



BALTIMORE COUNTY

Residential
Development Capacity
Study Presentation

April 26, 2023



Introduction

The Baltimore County Residential Development Capacity Study determines the potential number and location of additional residential units that could be constructed under existing regulations.



New development on vacant, residentially-zoned parcels under conventional review processes (**vacant parcels**).

New development on previously developed, residentially zoned parcels that have additional potential (**underdeveloped parcels**).



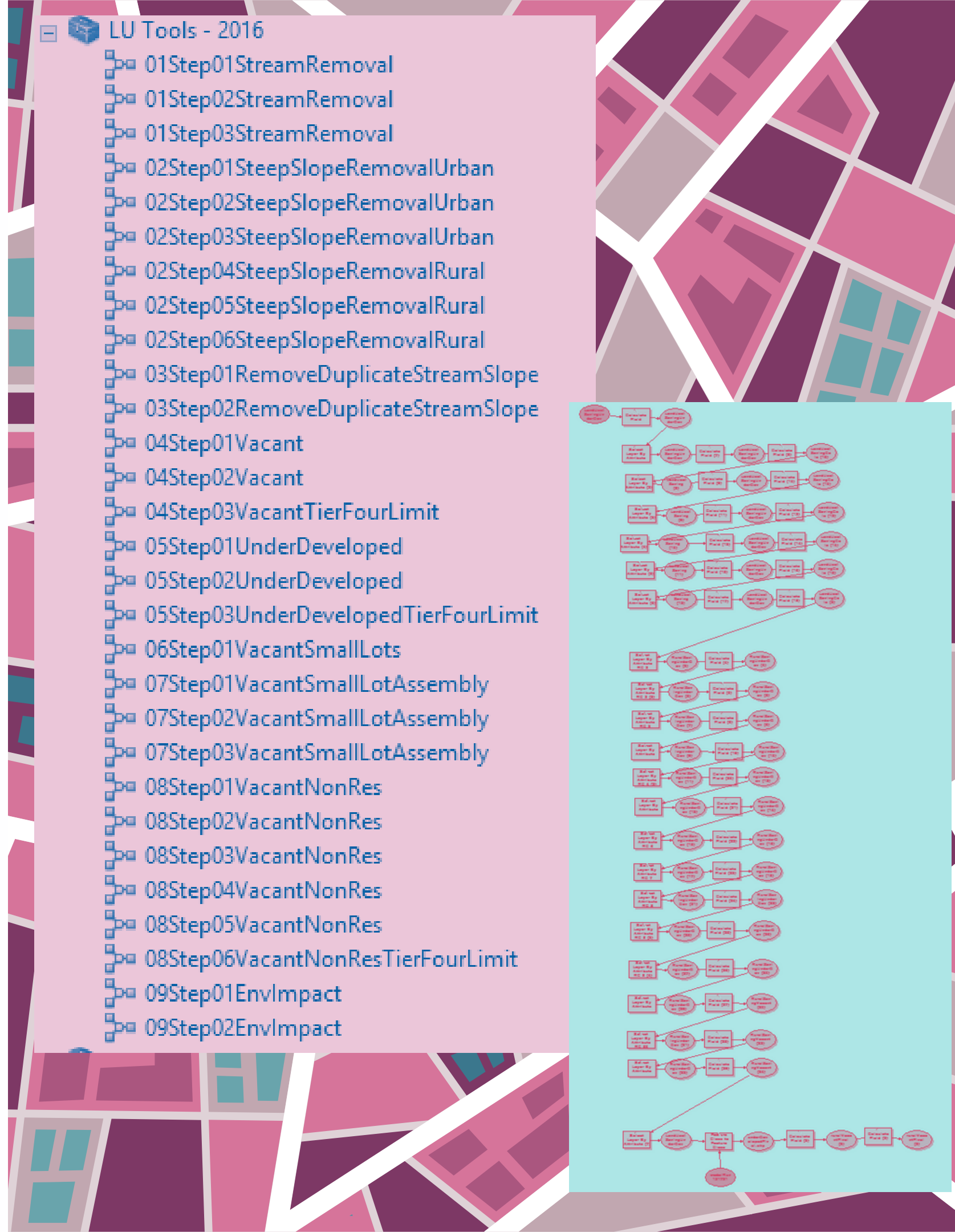
Model Builder

Step by Step model was created using ArcGIS Model Builder.

This allows easy interchanging of data and rerunning of model so the figures can be easily updated

This allows public scrutiny to ensure outcome are reasonable

We are looking for updated platforms to simplify the process and add additional analysis capabilities



In this example of an older subdivision zoned DR 5.5, the minimum lot area needed to accommodate one unit is 7920 SF. Applying a zoning density factor to the vacant parcels yields 7 additional lots.

