Data Center Phase 2 Work Session

Board of Supervisors

August 6, 2025

Data Center Ordinance: Phase 2
WHAT WE'RE DOING AND WHY

- Text amendment and creation of new zoning district for by-right centers.

- Rezoning properties that meet criteria.

- More robust performance requirements.

INTRODUCTION TO DATA CENTERS

- Data centers house computer systems that process large amounts of information.

- Data centers can provide a more diversified economy and tax base.

UNIQUE IMPACTS AND FEATURES ASSOCIATED WITH DATA CENTERS

- Needs uninterrupted power and consumes large amounts of power.

- The equipment in a data center generates heat and requires cooling.

- Can require large buildings.

- Requires fewer staff per square foot than other industrial or office spaces.

UNIQUE IMPACTS AND FEATURES ASSOCIATED WITH DATA CENTERS

- Supports local economies, enables innovation, and operates with minimal disruption to surrounding communities.

- Often has lower sewer demands than other industrial uses. Depending on the cooling method, can have lower or higher water demands than other uses.

- Generates fewer truck trips compared to most other industrial uses once operational

County Authority to Regulate Data Centers

The County is enabled to:

- Limit the zoning district(s) where data centers can be located

- Establish setbacks

- Set maximum size requirements

- Set maximum height requirements

- Set noise limits

- Require landscaping

County Authority to Regulate Data Centers

The County is not enabled to regulate data centers based on:

- Energy consumption or type of energy provided
- Employment
- Customers served
- Technology used
- The origin of the equipment used to operate the data center

Existing County Regulations on Data Centers
LOCATION REGULATIONS

- The County currently allows in these locations:

- Up to and including 40,000 square feet on property with industrial zoning.

- A special use permit is required on property with commercial zoning (regardless of size) or for data centers exceeding 40,000 square feet in size on industrially-zoned property.

Current Considerations
PERFORMANCE REGULATIONS: Setbacks

EXISTING REGULATION

- 200 feet from any lot line
- 500 feet from rural areas zoning

PROPOSED REGULATION

- 200 feet from property lines outside of the district.
- 500 feet from rural areas zoning.

Current Considerations
PERFORMANCE REGULATIONS: Generators

EXISTING REGULATION

- Enclosed in sound dampening enclosure
- Limited hours of operation except during power outage

PROPOSED REGULATION

- Retain existing regulations
- Use natural gas or low emission generators
- Battery Energy Storage systems permitted

Current Considerations
PERFORMANCE REGULATIONS:
Landscaping/Screening

EXISTING REGULATION

- Landscaping requirements can include two rows of trees

PROPOSED REGULATION

- Increased planting requirements: three rows of evergreen trees from an approved list
- Location of plantings determined by County
- Fencing must be between the building and the screening

Current Considerations
PERFORMANCE REGULATIONS: Building Design

EXISTING REGULATION

- Only on Entrance Corridors

PROPOSED REGULATION

- Requires design to break up blank walls
  - Recesses
  - Windows
  - Changes in building materials, texture or color
- Equipment contained within an enclosed building or courtyard

Current Considerations
PERFORMANCE REGULATIONS: Water

EXISTING REGULATION

- If water is used for cooling, must use a closed-loop or recycled water system

PROPOSED REGULATION

- Require coordination with RWSA/ACSA when initially filling cooling system or refilling/flushing.

- Additional review is ongoing.

Current Considerations
PERFORMANCE REGULATIONS: Noise

EXISTING REGULATION

- The County currently has regulations for all industrial uses.

