal 8 for the following reasons:

- A. Objective 8.2 states, “**Champaign County will strive to conserve its soil resources to provide the greatest benefit to current and future generations.**”

The proposed amendment will **HELP ACHIEVE** Objective 8.2 for the following reasons:

- (1) PV SOLAR ARRAYS do not require the permanent conversion of farmland; solar arrays can be removed at the owner's choosing and the land can be put back into agricultural production.
- (2) For proposed PV SOLAR ARRAYS with an output of one megawatt or greater, Section 6.1.5 Q. requires the applicant to submit a Decommissioning Plan, which includes protections for soil resources and ensures that the land will be returned to its original condition.

14. LRMP Goal 9 is entitled "Energy Conservation" and states as follows:

Champaign County will encourage energy conservation, efficiency, and the use of renewable energy sources.

Goal 9 has 5 objectives and 5 policies. The proposed amendment will **NOT IMPEDE** the achievement of Goal 9.

15. LRMP Goal 10 is entitled "Cultural Amenities" and states as follows:

Champaign County will promote the development and preservation of cultural amenities that contribute to a high quality of life for its citizens.

Goal 10 has 1 objective and 1 policy. Goal 10 is **NOT RELEVANT** to the proposed amendment in general.

REGARDING THE PURPOSE OF THE ZONING ORDINANCE

16. The proposed amendment will **HELP ACHIEVE** the purpose of the Zoning Ordinance as established in Section 2 of the Ordinance for the following reasons:

- A. Paragraph 2.0 (a) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to secure adequate light, pure air, and safety from fire and other dangers.

The proposed amendment is consistent with this purpose.

- B. Paragraph 2.0 (b) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to conserve the value of land, BUILDINGS, and STRUCTURES throughout the COUNTY.

The proposed amendment is consistent with this purpose.

- C. Paragraph 2.0 (c) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to lessen and avoid congestion in the public STREETS.

The proposed amendment is consistent with this purpose.

- D. Paragraph 2.0 (d) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to lessen and avoid hazards to persons and damage to property resulting from the accumulation of runoff of storm or flood waters.

The proposed amendment is not directly related to this purpose.

- E. Paragraph 2.0 (e) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to promote the public health, safety, comfort, morals, and general welfare.

The proposed amendment is consistent with this purpose.

- F. Paragraph 2.0 (f) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to regulate and limit the height and bulk of BUILDINGS and STRUCTURES hereafter to be erected.

The proposed amendment is not directly related to this purpose.

- G. Paragraph 2.0 (g) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to establish, regulate, and limit the building or setback lines on or along any street, trafficway, drive or parkway.

The proposed amendment is not directly related to this purpose.

- H. Paragraph 2.0 (h) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to regulate and limit the intensity of the use of LOT areas, and regulating and determining the area of open spaces within and surrounding BUILDINGS and STRUCTURES.

The proposed amendment is not directly related to this purpose.

- I. Paragraph 2.0 (i) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to classify, regulate, and restrict the location of trades and industries and the location of BUILDINGS, STRUCTURES, and land designed for specified industrial, residential, and other land USES.

The proposed amendment is consistent with this purpose.

- J. Paragraph 2.0 (j) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to divide the entire County into DISTRICTS of such number, shape, area, and such different classes according to the USE of land, BUILDINGS, and STRUCTURES, intensity of the USE of LOT area, area of open spaces, and other classification as may be deemed best suited to carry out the purpose of the ordinance.

The proposed amendment is not directly related to this purpose.

- K. Paragraph 2.0 (k) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to fix regulations and standards to which BUILDINGS, STRUCTURES, or USES therein shall conform.

The proposed amendment is consistent with this purpose.

- L. Paragraph 2.0 (l) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to prohibit USES, BUILDINGS, or STRUCTURES incompatible with the character of such DISTRICTS.

The proposed amendment is consistent with this purpose.

- M. Paragraph 2.0 (m) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to prevent additions to and alteration or remodeling of existing BUILDINGS, STRUCTURES, or USES in such a way as to avoid the restrictions and limitations lawfully imposed under this ordinance.

The proposed amendment is not directly related to this purpose.

- N. Paragraph 2.0 (n) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to protect the most productive agricultural lands from haphazard and unplanned intrusions of urban USES.

The proposed amendment is consistent with this purpose.

- O. Paragraph 2.0 (o) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to protect natural features such as forested areas and watercourses.

The proposed amendment is not directly related to this purpose.

- P. Paragraph 2.0 (p) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to encourage the compact development of urban areas to minimize the cost of development of public utilities and public transportation facilities.

The proposed amendment is not directly related to this purpose.

- Q. Paragraph 2.0 (q) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to encourage the preservation of agricultural belts surrounding urban areas, to retain the agricultural nature of the County, and the individual character of existing communities.

The proposed amendment is consistent with this purpose.

- R. Paragraph 2.0 (r) of the Ordinance states that one purpose of the zoning regulations and standards that have been adopted and established is to provide for the safe and efficient development of renewable energy sources in those parts of the COUNTY that are most suited to their development.

The proposed amendment is not directly related to this purpose.

17. The proposed text amendment **WILL** improve the text of the Zoning Ordinance because it **WILL** provide:
 - A. A classification which allows DATA CENTERS and PV SOLAR ARRAYS to be developed while establishing minimum requirements that ensure the purposes of the Zoning Ordinance will be met.
 - B. A means to regulate an activity for which there is demonstrated demand.

SUMMARY FINDING OF FACT

From the documents of record and the testimony and exhibits received at the public hearing conducted on **January 27, 2022**, the Zoning Board of Appeals of Champaign County finds that:

1. The proposed Zoning Ordinance text amendment ***IS NECESSARY TO ACHIEVE*** the Land Resource Management Plan because:
 - A. The proposed Zoning Ordinance text amendment will ***HELP ACHIEVE*** LRMP Goals 3, 4, 6, 7, and 8.
 - B. The proposed Zoning Ordinance text amendment ***WILL NOT IMPEDE*** the achievement of LRMP Goals 1, 2, and 9.
 - C. The proposed Zoning Ordinance text amendment is ***NOT RELEVANT*** to LRMP Goals 5 and 10.
2. The proposed text amendment ***WILL*** improve the Zoning Ordinance because it will:
 - A. ***HELP ACHIEVE*** the purpose of the Zoning Ordinance (see Item 16).
 - B. ***IMPROVE*** the text of the Zoning Ordinance (see Item 17).

