

# Targeting for Need:

An Analysis of Food Deserts in Alachua County

TEAM 1: Alicia M. Levi W. Robert L. Liam C.



# Problem Analysis



- Certain residents within Alachua County may not have the access to healthy food sources needed for a healthy lifestyle.
  
- Does Alachua County contain any Food Deserts?
  - ▣ -Food Desert: any area in the industrialized world where healthy, affordable food is difficult to obtain.
  
- Where are the food deserts in Alachua County, and where do they occur in relation to individuals in need of healthy food sources. How do we classify individuals “in need”?

# Goals and Targets



- Overall Goal: Target groups in Alachua County that are in need of healthy food sources, and further analyze these groups and their locations (utilizing GIS principles and data) in order to suggest the most ideal locations for healthy food establishments.
  - ▣ Step 1- Define the groups in need of healthy food
  - ▣ Step 2- Locate these groups in a geo-referenced manner
  - ▣ Step 3- Analyze locations based on GIS data
  - ▣ Step 4- Interpret and select most desirable/efficient locations

Analysis focused towards AREAS OF NEED

## □ Methodology (Overview)

- ▣ Locate food deserts utilizing locations devoid of healthy food sources
- ▣ Reference food deserts with locations of lower socioeconomic neighborhoods.
- ▣ Compare the data above with data gained from the analysis of child density, and the propensity of reduced lunch program usage.
- ▣ Analyze the (now narrowed down) block selections via the tax base records to determine the areas most in need.

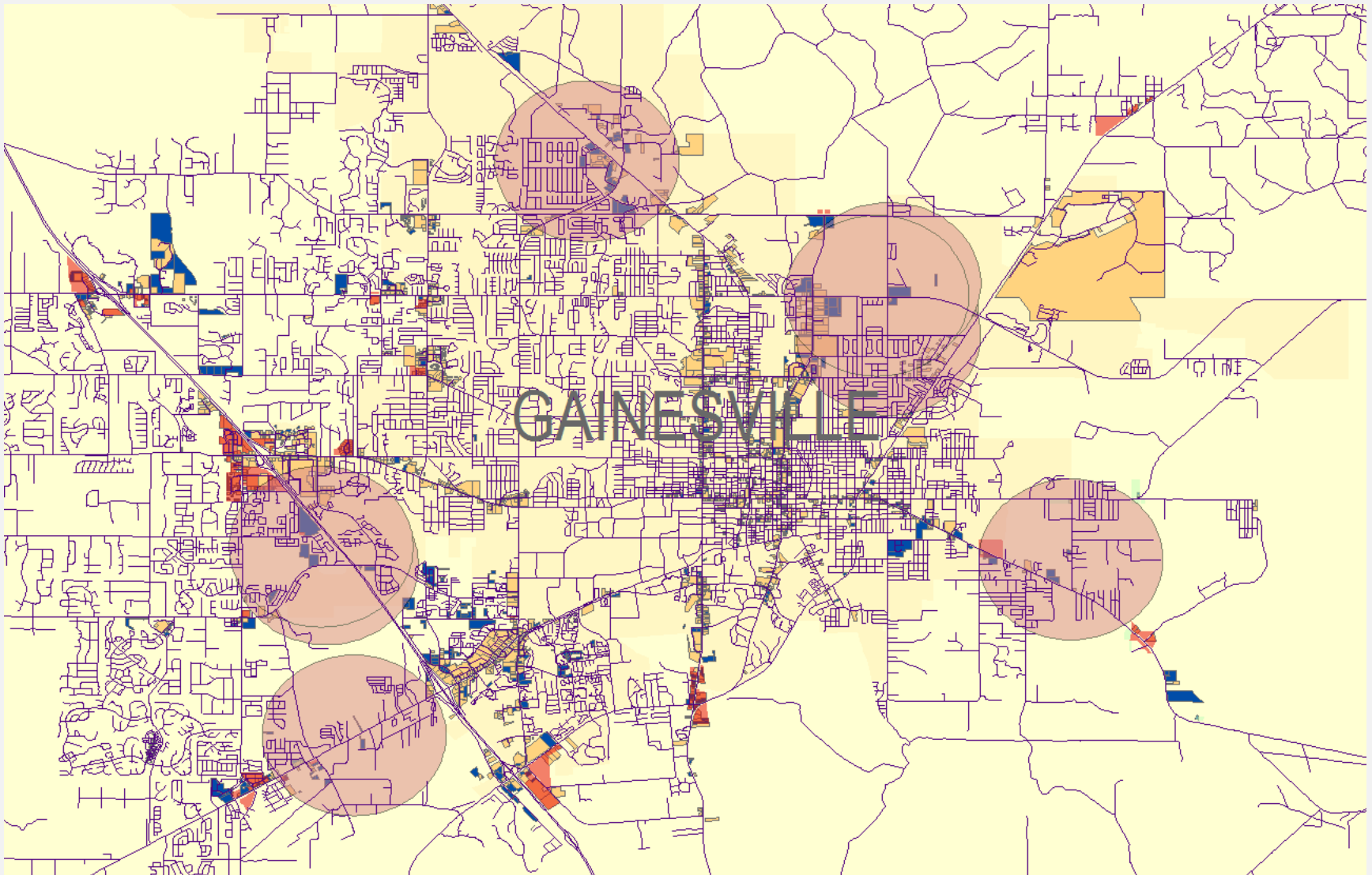
# Process & Diagrams



# Assisted/Subsidized Housing units and Food Deserts

- For a family to qualify for assisted housing in Alachua County the family must have low household income and low level of assets.
- The elderly and disabled also qualify.
- A one mile buffer around these sites is used as those that meet the above qualifications for assisted housing often lack access to a vehicle (low-income) or would have trouble walking farther than one mile for groceries (elderly and disabled).
- Buffer zones without a full-service grocery were kept, those with a full-service grocery were discarded. This left five areas in the county to look at.
- Zoning and tax parcel information is available indicating current and future commercial land use sites. Planned zoning for commercial is in red. Currently occupied commercial is in orange and vacant commercial sites are in purple.