PROPOSED REGULATION

- Most restrictive noise requirement must be met.
- Require submittal of sound study prior to approval
- Require monitoring after construction
- Increased setbacks and landscaping

Current Considerations
ZONING OVERLAY DISTRICT: Data Centers
Permitted By-Right

Criteria for districts:

- Property must be In the Development Area

- Recommended for industrial, R&D, or similar use in the Comprehensive Plan

- Served by public water and sewer

- Close to high-voltage power lines

Districts

Can have different regulations based on District

Outside District – 40K square feet (footprint)

Tier 1 – 125K square feet (footprint)
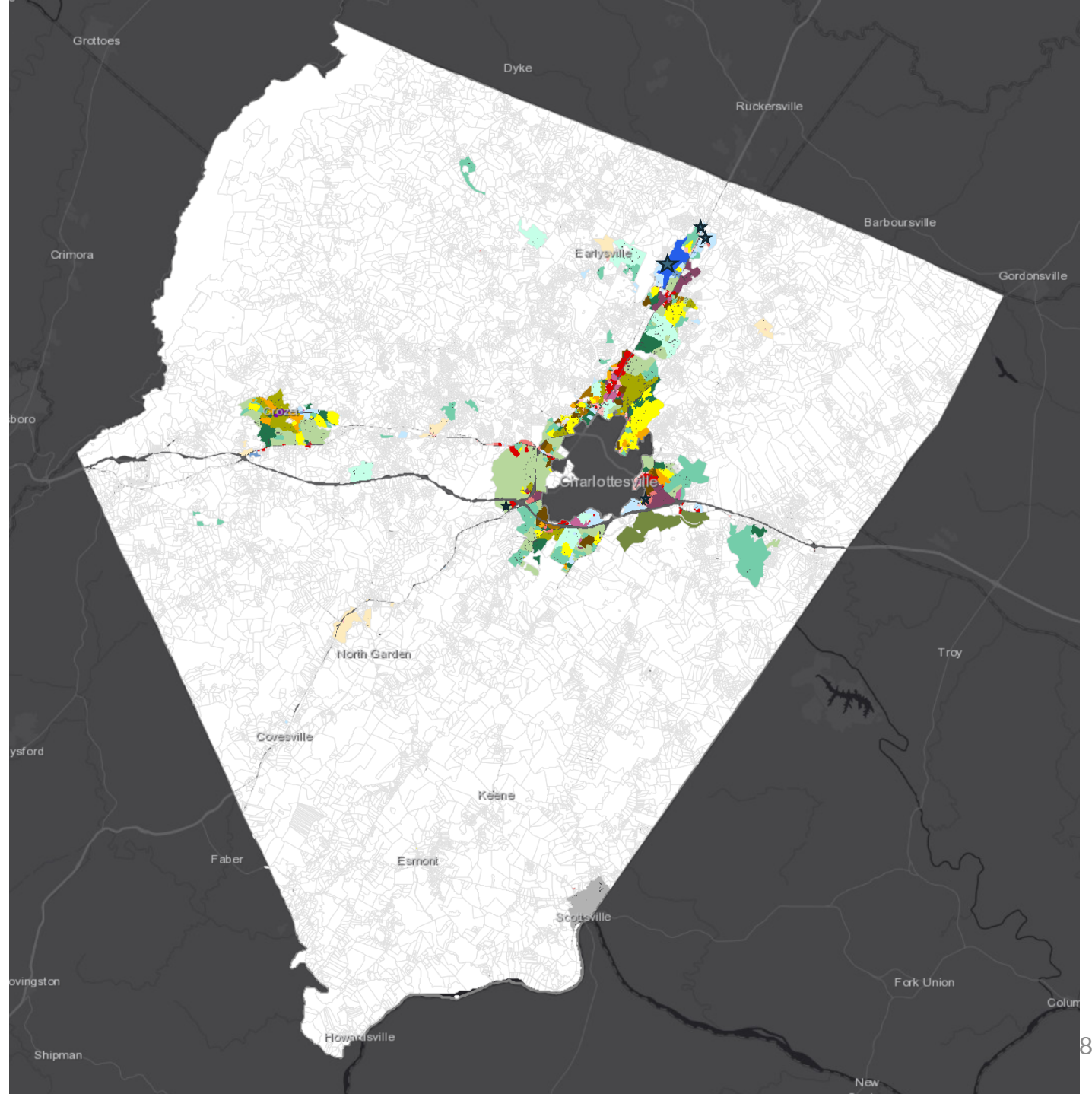
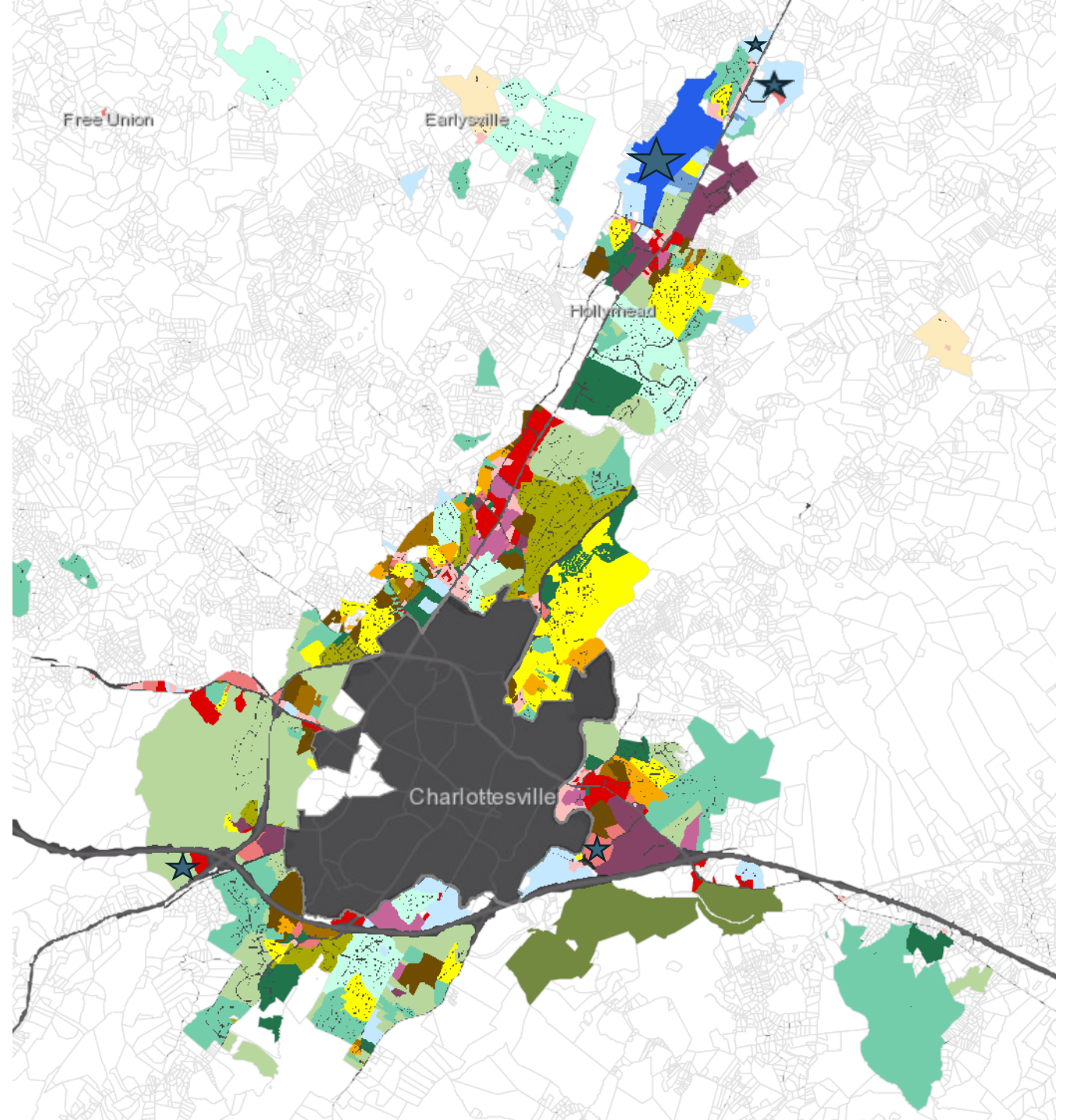Tier 2 – 500K square feet (footprint)