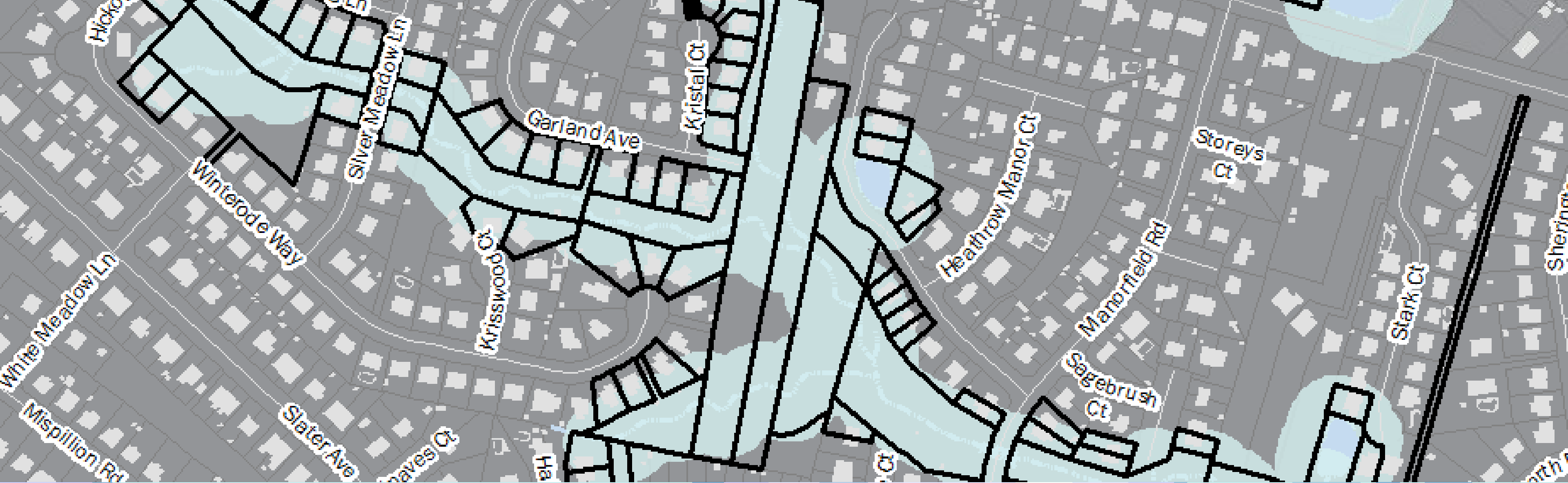


Zoning Regulations

Maximum capacity build out based on what's allowed by right through zoning

Historical Buildout Density

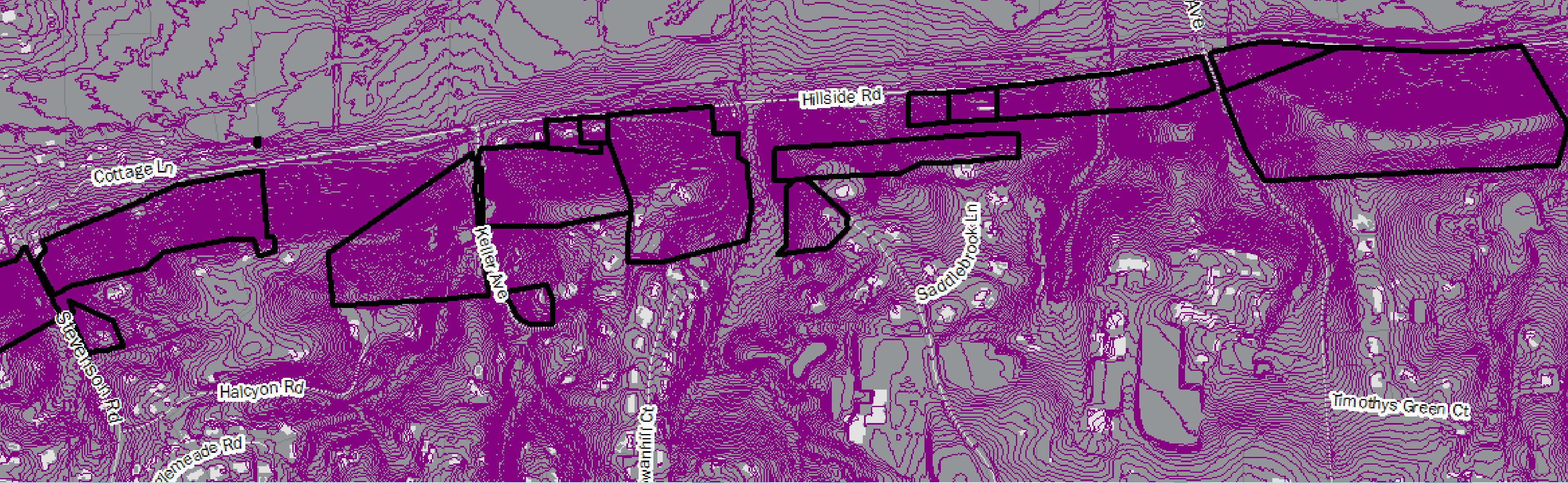
A more moderate capacity build out number is calculated based on historic buildout patterns.



Environmental Factors

Stream Buffers

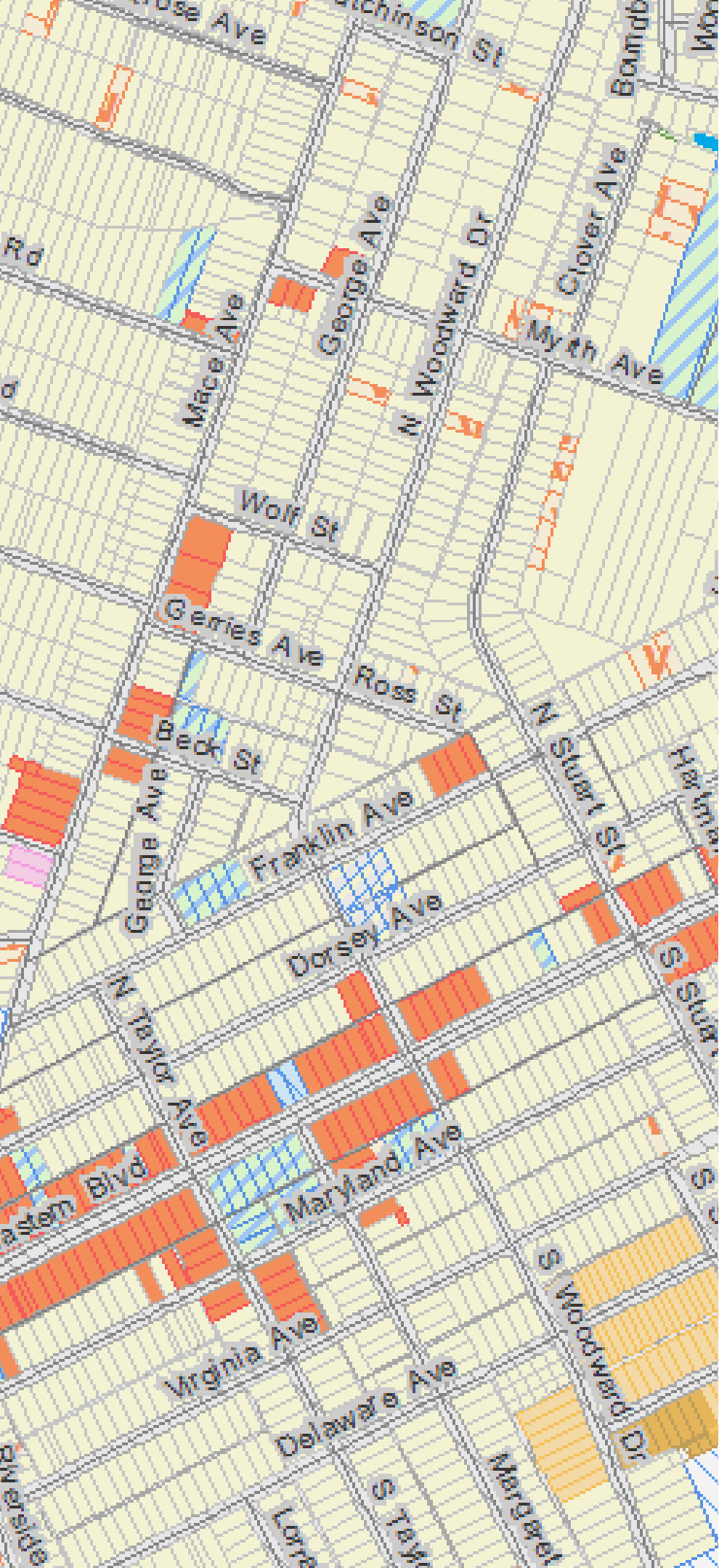
If a parcel is impacted by a 100-foot stream buffer in the amount of 50% or greater parcel coverage, its potential unit count was removed from the total count.