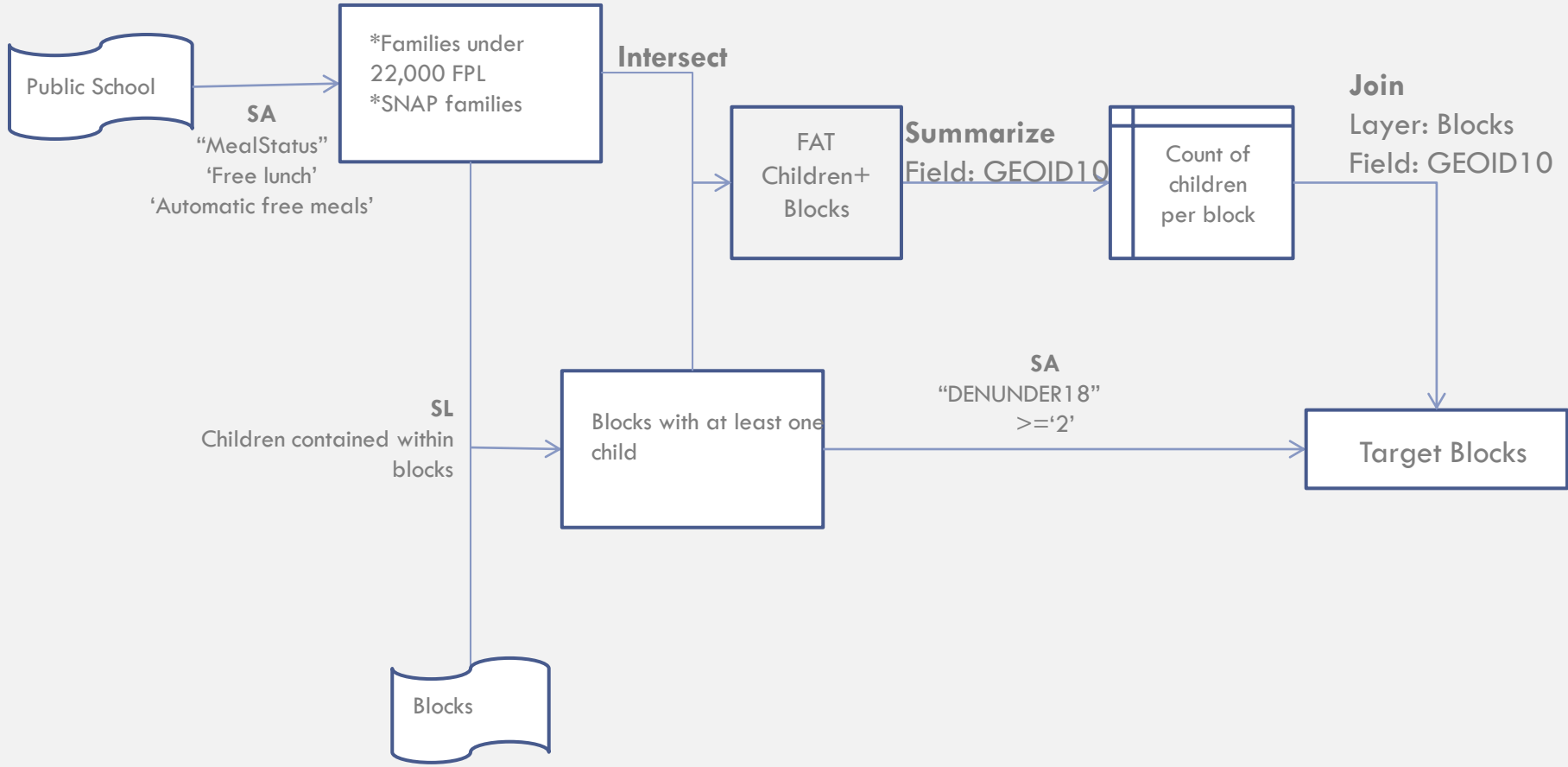
## Buffers



-Overlay of assisted housing buffers with current zoning and planned zoning

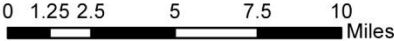
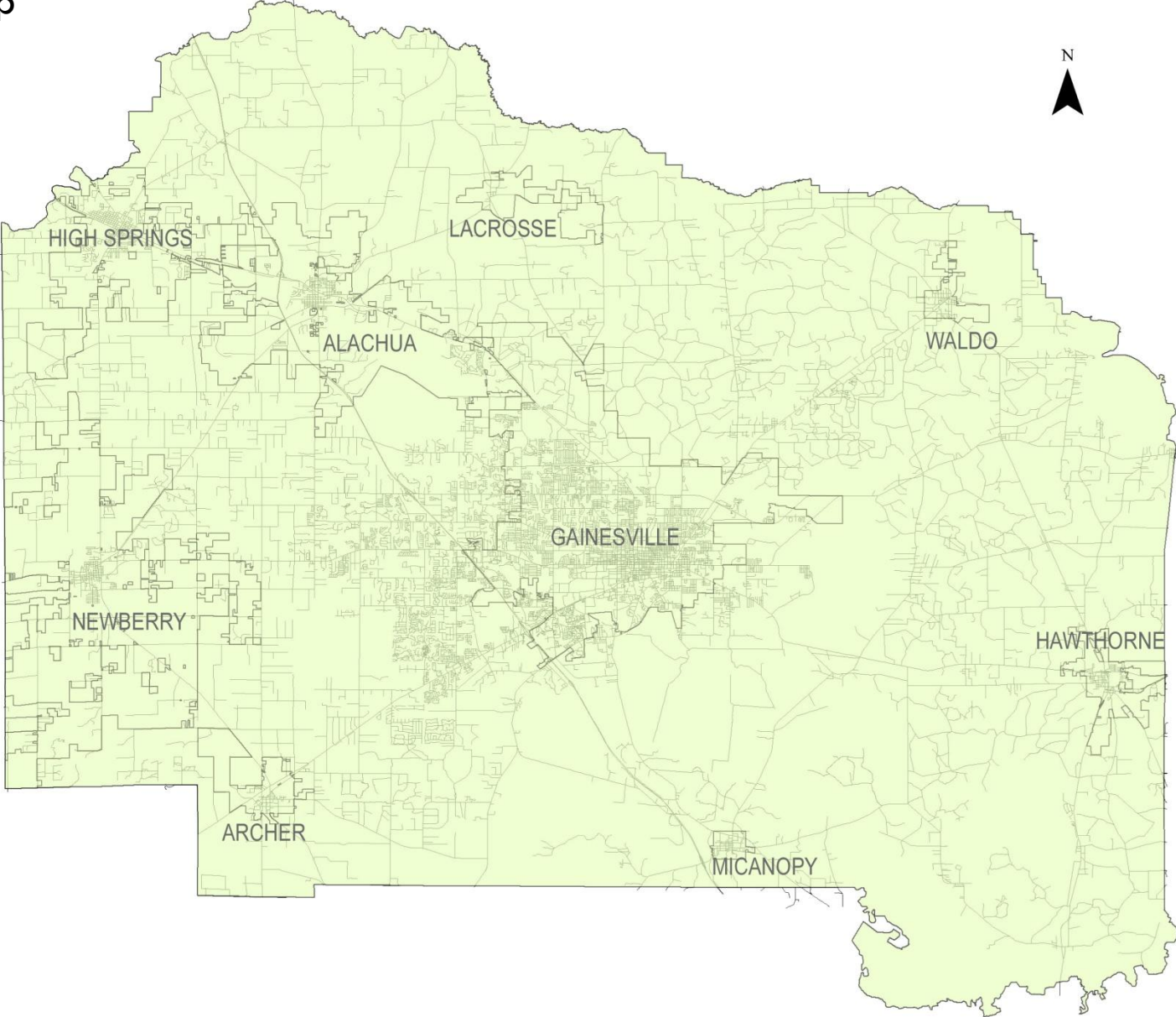