DOCUMENTS OF RECORD

1. Legal advertisement for Case 030-AT-21
2. Preliminary Memorandum for Case 030-AT-21, with attachments:
 - A Legal advertisement
 - B ELUC Memorandum dated November 29, 2021
 - Exhibit A: Proposed Amendment dated November 29, 2021
 - C Land Resource Management Plan (LRMP) Goals & Objectives
(available on ZBA meetings website)
 - D Preliminary Finding of Fact, Summary Finding of Fact, and Final Determination for Case 030-AT-21 dated January 27, 2021, with attachment:
 - Exhibit A: Proposed Amendment dated January 27, 2022

FINAL DETERMINATION

Pursuant to the authority granted by Section 9.2 of the Champaign County Zoning Ordinance, the Zoning Board of Appeals of Champaign County recommends that:

The Zoning Ordinance Amendment requested in **Case 030-AT-21** should ***{BE ENACTED / NOT BE ENACTED}*** by the County Board in the form attached hereto.

The foregoing is an accurate and complete record of the Findings and Determination of the Zoning Board of Appeals of Champaign County.

SIGNED:

ATTEST:

Ryan Elwell, Chair
Champaign County Zoning Board of Appeals

Secretary to the Zoning Board of Appeals

Date

PROPOSED AMENDMENT DATED JANUARY 27, 2022

1. Add the following to Section 3. Definitions:

DATA CENTER: A centralized location where computing and networking equipment is concentrated for the purpose of collecting, storing, processing, distributing or allowing access to large amounts of data.

PV SOLAR ARRAY: a collection of multiple photovoltaic *solar panels* that convert sunlight to electricity as a system primarily to be used onsite.

2. Add new paragraph 4.2.1 C.6. as follows:

4.2.1 CONSTRUCTION and USE

C. It shall be unlawful to erect or establish more than one MAIN or PRINCIPAL STRUCTURE or BUILDING per LOT or more than one PRINCIPAL USE per LOT in the AG-1, Agriculture, AG-2, Agriculture, CR, Conservation-Recreation, R-1, Single Family Residence, R-2, Single Family Residence, and R-3, Two Family Residence DISTRICTS other than in PLANNED UNIT DEVELOPMENTS except as follows:

6. A PV SOLAR ARRAY may be authorized as a County Board SPECIAL USE Permit in the AG-2 Agriculture Zoning District as a second PRINCIPAL USE on a LOT with another PRINCIPAL USE.”

3. Revise Section 5.2 as follows:

SECTION 5.2 TABLE OF AUTHORIZED PRINCIPAL USES

- DATA CENTER would be a new land use allowed by Special Use Permit in the AG-2 Agriculture, B-4 General Business and I-1 Light Industry Zoning Districts, as shown in the table below.
- PV SOLAR ARRAY would be allowed by a COUNTY BOARD Special Use Permit in the AG-2 Agriculture and all Business and Industrial Zoning Districts with this amendment, as shown in the table below.

Principal USES	Zoning DISTRICTS														
	CR	AG-1	AG-2	R-1	R-2	R-3	R-4	R-5	B-1	B-2	B-3	B-4	B-5	I-1	I-2
DATA CENTER			S									S		S	
PV SOLAR ARRAY ³¹			B						B	B	B	B	B	B	B

S

= Permitted by Special Use Permit

B

= Permitted by COUNTY BOARD Special Use Permit

4. Add new Footnote 31 under Section 5.2 as follows:

31. A PV SOLAR ARRAY with one megawatt or more is permitted by a COUNTY BOARD Special Use Permit, subject to the requirements of Sections 6.1.1 and 6.1.5 of the Zoning Ordinance and shall also be a second PRINCIPAL USE requiring a Special Use Permit per Section 4.2.1 F. A PV SOLAR ARRAY with less than one megawatt is permitted under the terms of Section 7.9 ACCESSORY PV SOLAR ARRAY.

5. Add to Section 6.1.3 as follows:

SECTION 6.1.3 SCHEDULE OF STANDARD CONDITIONS FOR SPECIFIC TYPES OF SPECIAL USES

SPECIAL USES or USE Categories	Minimum Fencing Required ⁶	Minimum LOT Size		Maximum HEIGHT		Required YARDS (feet)					Explanatory or Special Provisions
		AREA (Acres)	Width (feet)	Feet	Stories	Front Setback from STREET Centerline ²			SIDE	REAR	
						MAJOR	COLLECTOR	MINOR			
	NR	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	*See below
DATA CENTER	1. The location of the data center must be approved in writing by the relevant Fire Protection District. 2. The petitioner shall provide the P&Z Department with a written explanation of security features for the DATA CENTER. 3. DATA CENTERS constructed with PV SOLAR ARRAYS shall be located adjacent to the solar inverter and as far as possible from property lines and adjacent DWELLINGS consistent with good engineering practice.										

6. Add new Section 7.9 ACCESSORY PV SOLAR ARRAY as follows:

- A. A PV SOLAR ARRAY with an output of less than one megawatt shall be permitted as an ACCESSORY STRUCTURE subject to the following standards:
1. An accessory ground-mounted PV SOLAR ARRAY with less than one megawatt on contiguous lots under common ownership shall require compliance with minimum zoning requirements in Section 7.2 YARDS for DETACHED ACCESSORY BUILDINGS and STRUCTURES.
 2. For an accessory ground-mounted PV SOLAR ARRAY greater than 1,000 square feet in area, screening requirements shall apply per Sections 7.6.2 and 7.6.3.
 3. No permit is required for roof-mounted PV SOLAR ARRAYS.
 4. Loading berths and parking spaces are not required for accessory ground-mounted PV SOLAR ARRAYS.