Environmental Factors

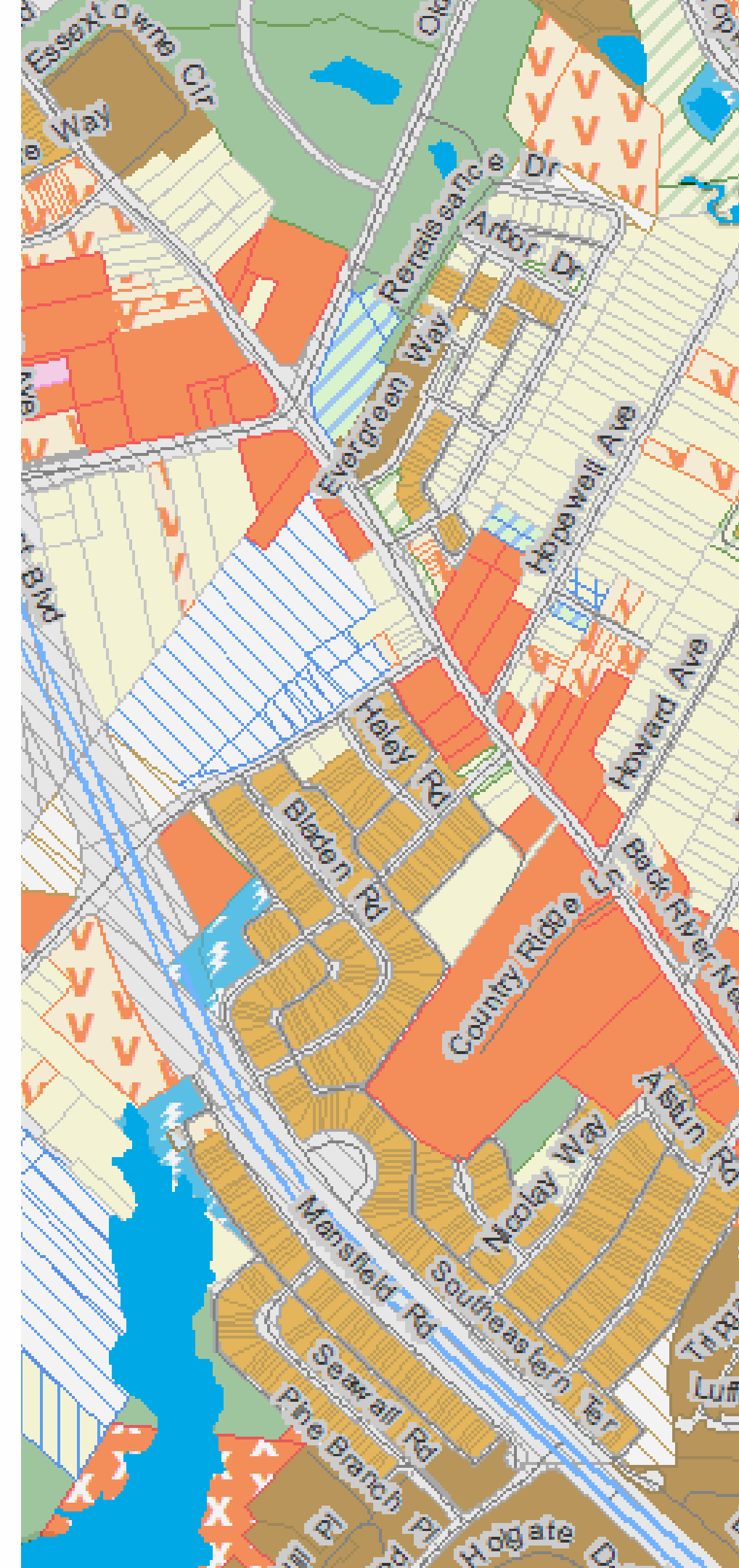
Steep Slopes

If a parcel is impacted by steep slopes in the amount of 50% or greater parcel coverage, its potential unit count was removed from the total count.



RESIDENTIAL CAPACITY MODEL STEP BY STEP

- STEP I. CODE EXISTING LAND USE



	SFD		Privately Owned Golf Course
	SFSD		Reservoir Property
	SFA		County LOS and DEPRM Land
	Multifamily		HOA/COA/Developer
	Multi SFD		Other Private Open Space
	Commercial		County Park
	Office		State Park
	Industrial		Other Public Park
	Mixed Office/Retail		Other Gov't Open Space
	Mixed Residential/Office/Retail		Agriculture
	Mixed Office/Industrial		Permanent Preservation
	Mixed Office/Industrial/Retail		Limited Preservation (Do Not Use)
	Places of Worship		Rural Residential SFD
	Hospital		Airport
	College		Roads
	Private School		Rail
	Public School or School Site		Park and Ride
	Cemetery without Place of Worship		Electric/Gas/Telecom Utilities
	Police		Storm Drainage
	Fire		Water and Sewer Utilities
	Library		Landfill
	Assisted Living Facility		Vacant
	Misc. Government - Public		Unbuildable/Environmentally Constrained
	Misc. Institution - Private		Non-County Parcel
	County Senior Center		Water
	Publicly Owned Golf Course		Further Review