# Figure 1. Methodology using GIS flow charts. Analysis of population.

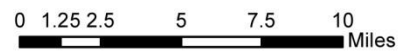
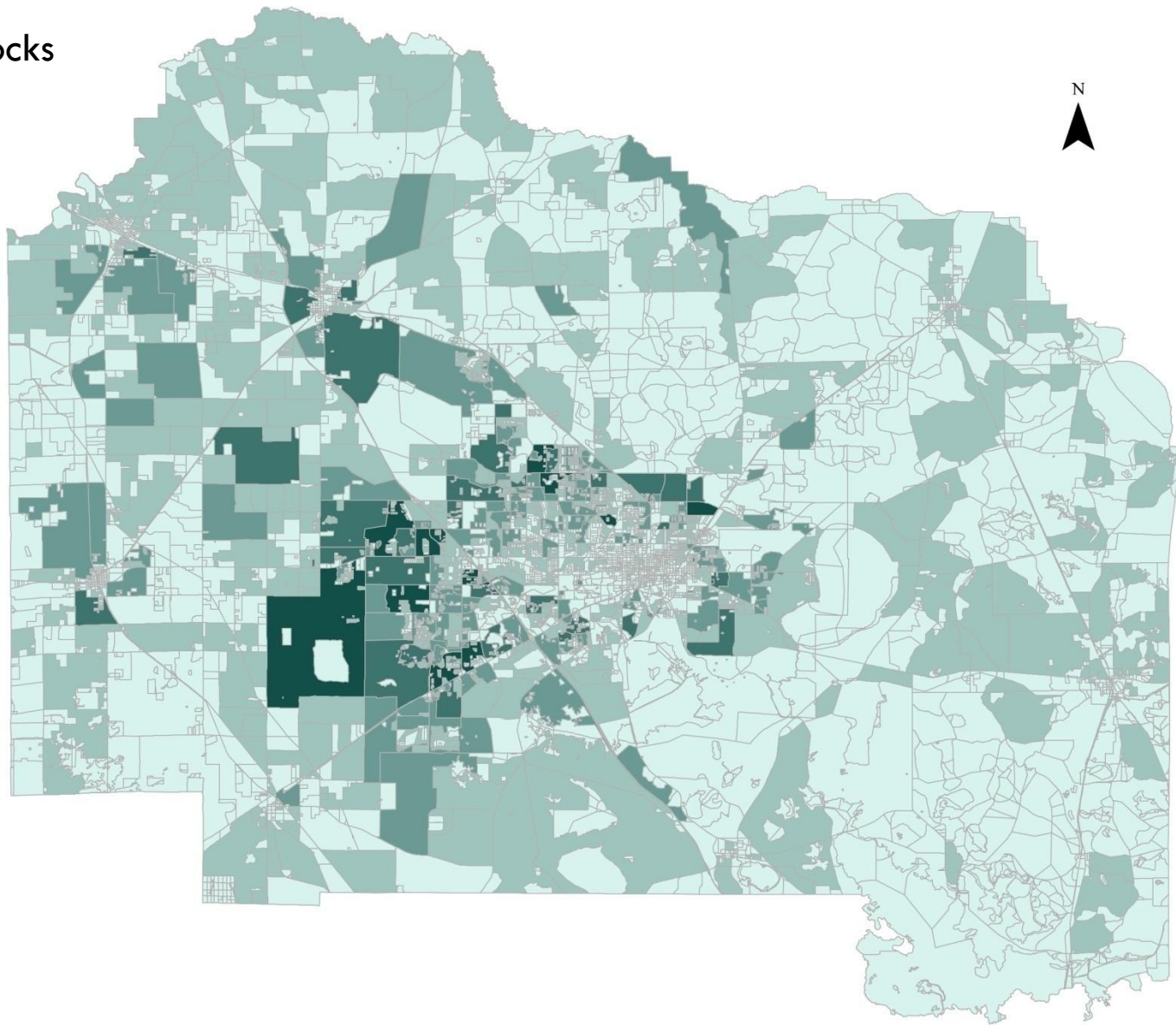


Key: SA: selection by attribute. SL: selection by location. “”: variable. “”: criteria