Exhibit B: CCDPZ Supplemental Memorandum #1

Champaign County
Department of

**PLANNING &
ZONING**

Brookens Administrative
Center

1776 E. Washington Street
Urbana, Illinois 61802

(217) 384-3708

zoningdept@co.champaign.il.us

www.co.champaign.il.us/zoning

CASE 030-AT-21

SUPPLEMENTAL MEMORANDUM #1

MARCH 3, 2022

Petitioner: Zoning Administrator

Request: Amend the Champaign County Zoning Ordinance as follows:

1. Amend Section 3.0 Definitions by adding a definition for “DATA CENTER” and “PV SOLAR ARRAY.”
2. Add new paragraph 4.2.1 C.6. that authorizes a PV SOLAR ARRAY as a County Board SPECIAL USE Permit in the AG-2 Agriculture Zoning District as a second PRINCIPAL USE on a LOT with another PRINCIPAL USE.
3. Amend Section 5.2 Table of Authorized Principal Uses by adding DATA CENTER as a Special Use in the AG-2 Agriculture, B-4 General Business and I-1 Light Industry Zoning Districts, and by adding PV SOLAR ARRAY as a County Board Special Use Permit in the AG-2 Agriculture and all Business and Industrial Zoning Districts.
4. Add footnote 31 to Section 5.2 Table of Authorized Principal Uses for classifying the requirements for PV SOLAR ARRAYS with an output of one megawatt or more as a County Board Special Use Permit and PV solar arrays with an output of less than one megawatt as an ACCESSORY PV SOLAR ARRAY.
5. Add standard conditions to Section 6.1.3 Schedule of Standard Conditions for Specific Types of Special Uses as follows:
 - A. The location of the DATA CENTER must be approved in writing by the relevant Fire Protection District.
 - B. The petitioner shall provide the P&Z Department with a written explanation of security features for the DATA CENTER.
 - C. DATA CENTERS constructed with PV SOLAR ARRAYS shall be located adjacent to the solar inverter and as far as possible from property lines and adjacent DWELLINGS consistent with good engineering practice.
6. Add new Section 7.9 Accessory PV SOLAR ARRAY, with new requirements including but not limited to the following:
 - A. A PV SOLAR ARRAY with an output of less than one megawatt shall be permitted as an ACCESSORY STRUCTURE subject to the following standards:
 1. An accessory ground-mounted PV SOLAR ARRAY with less than one megawatt on contiguous lots under common ownership shall require compliance with minimum zoning requirements in Section 7.2 YARDS for DETACHED ACCESSORY BUILDINGS and STRUCTURES.
 2. For an accessory ground-mounted PV SOLAR ARRAY greater than 1,000 square feet in area, screening requirements shall apply per Sections 7.6.2 and 7.6.3.

3. No permit is required for roof-mounted PV SOLAR ARRAYS.
4. Loading berths and parking spaces are not required for accessory ground-mounted PV SOLAR ARRAYS.

Location: Unincorporated Champaign County

Time Schedule for Development: As soon as possible

Prepared by: Susan Burgstrom, Senior Planner
John Hall, Zoning Administrator

STATUS

On February 25, 2022, P&Z staff received an example illustration of the building for the data center, which would be approximately 1,400 square feet (Attachment C). It is unknown how many of these buildings there would be on a property.

P&Z Staff have two proposed additions to the text amendment, outlined below and in Attachment B to this memorandum.

Interconnection agreement for PV Solar Arrays

John Hall, Zoning Administrator, investigated whether interconnection requirements for PV solar arrays need to be revised to more accurately reflect how the interconnection agreement process works. The existing requirements of the Champaign County Zoning Ordinance for a “PV Solar Farm” are found in Section 6.1.5B.(3) and are the following:

- (3) Interconnection to the power grid
 - a. The PV SOLAR FARM SPECIAL USE Permit application shall include documentation that the applicant or PV SOLAR FARM is in the queue to acquire an interconnection agreement to the power grid.
 - b. Documentation of an executed interconnection agreement with the appropriate electric utility shall be provided prior to issuance of a Zoning Compliance Certificate to authorize operation of the PV SOLAR FARM.

Mr. Hall drafted a Standard Condition in Section 6.1.3 for PV Solar Arrays as follows:

1. The following requirements are in lieu of the requirements of Section 6.1.5B.(3):
 - A. The utility interconnection application must be applied for with the relevant utility and documentation provided at the time of Special Use Permit application.
 - B. Documentation must be provided that the utility has accepted the application for the PV SOLAR ARRAY prior to issuance of the Zoning Compliance Certificate.

Noise study for Data Centers

Data centers can make significant amounts of noise that might exceed Illinois Pollution Control Board standards. P&Z Staff proposed adding a fourth Standard Condition for Data Centers under Section 6.1.3 as follows:

Exhibit B: CCDPZ Supplemental Memorandum #1

Case 030-AT-21

Zoning Administrator

MARCH 3, 2022

3

4. Noise levels from any DATA CENTER shall be in compliance with the applicable Illinois Pollution Control Board (IPCB) regulations (35 Illinois Administrative Code, Subtitle H: Noise, Parts 900, 901, 910).
 - A. Any applicant located within 1,500 feet of a DWELLING shall submit a noise analysis by a qualified professional that demonstrates compliance with the IPCB noise regulations similar to the requirements of Section 6.1.5I.(3). The analysis shall include manufacturer's sound power level characteristics and other relevant data regarding noise characteristics of proposed DATA CENTER equipment.
 - B. Enforcement shall follow protocols established in Section 6.1.5 I.(4) of the Zoning Ordinance.

ATTACHMENTS

- A Legal advertisement
- B Exhibit A: Proposed Amendment revised March 3, 2022
- C Example data center building received February 25, 2022

LEGAL PUBLICATION: WEDNESDAY, JANUARY 12, 2022

CASE: 030-AT-21

NOTICE OF PUBLIC HEARING IN REGARD TO AN AMENDMENT TO THE TEXT OF THE CHAMPAIGN COUNTY ZONING ORDINANCE

CASE 030-AT-21

The Champaign County Zoning Administrator, 1776 East Washington Street, Urbana, has filed a petition to amend the text of the Champaign County Zoning Ordinance. The petition is on file in the office of the Champaign County Department of Planning and Zoning, 1776 East Washington Street, Urbana, IL.