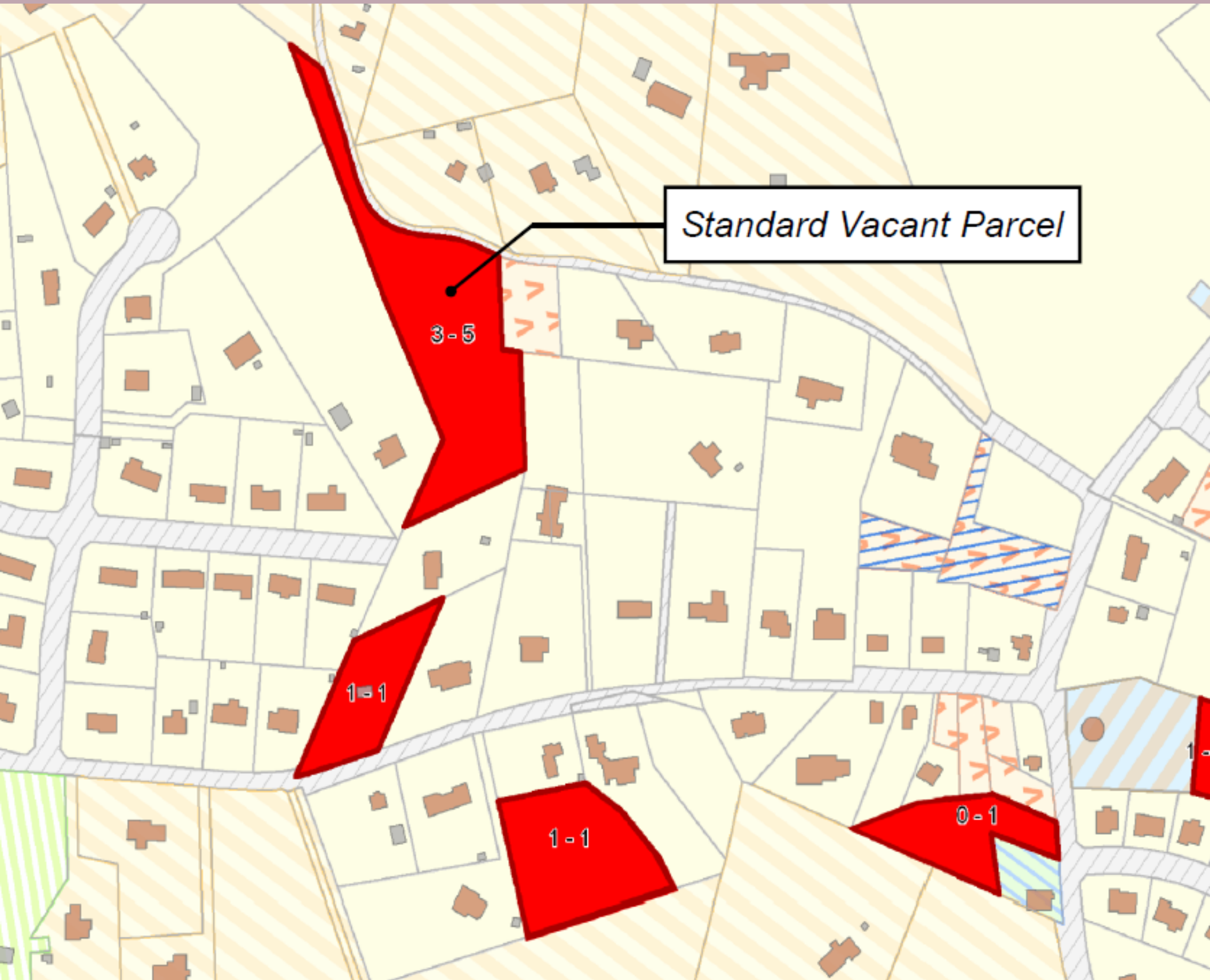
Land Use Types

Existing land use was coded for each parcel of land based on data on the GIS and the needs of the capacity model

Example of Vacant Parcel

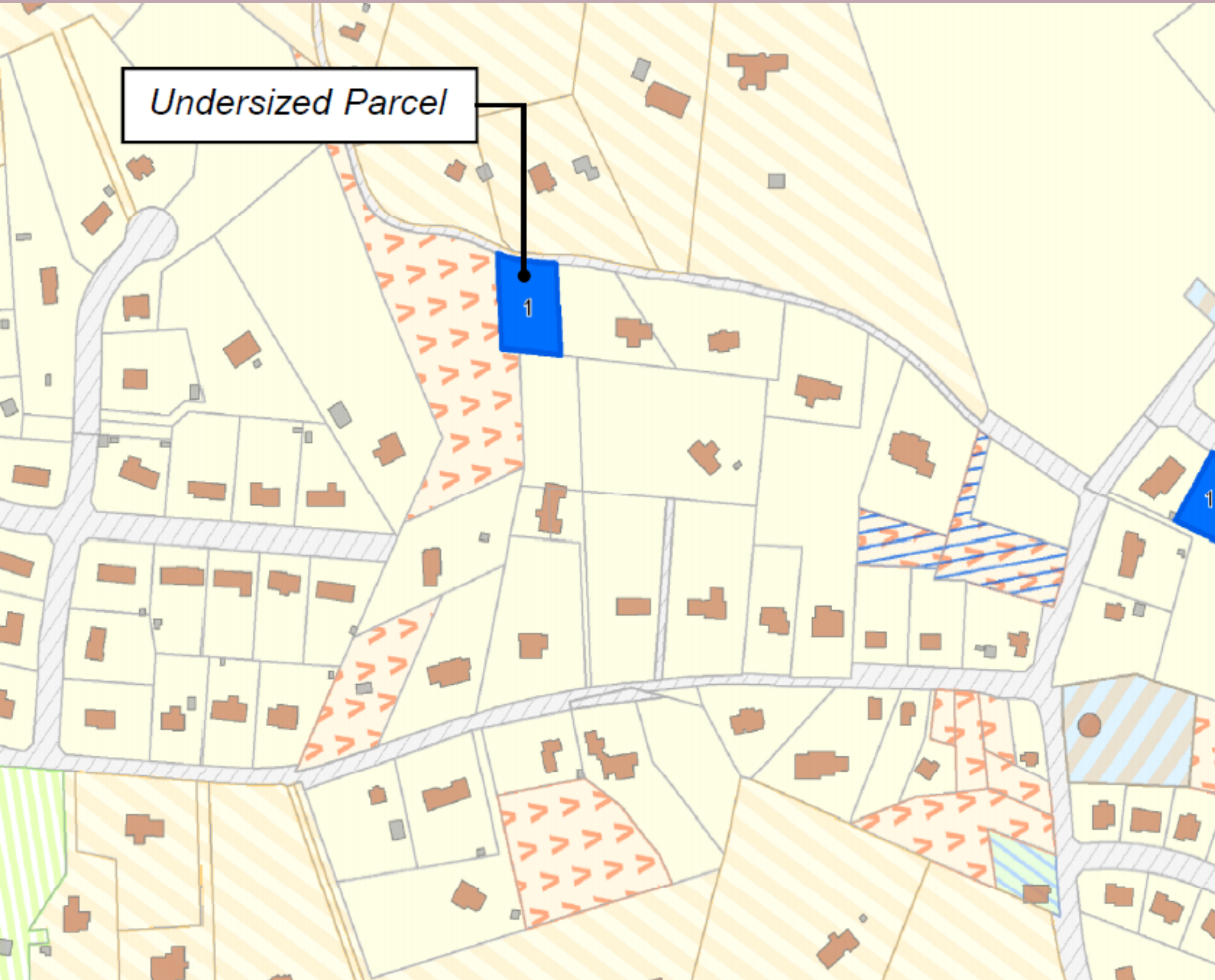
Parcel of land that does not have a structure built