Examples of Building Size

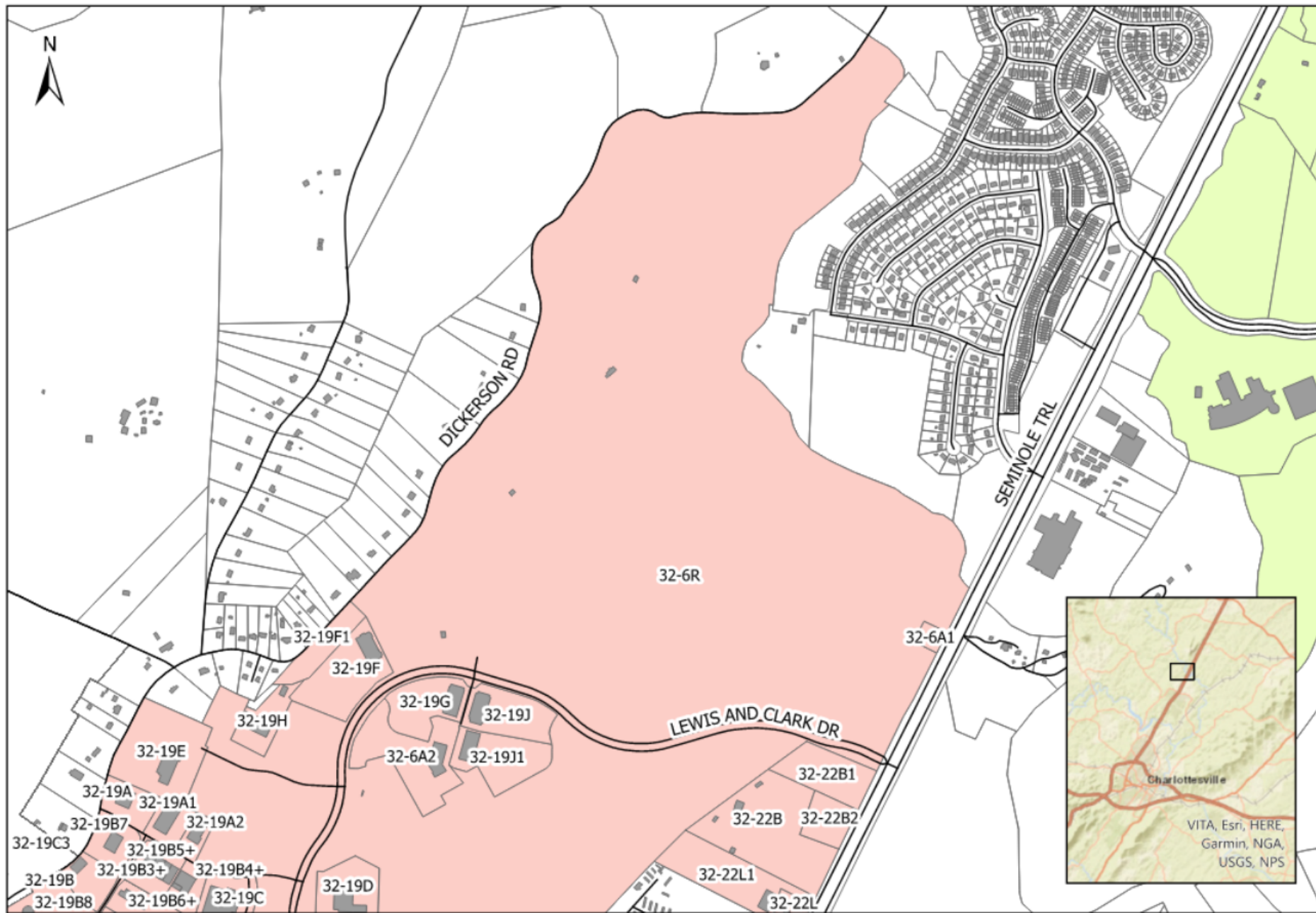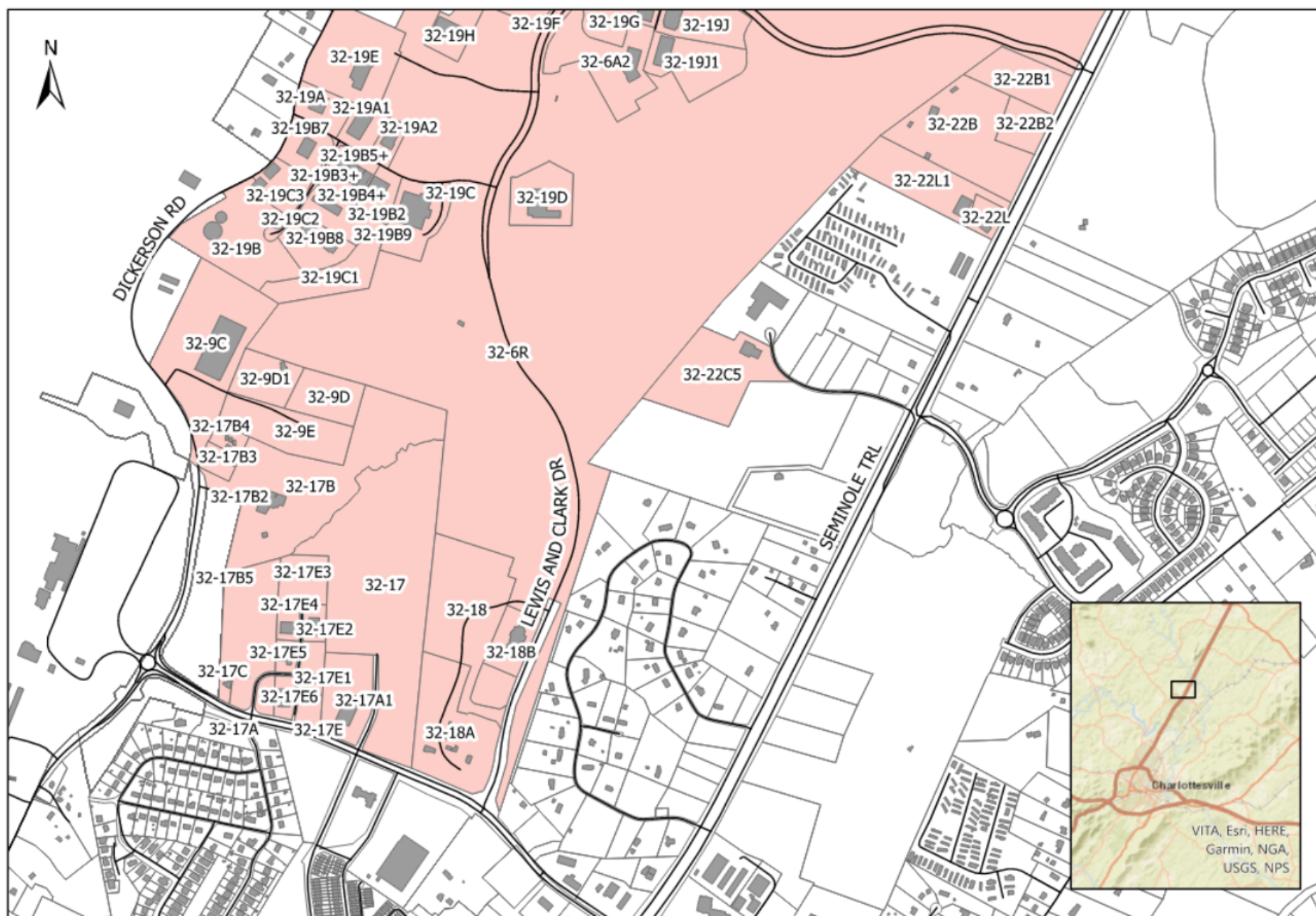| Example	Building SF	Parcel Acreage
Seminole Place	460,000	25
Costco	155,000	14
Northrop Grumman	255,000	19
Walmart	153,000	13
State Farm	400,000	35