A public hearing will be held **Thursday, January 27, 2022 at 6:30 p.m.** prevailing time in the Shields-Carter Meeting Room, Brookens Administrative Center, 1776 East Washington Street, Urbana, IL, at which time and place the Champaign County Zoning Board of Appeals will consider a petition for the following:

Amend the Champaign County Zoning Ordinance as follows:

1. Amend Section 3.0 Definitions by adding a definition for “DATA CENTER” and “PV SOLAR ARRAY.”
2. Add new paragraph 4.2.1 C.6. that authorizes a PV SOLAR ARRAY as a County Board SPECIAL USE Permit in the AG-2 Agriculture Zoning District as a second PRINCIPAL USE on a LOT with another PRINCIPAL USE.
3. Amend Section 5.2 Table of Authorized Principal Uses by adding DATA CENTER as a Special Use in the AG-2 Agriculture, B-4 General Business and I-1 Light Industry Zoning Districts, and by adding PV SOLAR ARRAY as a County Board Special Use Permit in the AG-2 Agriculture and all Business and Industrial Zoning Districts.
4. Add footnote 31 to Section 5.2 Table of Authorized Principal Uses for classifying the requirements for PV SOLAR ARRAYS with an output of one megawatt or more as a County Board Special Use Permit and PV solar arrays with an output of less than one megawatt as an ACCESSORY PV SOLAR ARRAY.
5. Add standard conditions to Section 6.1.3 Schedule of Standard Conditions for Specific Types of Special Uses as follows:
 - A. The location of the DATA CENTER must be approved in writing by the relevant Fire Protection District.
 - B. The petitioner shall provide the P&Z Department with a written explanation of security features for the DATA CENTER.
 - C. DATA CENTERS constructed with PV SOLAR ARRAYS shall be located adjacent to the solar inverter and as far as possible from property lines and adjacent DWELLINGS consistent with good engineering practice.
6. Add new Section 7.9 Accessory PV SOLAR ARRAY, with new requirements including but not limited to the following:
 - A. A PV SOLAR ARRAY with an output of less than one megawatt shall be permitted as an ACCESSORY STRUCTURE subject to the following standards:
 1. An accessory ground-mounted PV SOLAR ARRAY with less than one megawatt on contiguous lots under common ownership shall require compliance with

minimum zoning requirements in Section 7.2 YARDS for DETACHED ACCESSORY BUILDINGS and STRUCTURES.

2. For an accessory ground-mounted PV SOLAR ARRAY greater than 1,000 square feet in area, screening requirements shall apply per Sections 7.6.2 and 7.6.3.
3. No permit is required for roof-mounted PV SOLAR ARRAYS.
4. Loading berths and parking spaces are not required for accessory ground-mounted PV SOLAR ARRAYS.

All persons interested are invited to attend said hearing and be heard. Please wear a mask. If you would like to submit comments or questions before the meeting, please call the P&Z Department at 217-384-3708 or email zoningdept@co.champaign.il.us no later than 4:30 pm the day of the meeting. The hearing may be continued and reconvened at a later time.

Ryan Elwell, Chair
Champaign County Zoning Board of Appeals

TO BE PUBLISHED: WEDNESDAY, JANUARY 12, 2022, ONLY

Send bill and one copy to: Champaign County Planning and Zoning Dept.
Brookens Administrative Center
1776 E. Washington Street
Urbana, IL 61802
Phone: 384-3708

Our News Gazette account number is 99225860.

EXHIBIT A: PROPOSED AMENDMENT REVISED MARCH 3, 2022

1. Add the following to Section 3. Definitions:

DATA CENTER: A centralized location where computing and networking equipment is concentrated for the purpose of collecting, storing, processing, distributing or allowing access to large amounts of data.

PV SOLAR ARRAY: a collection of multiple photovoltaic solar panels that convert sunlight to electricity as a system primarily to be used onsite.

2. Add new paragraph 4.2.1 C.6. as follows:

4.2.1 CONSTRUCTION and USE

C. It shall be unlawful to erect or establish more than one MAIN or PRINCIPAL STRUCTURE or BUILDING per LOT or more than one PRINCIPAL USE per LOT in the AG-1, Agriculture, AG-2, Agriculture, CR, Conservation-Recreation, R-1, Single Family Residence, R-2, Single Family Residence, and R-3, Two Family Residence DISTRICTS other than in PLANNED UNIT DEVELOPMENTS except as follows:

6. A PV SOLAR ARRAY may be authorized as a County Board SPECIAL USE Permit in the AG-2 Agriculture Zoning District as a second PRINCIPAL USE on a LOT with another PRINCIPAL USE.”

3. Amend Section 5.2 as follows:

SECTION 5.2 TABLE OF AUTHORIZED PRINCIPAL USES

- DATA CENTER would be a new land use allowed by Special Use Permit in the AG-2 Agriculture, B-4 General Business and I-1 Light Industry Zoning Districts, as shown in the table below.
- PV SOLAR ARRAY would be allowed by a COUNTY BOARD Special Use Permit in the AG-2 Agriculture and all Business and Industrial Zoning Districts with this amendment, as shown in the table below.

Principal USES	Zoning DISTRICTS															
	CR	AG-1	AG-2	R-1	R-2	R-3	R-4	R-5	B-1	B-2	B-3	B-4	B-5	I-1	I-2	
DATA CENTER			S									S		S		
PV SOLAR ARRAY ³¹			B						B	B	B	B	B	B	B	

S

= Permitted by Special Use Permit

B

= Permitted by COUNTY BOARD Special Use Permit

4. Add new Footnote 31 under Section 5.2 as follows:

31. A PV SOLAR ARRAY with one megawatt or more is permitted by a COUNTY BOARD Special Use Permit, subject to the requirements of Sections 6.1.1 and 6.1.5 of the Zoning Ordinance and shall also be a second PRINCIPAL USE requiring a Special Use Permit per Section 4.2.1 F. A PV SOLAR ARRAY with less than one megawatt is permitted under the terms of Section 7.9 ACCESSORY PV SOLAR ARRAY.