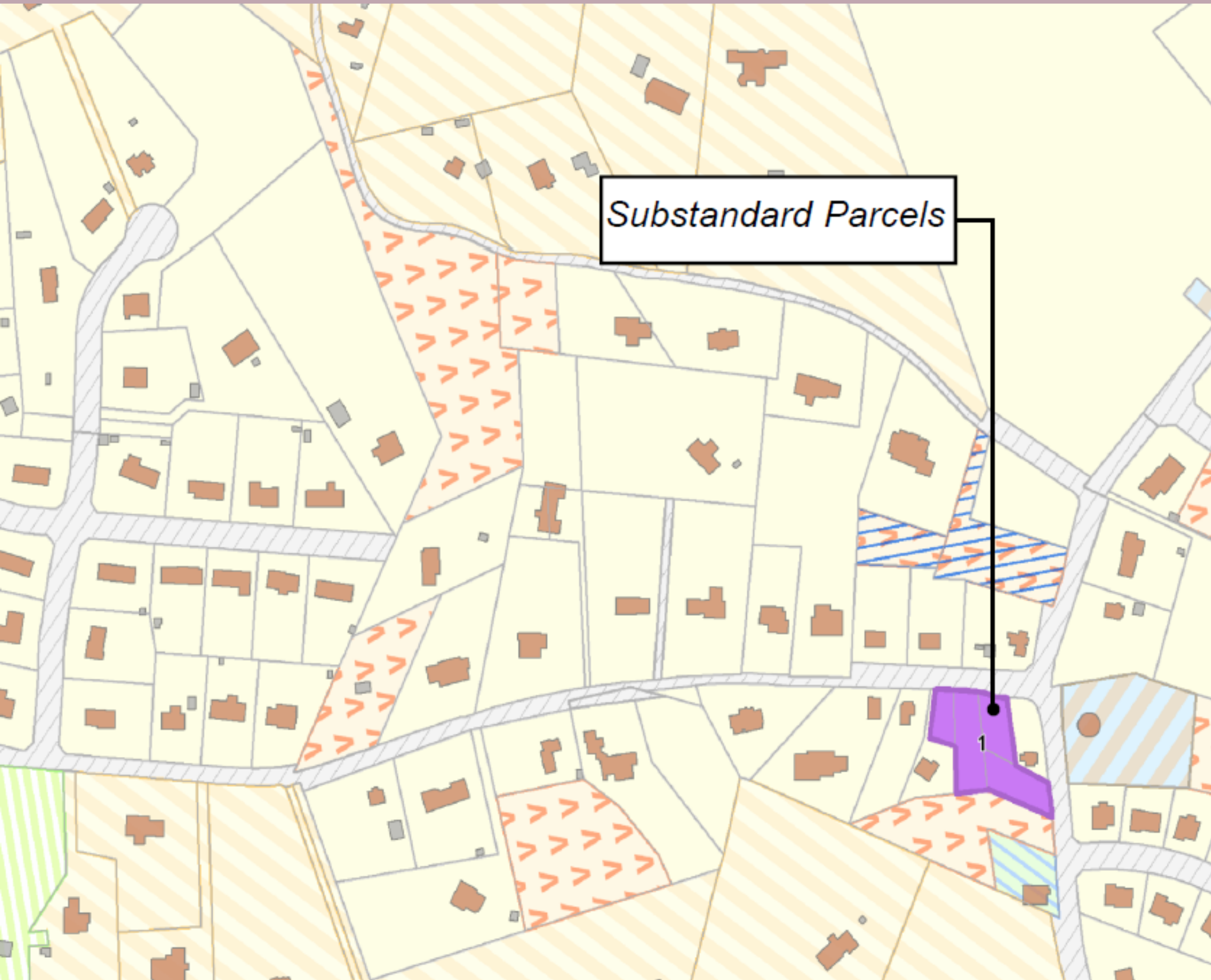
Model Process

STEP 2: IDENTIFY AND CALCULATE
YIELD FOR STANDARD VACANT
LOTS



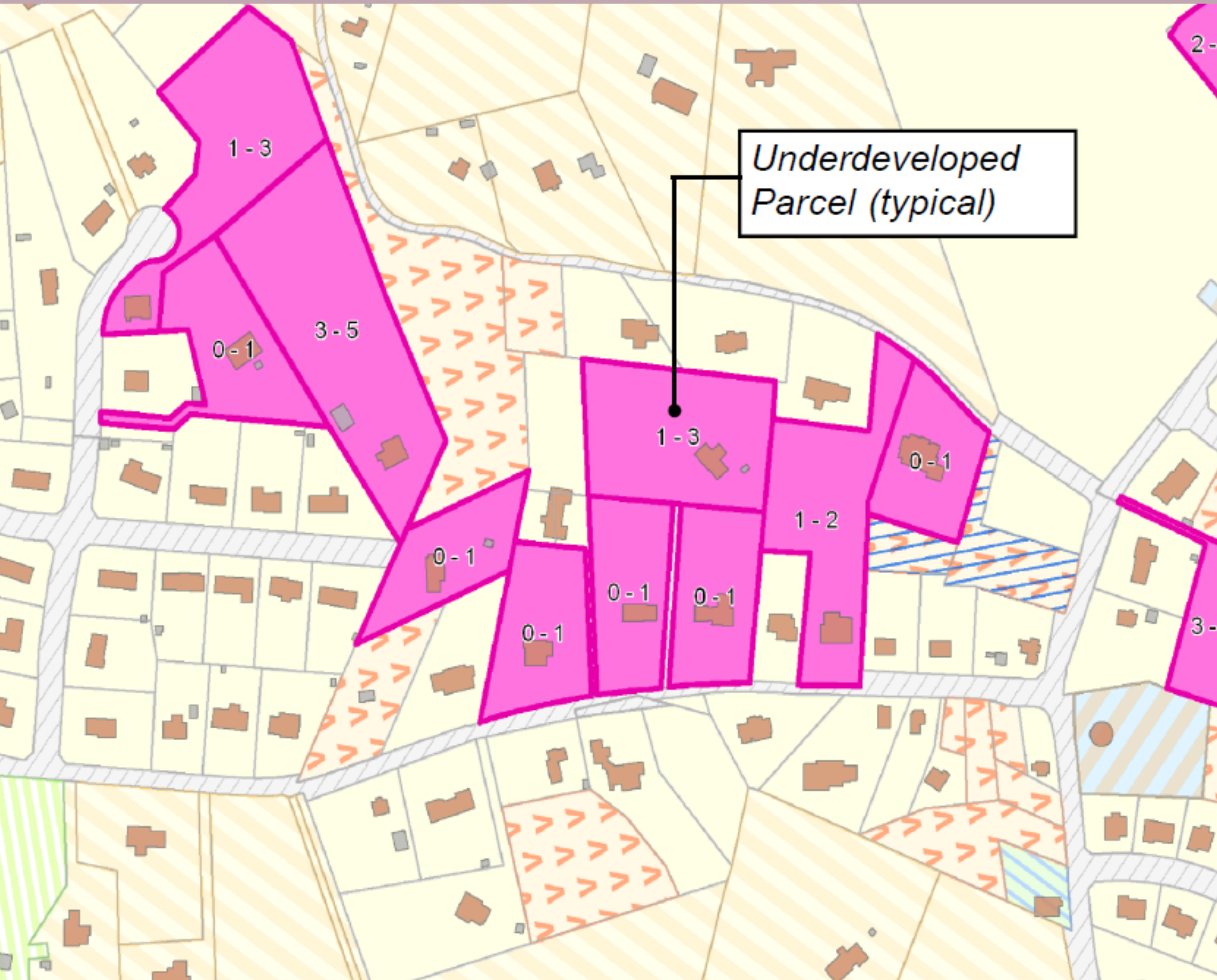
Model Process

STEP 3: IDENTIFY AND CALCULATE
YIELD FOR UNDERSIZED LOTS