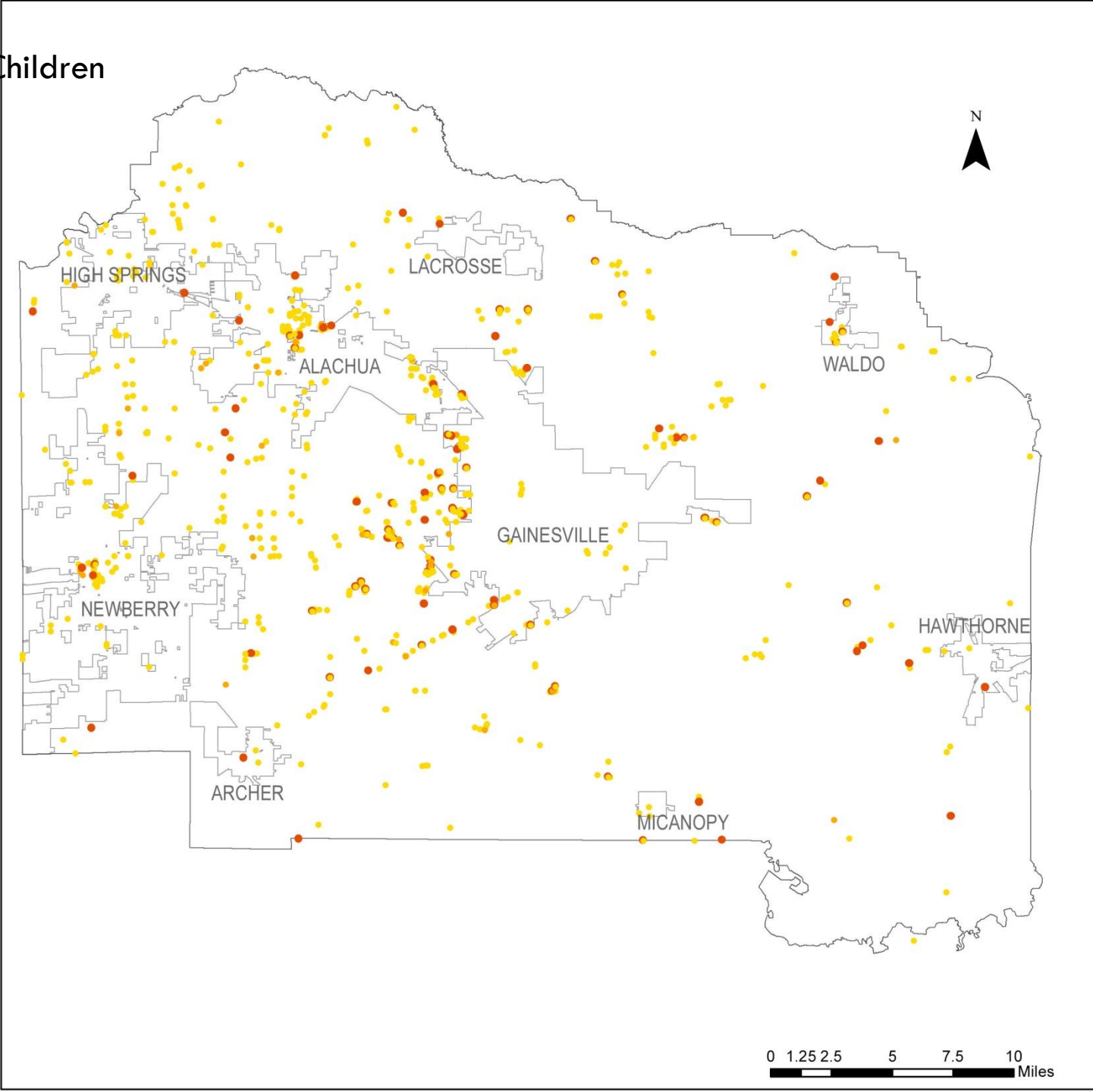
# County Map



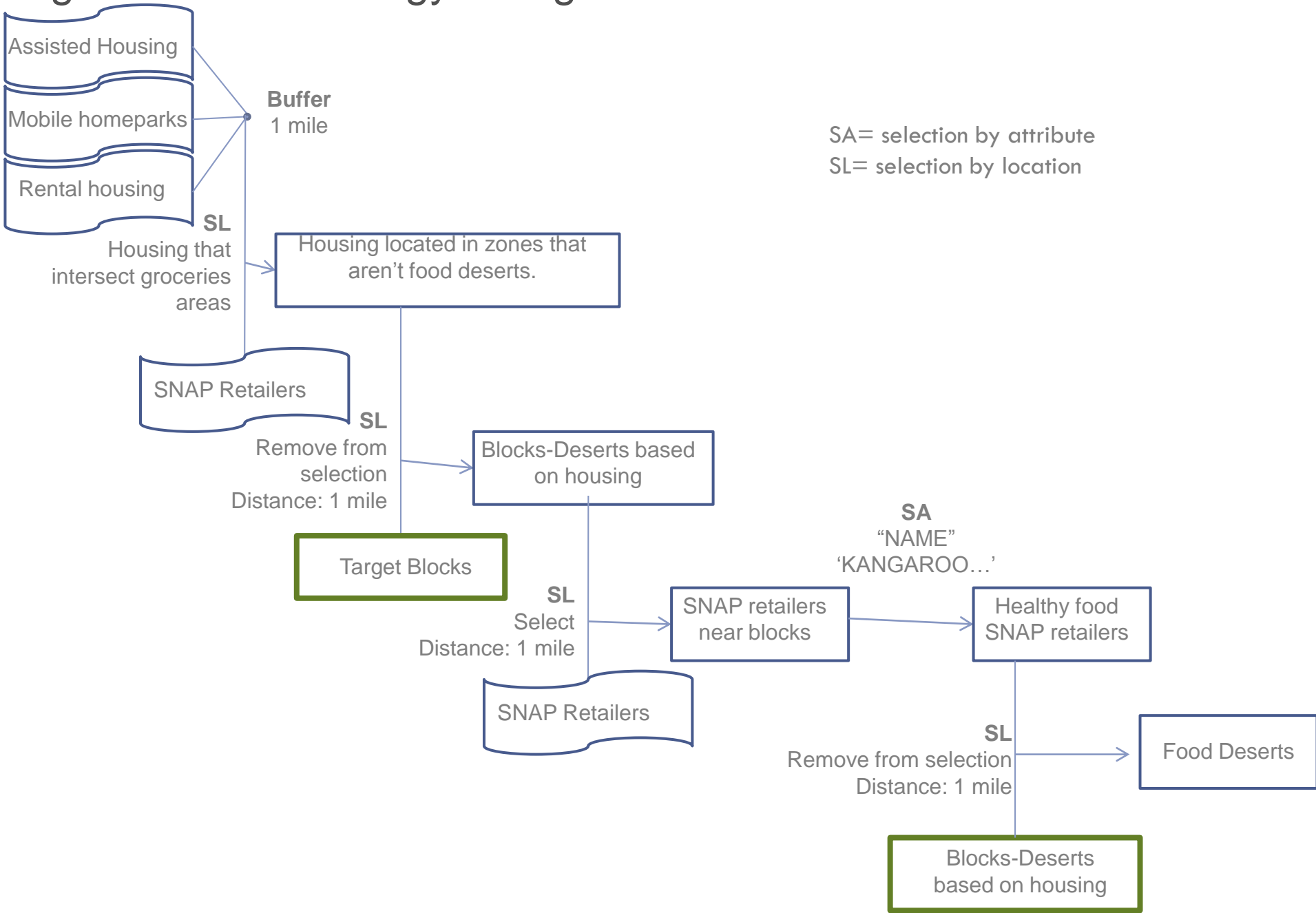
# County Blocks



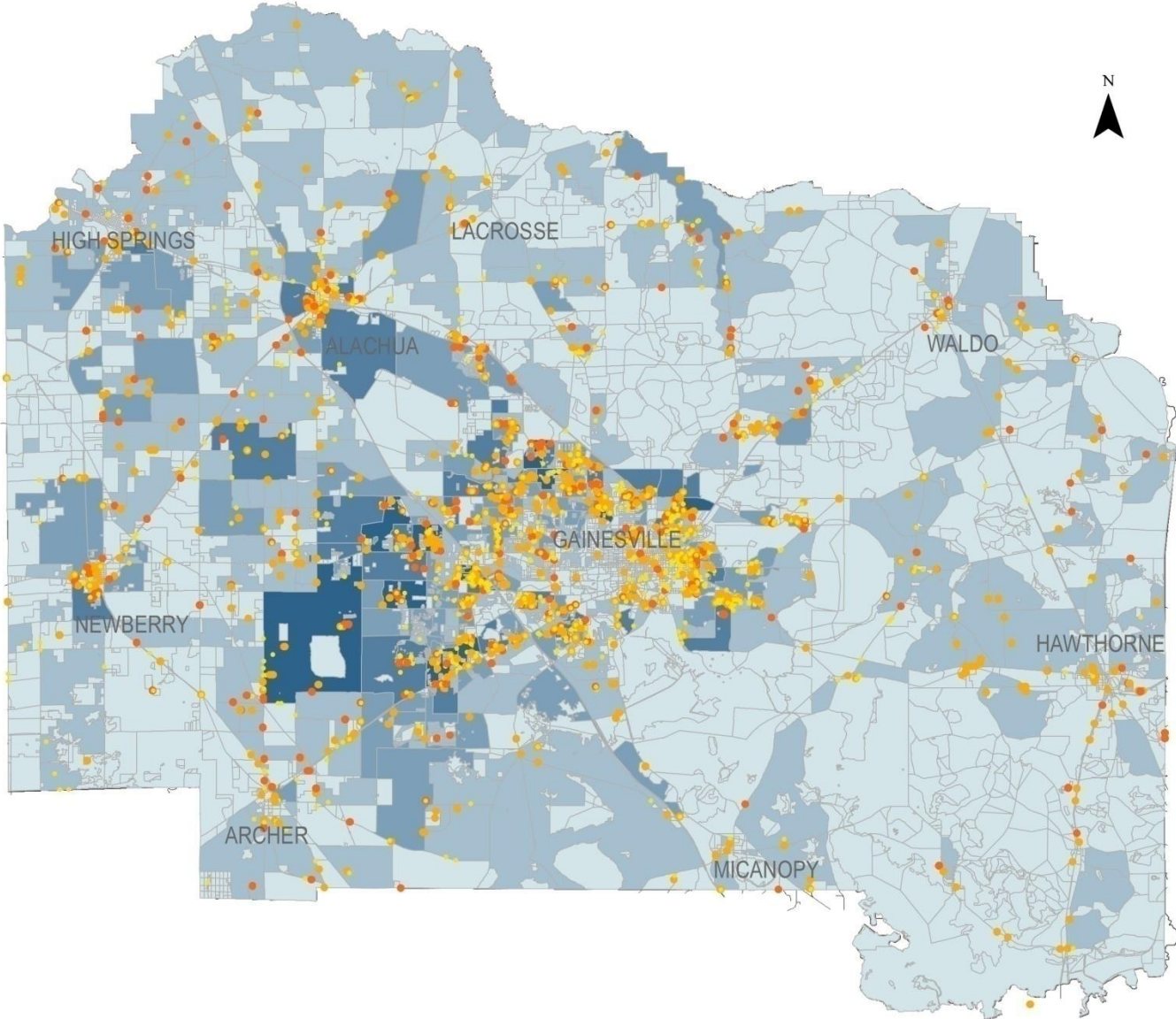