Exhibit B: CDPZ Supplemental Memorandum #1

EXHIBIT A: PROPOSED AMENDMENT **REVISED MARCH 3, 2022**

5. Add to Section 6.1.3 as follows:

SECTION 6.1.3 SCHEDULE OF STANDARD CONDITIONS FOR SPECIFIC TYPES OF SPECIAL USES

SPECIAL USES or USE Categories	Minimum Fencing Required ⁶	Minimum LOT Size		Maximum HEIGHT		Required YARDS (feet)					Explanatory or Special Provisions
		AREA (Acres)	Width (feet)	Feet	Stories	Front Setback from STREET Centerline ²			SIDE	REAR	
						STREET Classification MAJOR	COLLECTOR	MINOR			
DATA CENTER	NR	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	*See below
	<ol style="list-style-type: none"> 1. The location of the DATA CENTER must be approved in writing by the relevant Fire Protection District. 2. The petitioner shall provide the P&Z Department with a written explanation of security features for the DATA CENTER. 3. DATA CENTERS constructed with PV SOLAR ARRAYS shall be located adjacent to the solar inverter and as far as possible from property lines and adjacent DWELLINGS consistent with good engineering practice. 4. Noise levels from any DATA CENTER shall be in compliance with the applicable Illinois Pollution Control Board (IPCB) regulations (35 Illinois Administrative Code, Subtitle H: Noise, Parts 900, 901, 910). <ol style="list-style-type: none"> A. Any applicant located within 1,500 feet of a DWELLING shall submit a noise analysis by a qualified professional that demonstrates compliance with the IPCB noise regulations similar to the requirements of Section 6.1.5l.(3). The analysis shall include manufacturer's sound power level characteristics and other relevant data regarding noise characteristics of proposed DATA CENTER equipment. B. Enforcement shall follow protocols established in Section 6.1.5 l.(4) of the Zoning Ordinance. 										
PV SOLAR ARRAY	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	*See below
	<ol style="list-style-type: none"> 1. The following requirements are in lieu of the requirements of Section 6.1.5B.(3): <ol style="list-style-type: none"> A. The utility interconnection application must be applied for with the relevant utility and documentation provided at the time of Special Use Permit application. B. Documentation must be provided that the utility has accepted the application for the PV SOLAR ARRAY prior to issuance of the Zoning Compliance Certificate. 										

Footnotes
 1. Standard same as applicable zoning DISTRICT.

6. Add new Section 7.9 ACCESSORY PV SOLAR ARRAY as follows:

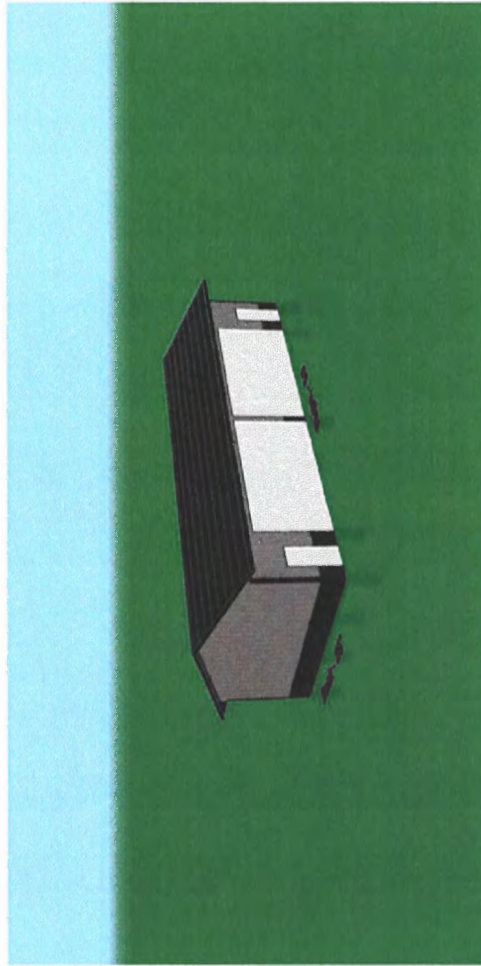
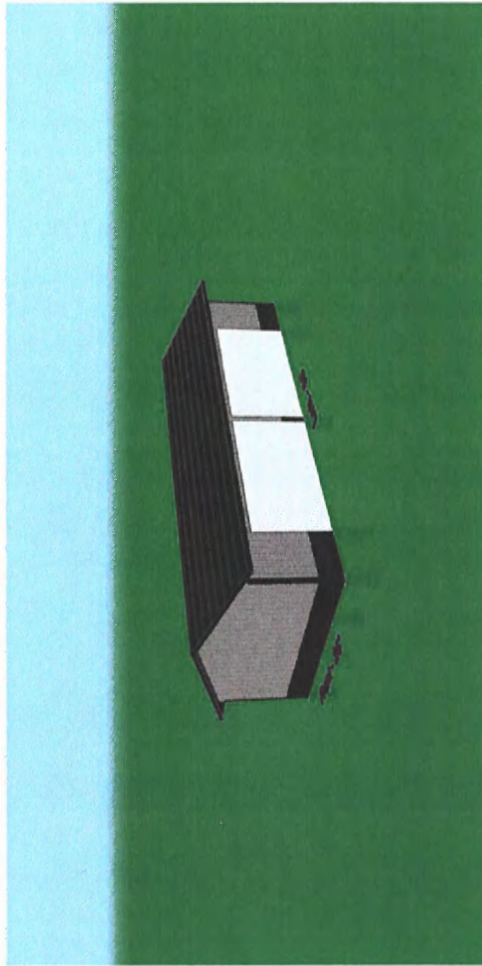
- A. A PV SOLAR ARRAY with an output of less than one megawatt shall be permitted as an ACCESSORY STRUCTURE subject to the following standards:
 1. An accessory ground-mounted PV SOLAR ARRAY with less than one megawatt on contiguous lots under common ownership shall require compliance with minimum zoning requirements in Section 7.2 YARDS for DETACHED ACCESSORY BUILDINGS and STRUCTURES.
 2. For an accessory ground-mounted PV SOLAR ARRAY greater than 1,000 square feet in area, screening requirements shall apply per Sections 7.6.2 and 7.6.3.
 3. No permit is required for roof-mounted PV SOLAR ARRAYS.
 4. Loading berths and parking spaces are not required for accessory ground-mounted PV SOLAR ARRAYS.