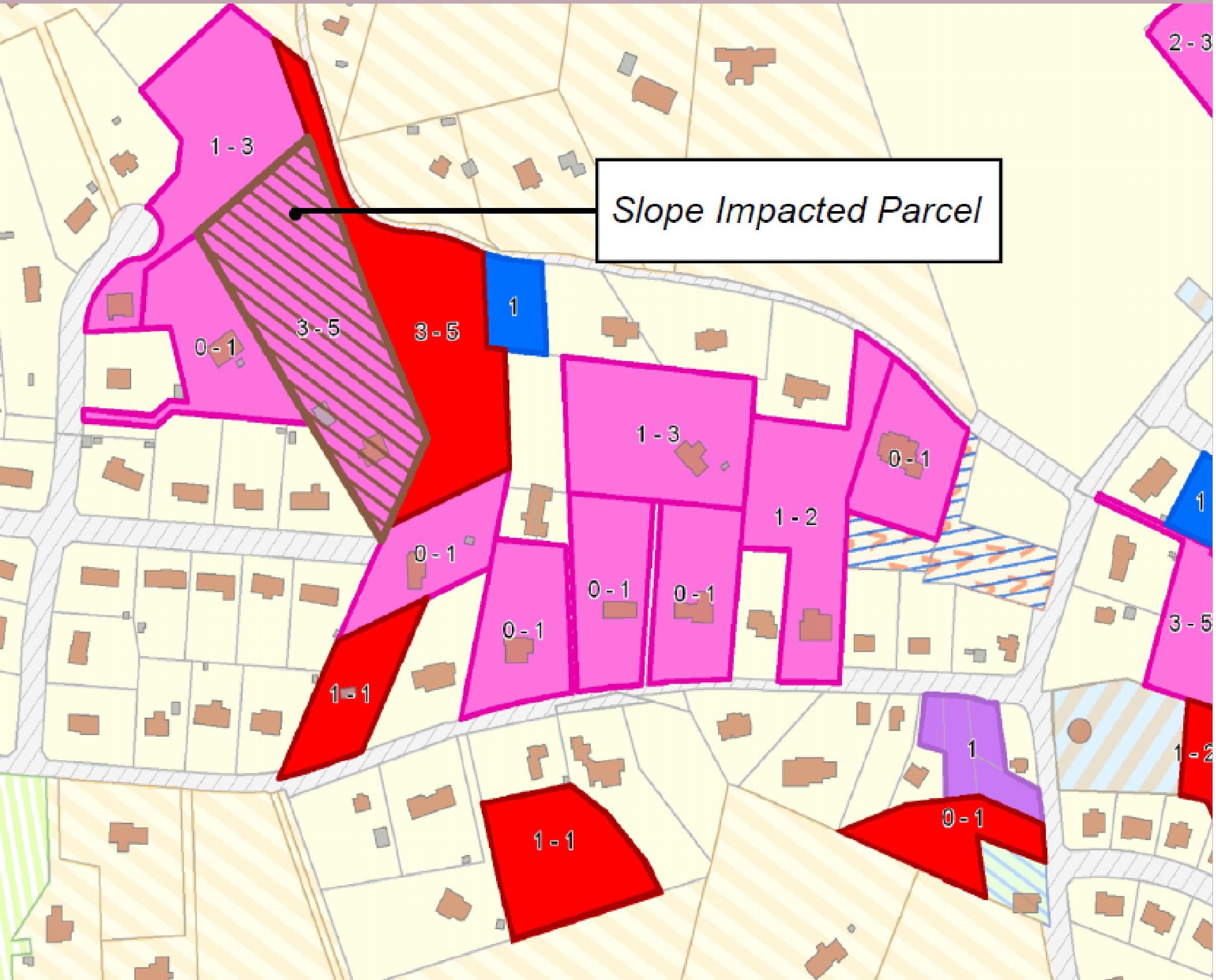
Model Process

STEP 4: IDENTIFY AND CALCULATE
YIELD FOR SUBSTANDARD LOTS



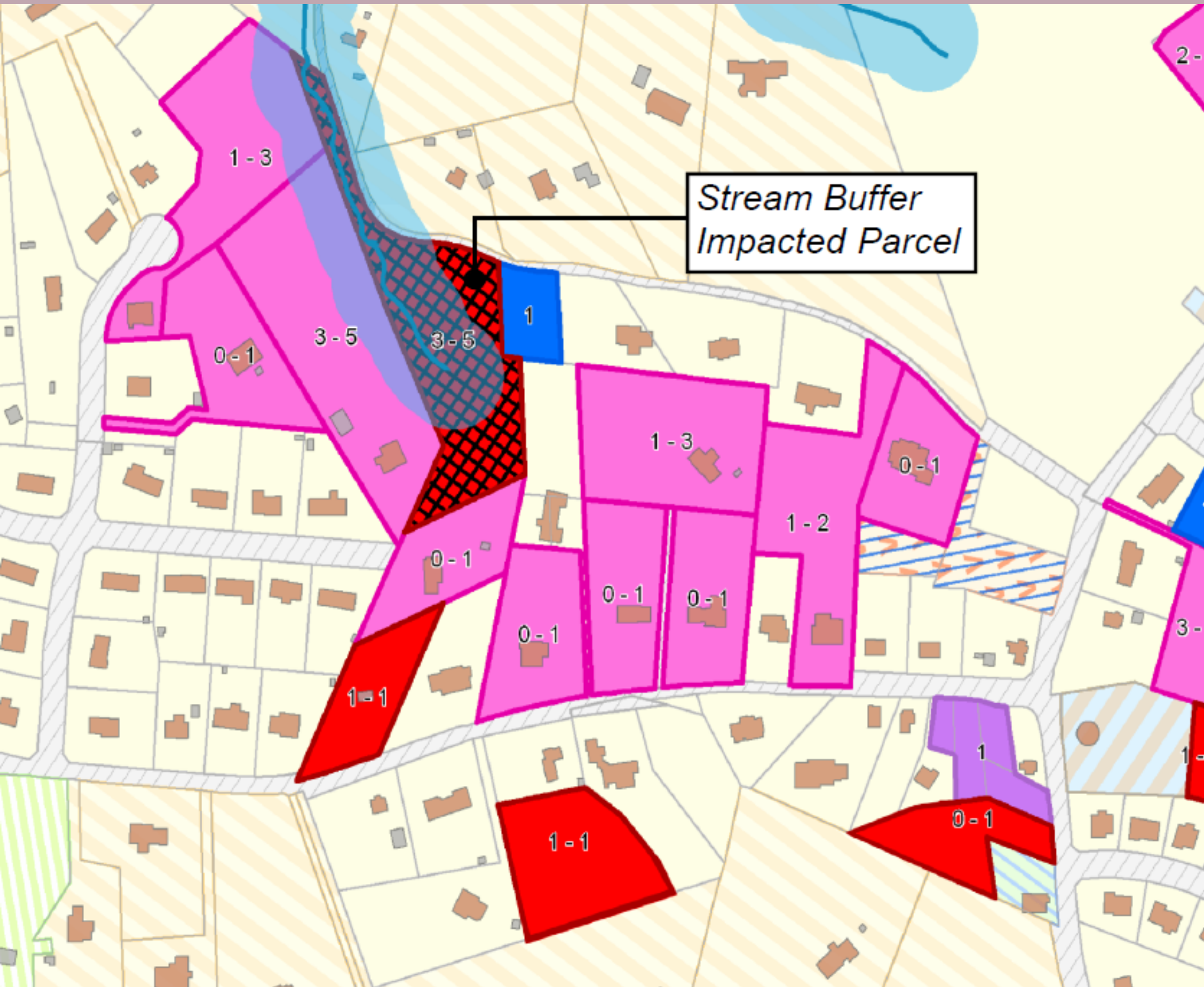
Model Process

STEP 5. YIELD FOR ADDITIONAL DEVELOPMENT ON UNDERDEVELOPED LAND