# Alachua Children



# Figure 2. Methodology Using GIS Flow Charts. Food Deserts



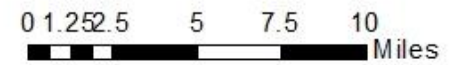
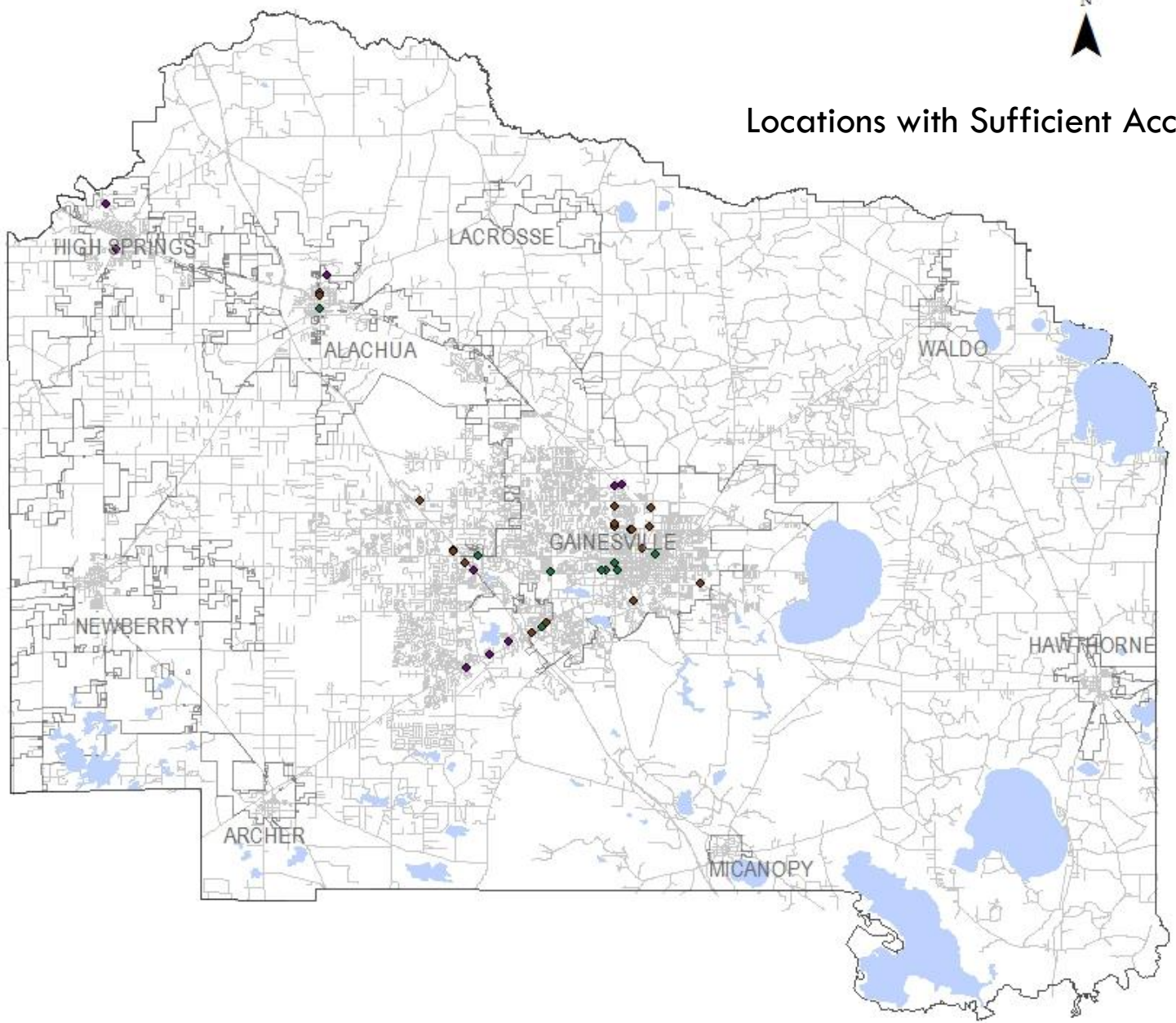
# Children over Blockgroup