Exhibit B: CCDPZ Supplemental Memorandum #1

Summary Sheet

Summary	
Width	25'
Length	56'
Ceiling Height	12'
Slab Depth	0'
Overhangs	4
Roof Pitch	4/12

Job Information	
Customer	BTB Energy Solutions-Urbana2
Job Name	
Contact	
Email	
Phone	
Delivery Address	
ZIP code	
Desired Date	
Comments	
Customer Name	

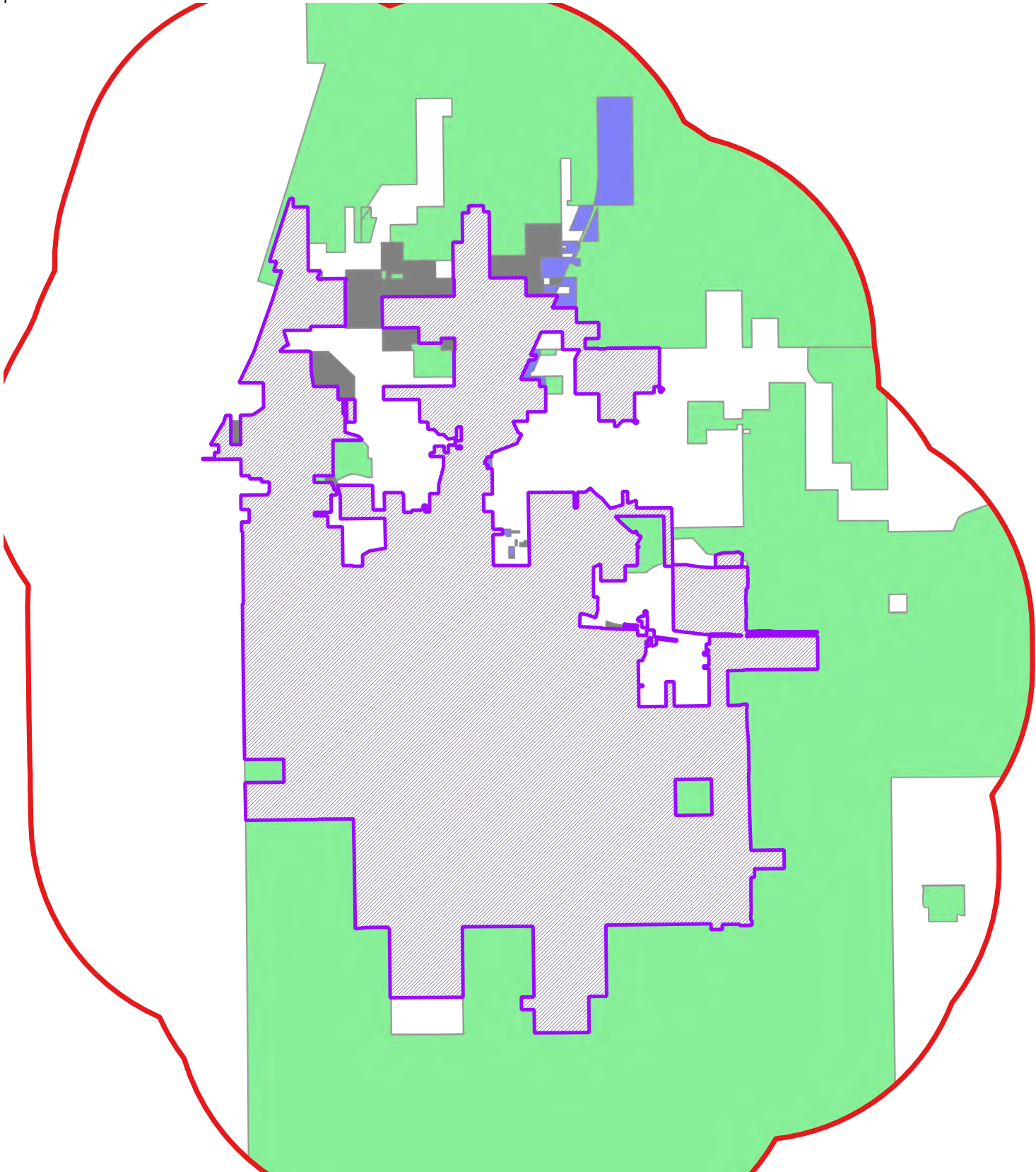


RECEIVED

FEB 25 2022

CHAMPAIGN CO. P & Z DEPARTMENT

Exhibit C: Proposed Data Center Districts: County AG-2, B-4, I-1



Case No.: CCZBA-030-AT-21
Subject: Data Centers & PV Solar Arrays
Location: Champaign County
Petitioners: Champaign County
Zoning Administrator