Data Center Overlay Districts -
Rivanna Station & Emerson/GE Fanuc

Data Center Overlay District - Airport Industrial Area/North Fork (North)

Map labels:
- DICKERSON RD
- SEMINOLE TRL
- LEWIS AND CLARK DR
- 32-6R
- 32-6A1
- 32-19F1
- 32-19F
- 32-19H
- 32-19G
- 32-19J
- 32-19E
- 32-6A2
- 32-19J1
- 32-19A
- 32-19A1
- 32-19A2
- 32-19B7
- 32-19C3
- 32-19B5+
- 32-19B
- 32-19B3+
- 32-19B4+
- 32-19B8
- 32-19B6+
- 32-19C
- 32-19D
- 32-22B1
- 32-22B
- 32-22B2
- 32-22L1
- 32-22L
- Charlottesville
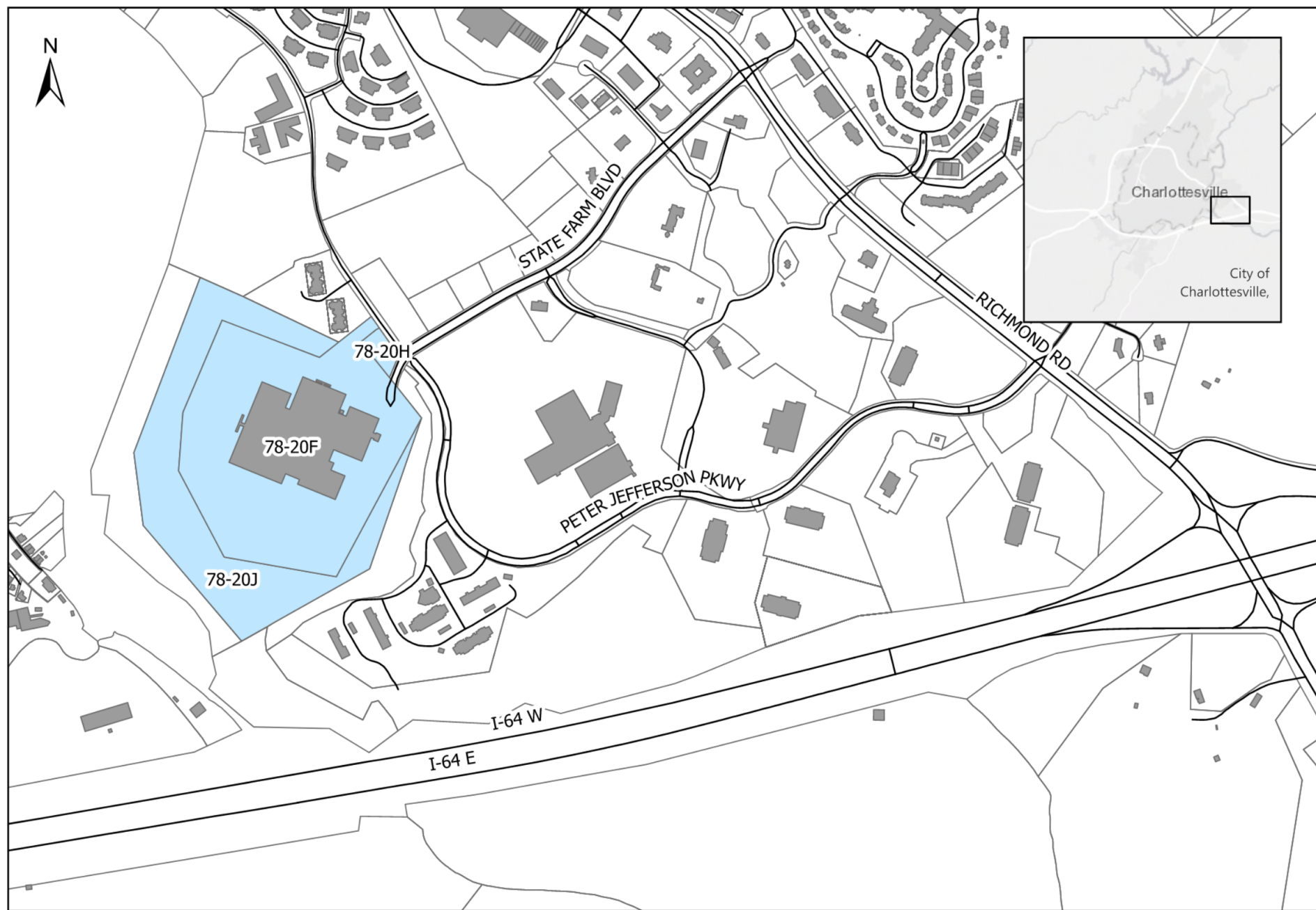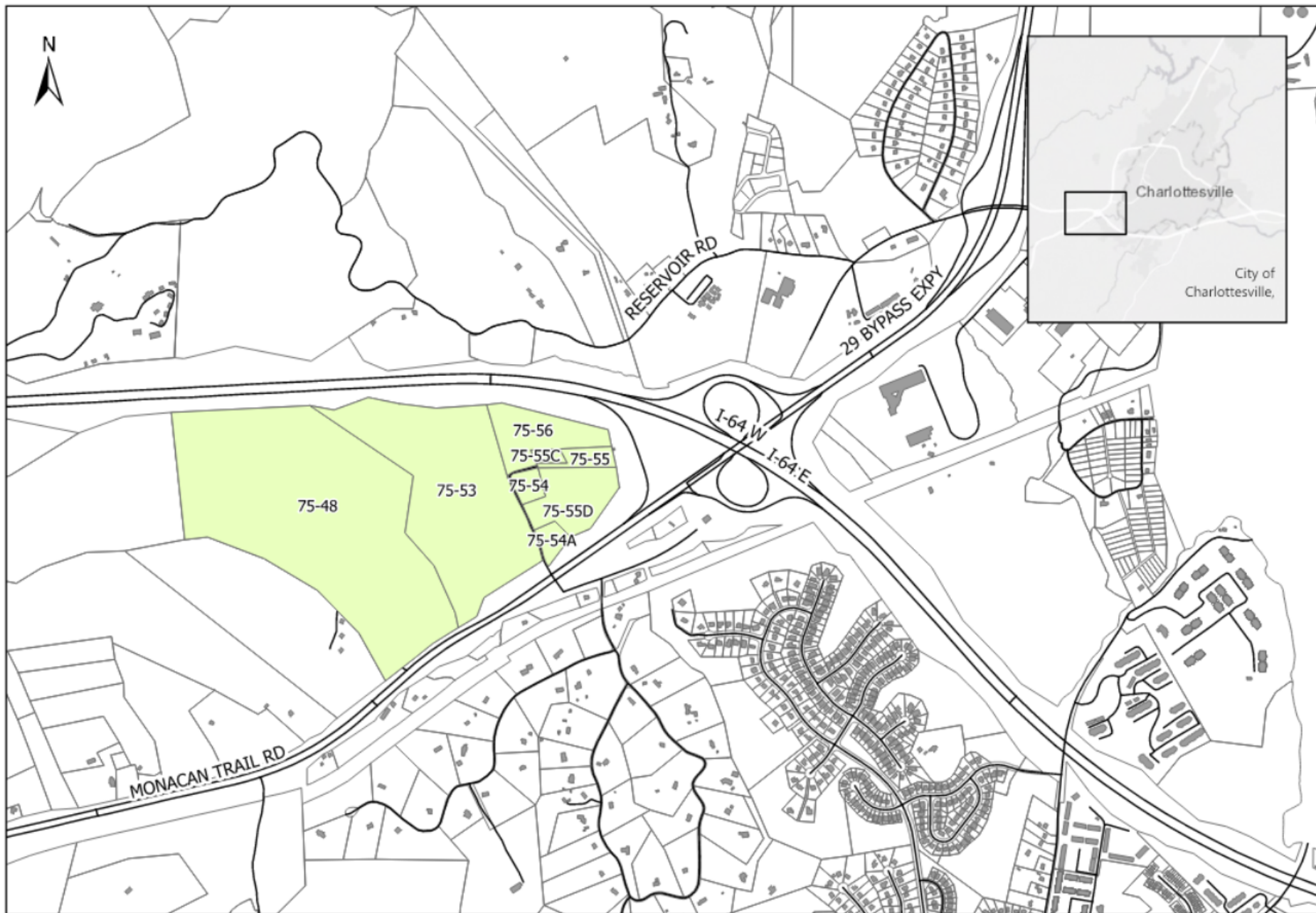- VITA, Esri, HERE, Garmin, NGA, USGS, NPS
- 0   0.3   0.6 Miles