Model Process

STEP 6. SLOPE IMPACTS ON UNDERDEVELOPED LAND

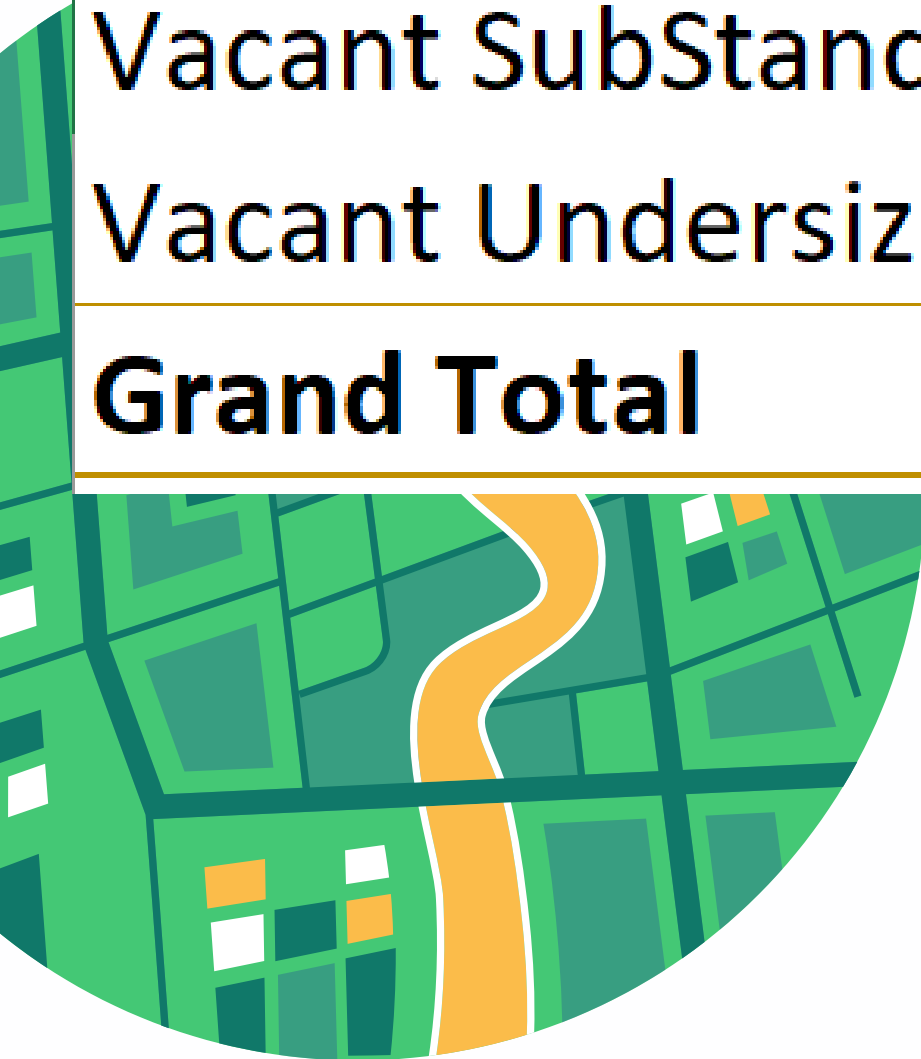


Model Process

STEP 7. STREAM BUFFER IMPACTS



Lot Type	Moderate	Maximum
Under Developed	6,659	18,545
Vacant Standard	4,209	8,328