County Zoning
AG-2
B-4
I-1 Industrial

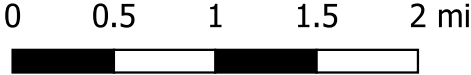
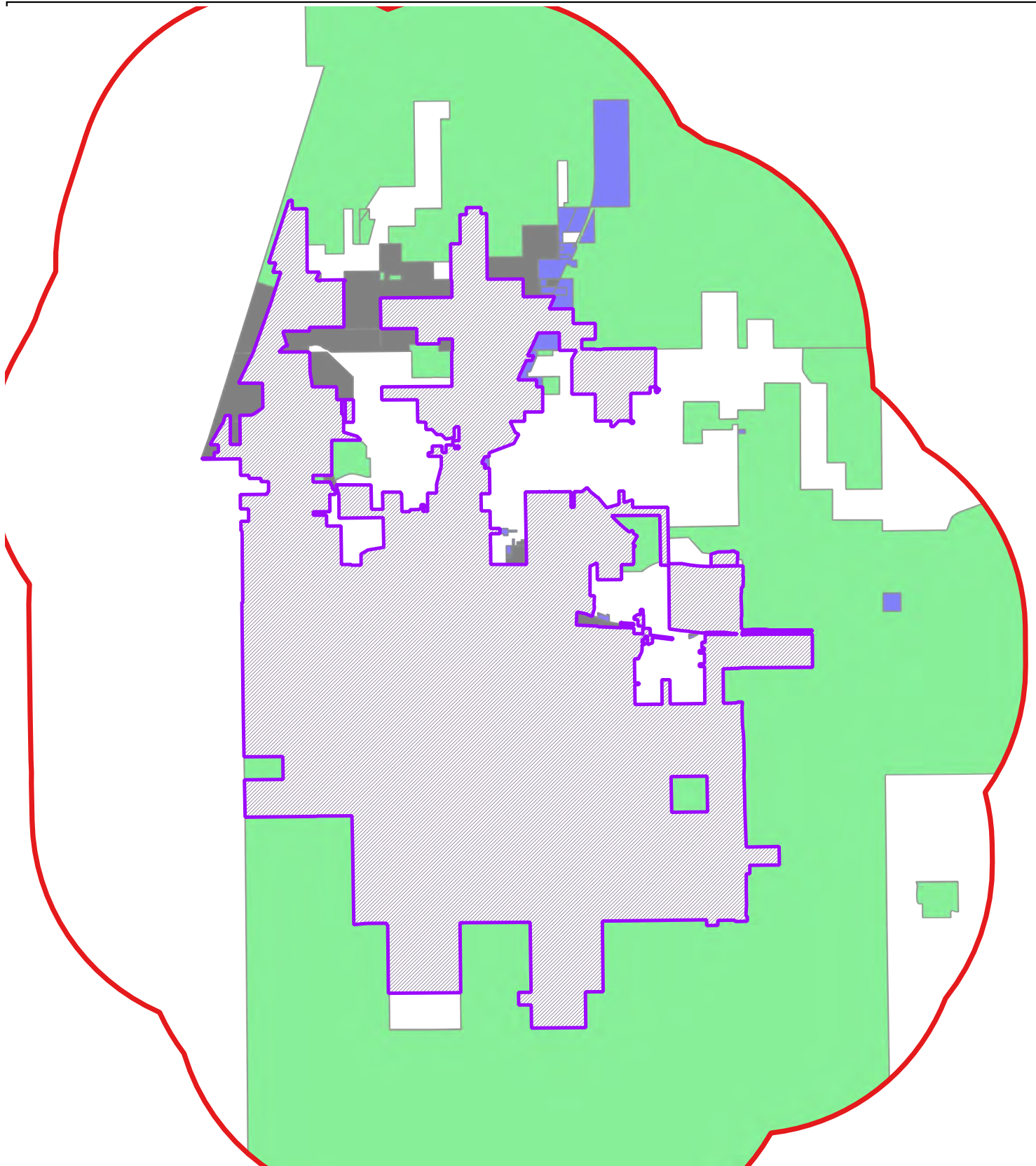


Exhibit D: Proposed PV Solar Array Districts: County AG-2, Business, Industrial



Case No.: CCZBA-030-AT-21
Subject: Data Centers & PV Solar Arrays
Location: Champaign County
Petitioners: Champaign County
Zoning Administrator



0 0.5 1 1.5 2 mi



County Zoning

- | | |
|--------------|----------------|
| AG-2 | B-3 |
| B-1 Business | B-4 |
| B-2 | I-1 Industrial |
| | I-2 |

Exhibit E: County Zoning Description Sheets

*Champaign County, Illinois
Zoning Ordinance*

SECTION 5 ZONING DISTRICTS AND MAP

5.1 General Intent of Zoning DISTRICTS

5.1.1 AG-1 Agriculture

The AG-1, Agriculture DISTRICT is intended to protect the areas of the COUNTY where soil and topographic conditions are best adapted to the pursuit of AGRICULTURAL USES and to prevent the admixture of urban and rural USES which would contribute to the premature termination of AGRICULTURE pursuits.

5.1.2 AG-2 Agriculture

The AG-2, Agriculture DISTRICT is intended to prevent scattered indiscriminate urban development and to preserve the AGRICULTURAL nature within areas which are predominately vacant and which presently do not demonstrate any significant potential for development. This DISTRICT is intended generally for application to areas within one and one-half miles of existing communities in the COUNTY.

5.1.3 CR Conservation-Recreation

The CR, Conservation-Recreation DISTRICT is intended to protect the public health by restricting development in areas subject to frequent or periodic floods and to conserve the natural and scenic areas generally along the major stream networks of the COUNTY.

5.1.4 R-1 Single Family Residence

The R-1, Single Family Residence DISTRICT is intended to provide areas for single FAMILY detached DWELLINGS, set on LOTS and is intended for application in mainly non-urban and developing areas where community facilities can be made readily available.

5.1.5 R-2 Single Family Residence

The R-2, Single Family Residence DISTRICT is intended to provide areas for SINGLE FAMILY detached DWELLINGS, set on medium sized building LOTS and is intended for application within or adjoining developed areas where community facilities exist.

5.1.6 R-3 Two Family Residence

The R-3, Two Family Residence DISTRICT is intended to provide areas for SINGLE and TWO FAMILY DWELLINGS, set on medium sized building LOTS and is intended for application within or adjoining developed areas where community facilities exist.

Exhibit E: County Zoning Description Sheets

*Champaign County, Illinois
Zoning Ordinance*

5.1.7 R-4 Multiple Family Residence

The R-4, Multiple Family Residence DISTRICT is intended to provide areas for SINGLE FAMILY, TWO FAMILY, and MULTIPLE FAMILY DWELLINGS set in a medium density housing environment.

5.1.8 R-5 MANUFACTURED HOME Park

The R-5, MANUFACTURED HOME Park DISTRICT is intended to accommodate MANUFACTURED HOME PARKS and their associated USES in a medium density housing environment.

5.1.9 B-1 Rural Trade Center

The B-1, Rural Trade Center DISTRICT is intended to provide areas for AGRICULTURAL related business services to rural residents.

5.1.10 B-2 Neighborhood Business

The B-2, Neighborhood Business DISTRICT is intended to provide areas for the convenience of adjacent residential areas, and to permit only such USES as are necessary to satisfy limited basic shopping needs which occur daily or frequently.