0 1.25 2.5 5 7.5 10 Miles



# Locations with Sufficient Access



# Density by Blockgroup

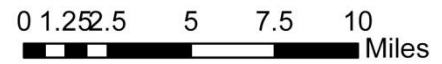
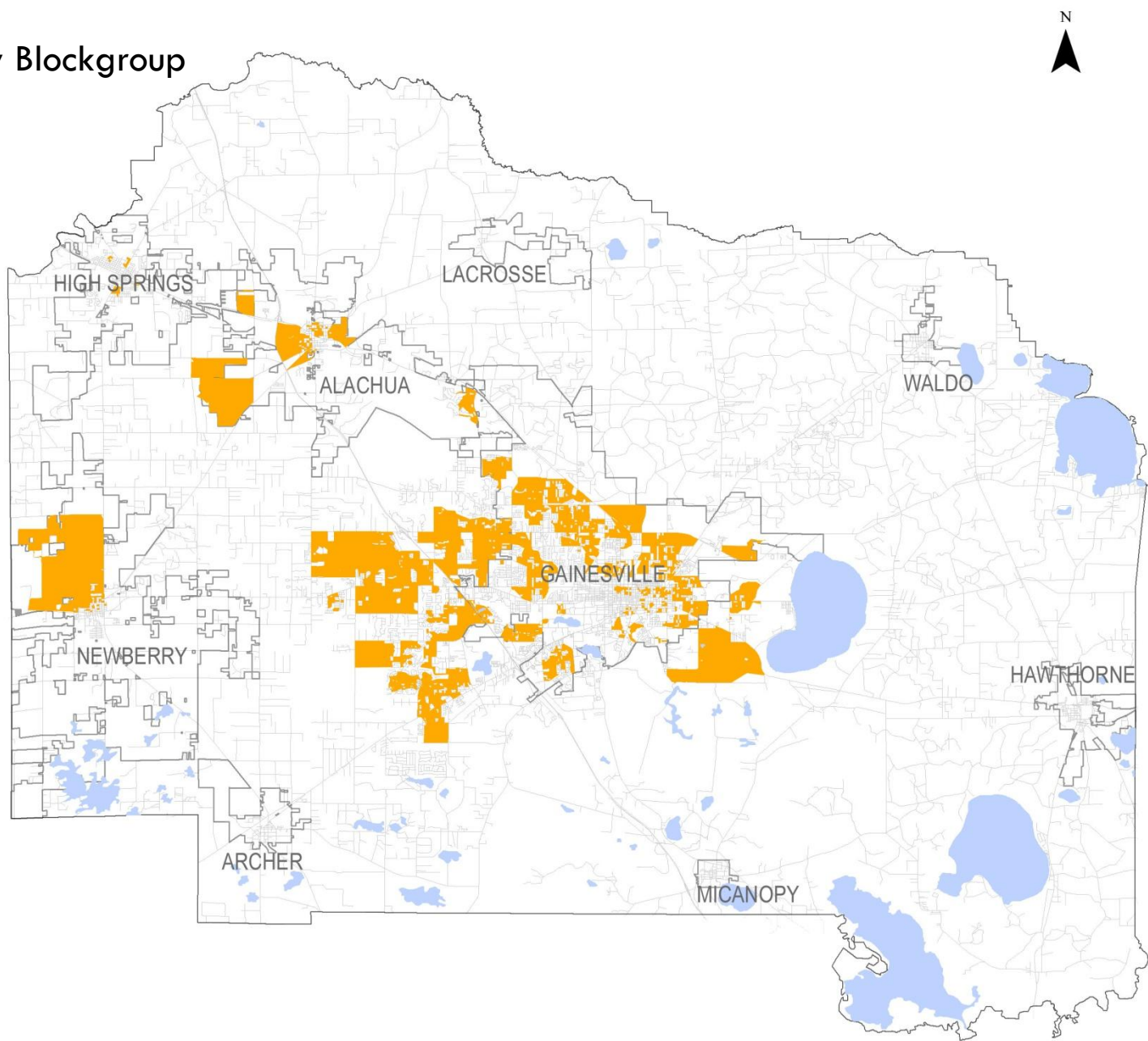