Data Center Overlay District - Airport Industrial Area/North Fork (South)

0   0.3   0.6
Miles

22

Data Center Overlay District - State Farm

78-20H

78-20F

78-20J

STATE FARM BLVD

RICHMOND RD

PETER JEFFERSON PKWY

I-64 W

I-64 E

N

Charlottesville

City of Charlottesville,

0   0.25   0.5
Miles

Data Center Overlay District - I-64/Route 29

Factors to consider when reviewing zoning text and zoning map amendments (18-33.6)

(i) the existing use and character of property;

(ii) the comprehensive plan;

(iii) the suitability of property for various uses;

(iv) the trends of growth or change;

(v) the current and future requirements of the community as to land for various purposes as determined by population and economic studies and other studies;

(vi) the transportation requirements of the community;

(vii) the requirements for airports, housing, schools, parks, playgrounds, recreation areas and other public services;

(viii) the conservation of natural resources;

(ix) the preservation of flood plains;

(x) the protection of life and property from impounding structure failures;

(xi) the preservation of agricultural and forestal land;

(xii) the conservation of properties and their values;

(xiii) the encouragement of the most appropriate use of land throughout the county; and

(xiv) equity.

Revenue Diversification

- Two revenue streams:
  - Real estate tax
  - Business tangible personal property (BTPP)
    - Depreciating assessed value

Purchase Yr of BTPP	Percentage of original cost
1	25.0%
2	22.5%
3	20.0%
4	17.5%
5	15.0%
6	12.5%
7	10.0%

Revenue Diversification Scenarios

District	Size	Real Estate	BTPP	Total
Outside district	40K sq ft	$0.3M	$1.0M	$1.3M
Tier 1	125K sq ft	$0.9M	$3.1M	$4.0M
Tier 2	500K sq ft	$3.5M	$12.5M	$16.0M

- Average Annual Revenue
- 7 Year Average

WAYS OUR COMMUNITY LEARNED ABOUT AND GOT INVOLVED IN

The Data Center Ordinance Update

5 Local Media Stories

4 e-Newsletters

14k+ e-Newsletter opens

Organic Social Media Posts
Reach **6k+**
Clicks **4**

Paid Social Media Ads
Reach **8k+**
Clicks **270**

1.4k+ PEOPLE GOT INVOLVED

Visited the Project Website
Submitted a Question
Posted a Comment
Downloaded a Document
Completed Feedback Form
Emailed Comments
Attended In-Person Event

HOW THIS PROJECT STACKS UP
*Top 5 Engage Albemarle Projects
(1/28/25-7/28/25)*

	Unique Visitors	Contributors
AC44	2,054	5%
Three Notched Trail (3NT) Shared-Use Path Master Plan	2,022	13%
Economic Development Strategic Plan	1,663	12%
Data Center Regulations	1,364	7%
Resilient Together	887	3%

Public Comments

- Climate Impact
- Water Impact
- Maintain current size requirements
- Prohibit
- Cost and benefits
- Noise and air pollution

Staff is requesting guidance from the Board of Supervisors on the following questions:

1. Does the Board support the concept of the proposed regulations?

2. Does the Board support the boundaries of the proposed overlay districts?

3. Does the Board support tiered districts?

4. If the Board supports consideration of tiered districts how should each area be designated?

Next Steps

- Staff will follow the Board's direction and prepare the necessary documents.

- Staff will further engage the public

- Planning Commission public hearing

- Board of Supervisors public hearing