5.1.11 B-3 Highway Business

The B-3, Highway Business DISTRICT is intended to provide areas for commercial establishments which primarily serve the needs of motorists and are intended for application only adjacent to major thoroughfares in the COUNTY.

5.1.12 B-4 General Business

The B-4, General Business DISTRICT is intended to accommodate a range of commercial USES and is intended for application only adjacent to the urbanized areas of the COUNTY.

5.1.13 B-5 Central Business

The B-5, Central Business DISTRICT is intended to provide for needs of a larger consumer population than served by the Neighborhood Business DISTRICT and is located generally in the business DISTRICTS of the unzoned municipalities in the COUNTY.

Exhibit E: County Zoning Description Sheets

*Champaign County, Illinois
Zoning Ordinance*

5.1.14 I-1 Light Industry

The I-1, Light Industry DISTRICT is established to provide for storage and manufacturing USES not normally creating a nuisance discernible beyond its PROPERTY lines.

5.1.15 I-2 Heavy Industry

The I-2, Heavy Industry DISTRICT is established to accommodate those manufacturing USES that have moderate environmental effects and are located in areas relatively remote from residential and prime retail development.

5.1.16 RRO Rural Residential OVERLAY

The RRO, Rural Residential OVERLAY DISTRICT is intended to provide rural areas that are suitable for residential development and whose development will not significantly interfere with AGRICULTURAL pursuits in neighboring areas.

MINUTES OF A REGULAR MEETING

URBANA PLAN COMMISSION

DRAFT

DATE: March 24, 2022

TIME: 7:00 P.M.

PLACE: Zoom Webinar

MEMBERS ATTENDING

VIA ZOOM: Andrew Fell, Lew Hopkins, Debarah McFarland, Chenxi Yu

MEMBER ATTENDING

AT CITY BUILDING: Dustin Allred

MEMBERS EXCUSED: Jane Billman, Karen Simms

STAFF PRESENT: UPTV Camera Operator; Kevin Garcia, Principal Planner | Zoning Administrator; Marcus Ricci, Planner II; Lily Wilcock, Planner II; Nick Olsen, Planner I

PUBLIC PRESENT: Kayla Baldwin, John Hall, Bob Kapolnek, James Kim, Daisy Ochoa

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8. NEW BUSINESS

Case No. CCZBA-030-AT-21 – A request by the Champaign County Zoning Administrator to amend the Champaign County Zoning Ordinance to add Data Center and PV Solar Array to the Table of Authorized Principal Uses, and related changes.

Chair Allred opened Case No. CCZBA-030-AT-21. Marcus Ricci, Planner II, presented the staff report and gave a brief background for the proposed County text amendment. He reviewed the changes in the text amendment. He referred to Table 1. Comparison of County and City Zoning Districts. The table shows the districts that data centers, PV solar arrays and PV solar farms are allowed in. He talked about the City's regulations for data centers and PV solar arrays. He referred to Figure 1. Champaign County Proposed Solar Array Process Flowchart that is included in the written staff report. He also showed Exhibit C, Proposed Data Center Districts, and Exhibit D, Proposed PV Solar Array Districts, which are maps showing the County zoning districts where data centers and PV solar arrays would be allowed. He talked about the implications of the proposed text amendment on developments within the City's Extra Territorial Jurisdiction (ETJ) area and how

EXHIBIT F – Draft Plan Commission Minutes 3-24-2022

the proposed text amendment relates to the City’s 2005 Comprehensive Plan. He read the options of the Plan Commission and presented City staff’s recommendation not to protest the proposed amendment.

Chair Allred asked if any Plan Commission members had questions for City staff.

Mr. Hopkins asked if Champaign County special use permits were brought before the Plan Commission. Kevin Garcia, Principal Planner | Zoning Administrator, replied that Section XI.2 of the Urbana Zoning Ordinance states that the Plan Commission has the power to review zoning and special use cases before the Champaign County Zoning Board.

Mr. Hopkins asked if the Illinois Pollution Control regulates noise control for data centers independent of surrounding land uses. Mr. Ricci explained that land uses are taken into consideration.

Mr. Hopkins asked for clarification that if an engineer is required to confirm an analysis only if there is a residence within 1,500 feet; however, the noise regulations apply regardless. Mr. Ricci said that any noise level from any data center has to comply with the Illinois Pollution Control noise regulations. If a data center is located within 1,500 feet, then the applicant would be required to submit a noise analysis with the special use permit application. However, if the Illinois Pollution Control gets a complaint about the noise level coming from a data center further away from a residence than 1,500 feet, then they will follow up and enforce the noise regulations.

Mr. Allred questioned in what way is the determination to classify data centers as Electrical Substations in the City of Urbana. Mr. Garcia replied that a determination like this is made when a use is proposed that is not listed in the Zoning Ordinance’s Table of Uses. The Zoning Administrator is tasked with picking the most similar use from the uses listed. He noted that City staff is in the process of creating definitions and regulations for solar arrays. Mr. Hopkins said that he finds the equation of data centers and electrical substations problematic. Mr. Garcia agreed.

With there being no further questions for City staff, Chair Allred opened the case for public input. There was none, so Chair Allred opened the case for Plan Commission discussion and/or motion(s).

Mr. Hopkins raised the issue of recent negative press about noise from data centers. He expressed concern about future development on the edge of Urbana approaching where data centers are being built. He thought the proposed County text amendment looks good, but he would like to know more about how the noise regulations work in practice. He suggested that the City staff make defining “data center” in the City’s Zoning Ordinance a priority so we know how to address it for future data center and solar array applications. Mr. Allred agreed with Mr. Hopkins.

Mr. Hopkins moved that the Plan Commission forward Case No. CCZBA-030-AT-21 to the City Council with a recommendation not to protest the proposed amendment. Mr. Fell seconded the motion. Roll call on the motion was as follows:

Ms. McFarland	-	No	Mr. Fell	-	Yes
Ms. Yu	-	Yes	Mr. Hopkins	-	Yes
Mr. Allred	-	Yes			

EXHIBIT F – Draft Plan Commission Minutes 3-24-2022

The motion was passed by a vote of 4 yeses to 1 no. Mr. Garcia stated that this case would be forwarded to City Council on April 11, 2022.

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