Figure 3. Methodology Using GIS Flow Charts. Critical Population in Food Deserts

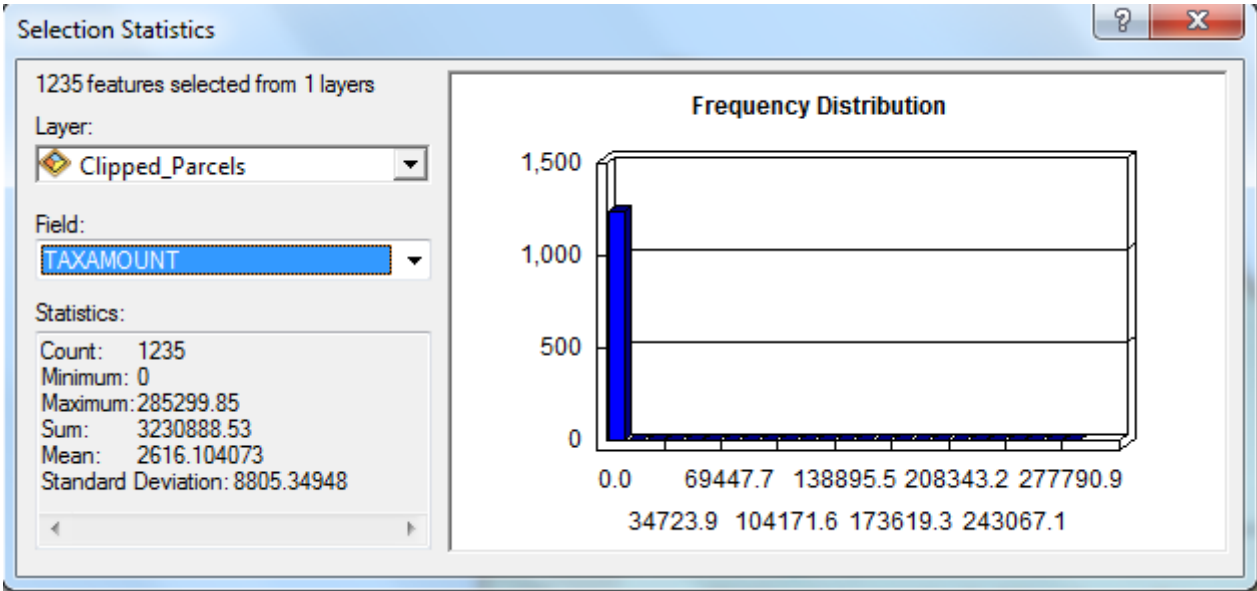
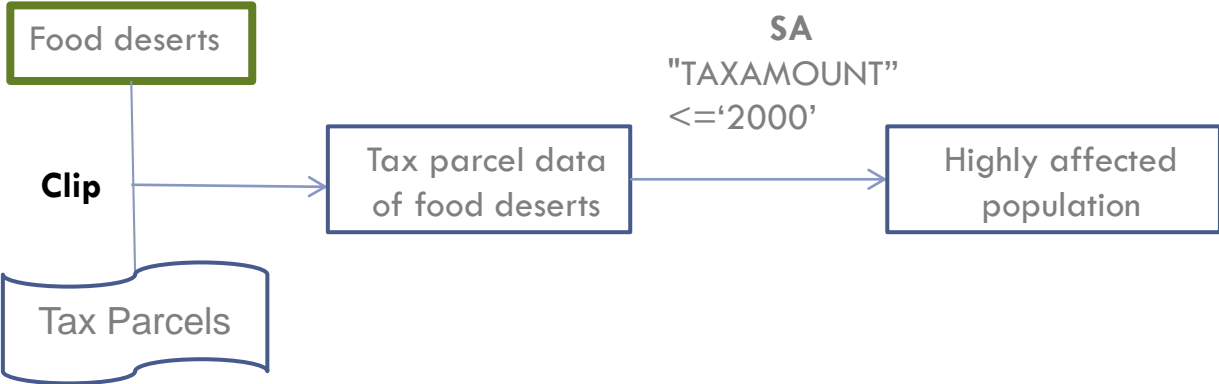
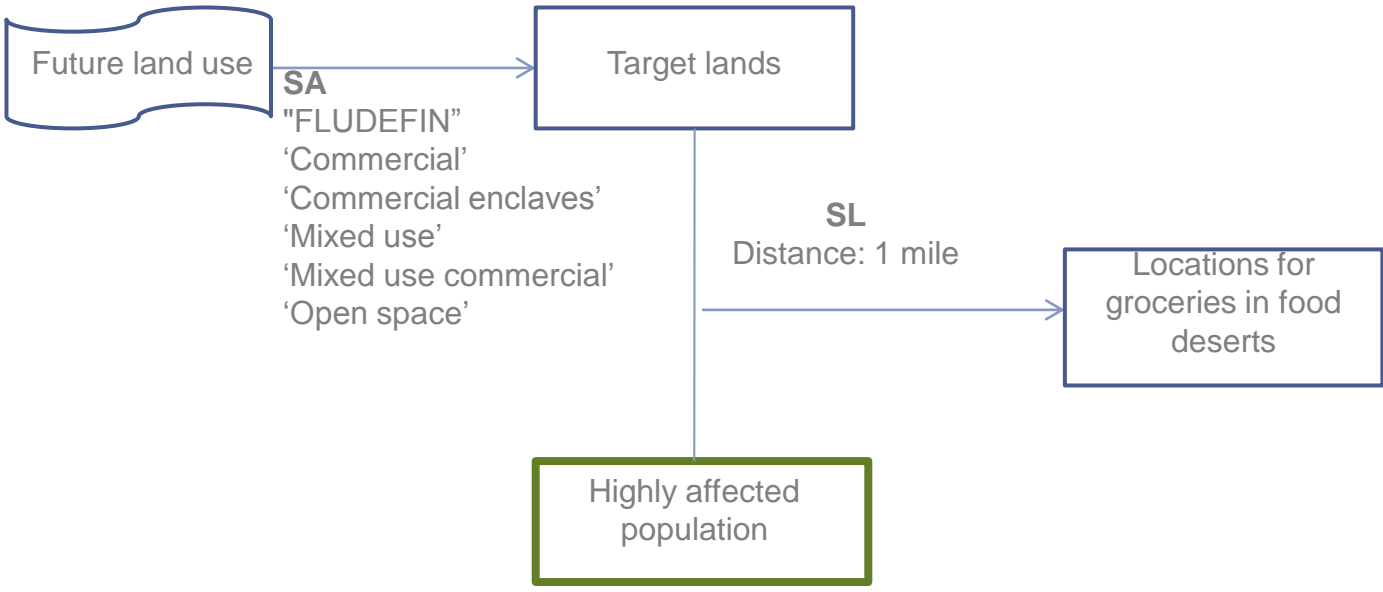
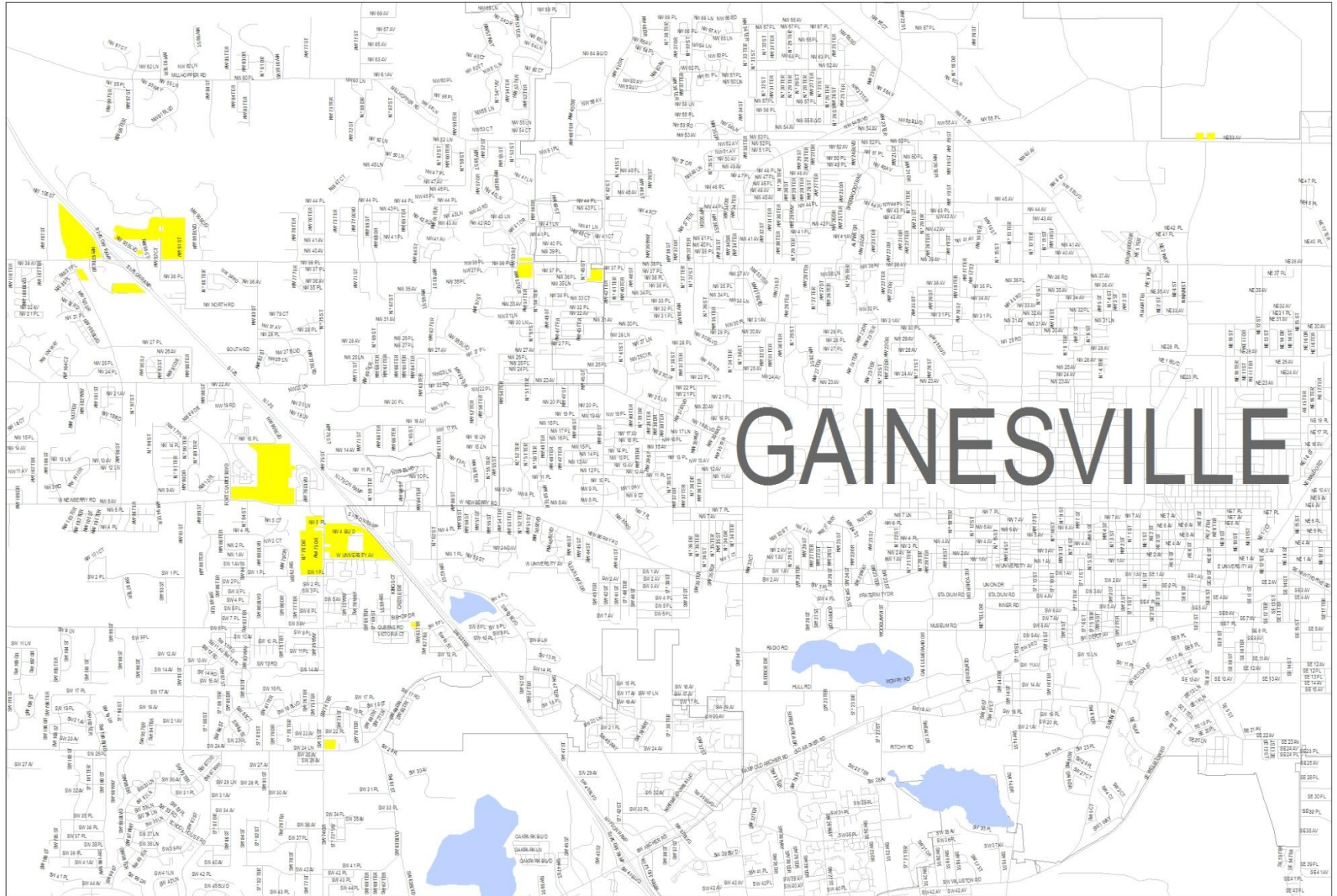


Figure 4. Methodology Using GIS Flow Charts. Areas Available for Construction in Food Deserts.



# Final Selections

36 blocks in approx. 5 localized areas



QUESTIONS?