Vacant SubStandard	-	1,344
Vacant Undersized	-	971
Grand Total	10,868	29,188



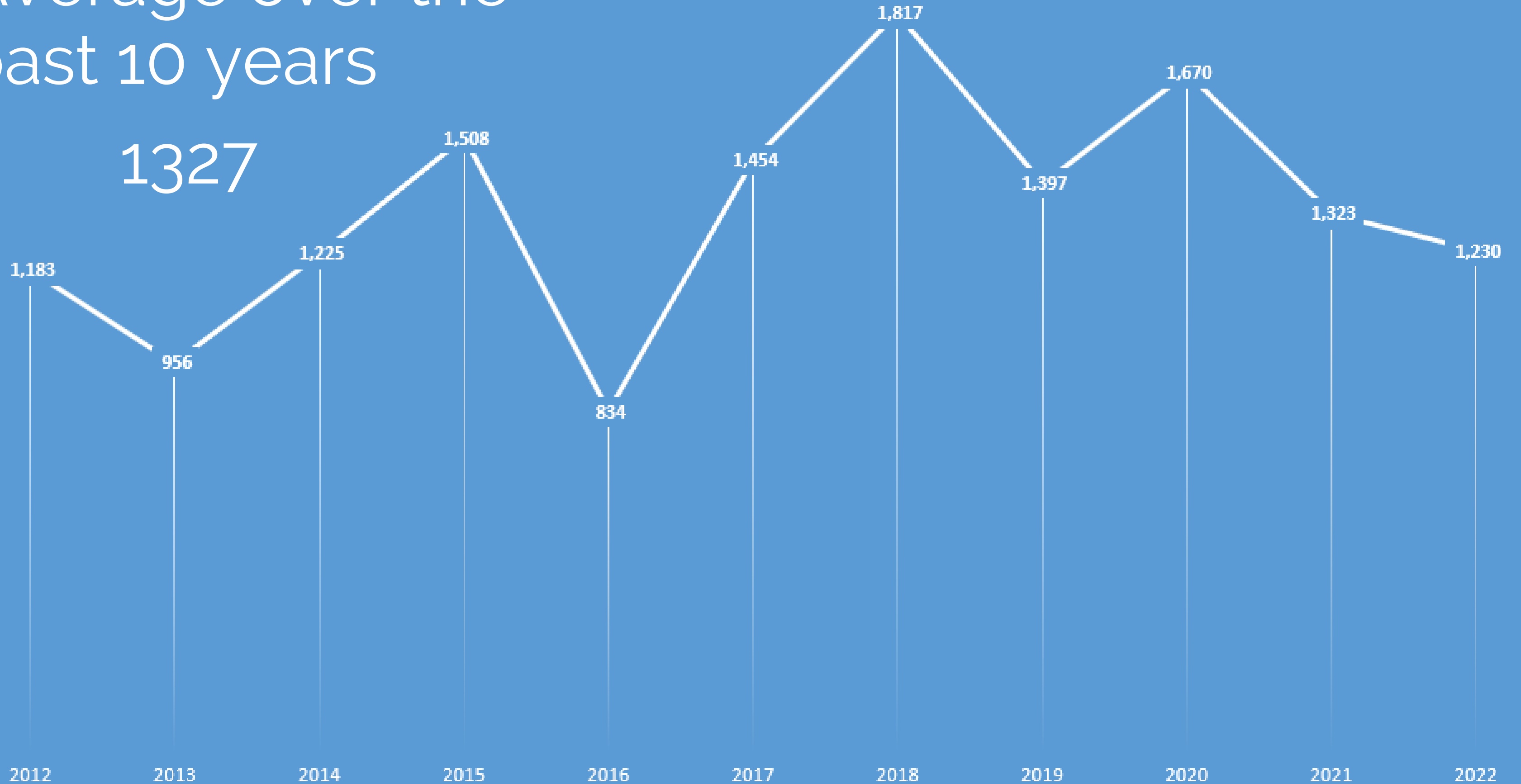
Model Results

This latest model was run in August of 2021 after CZMP 2020 and land use updates were made.

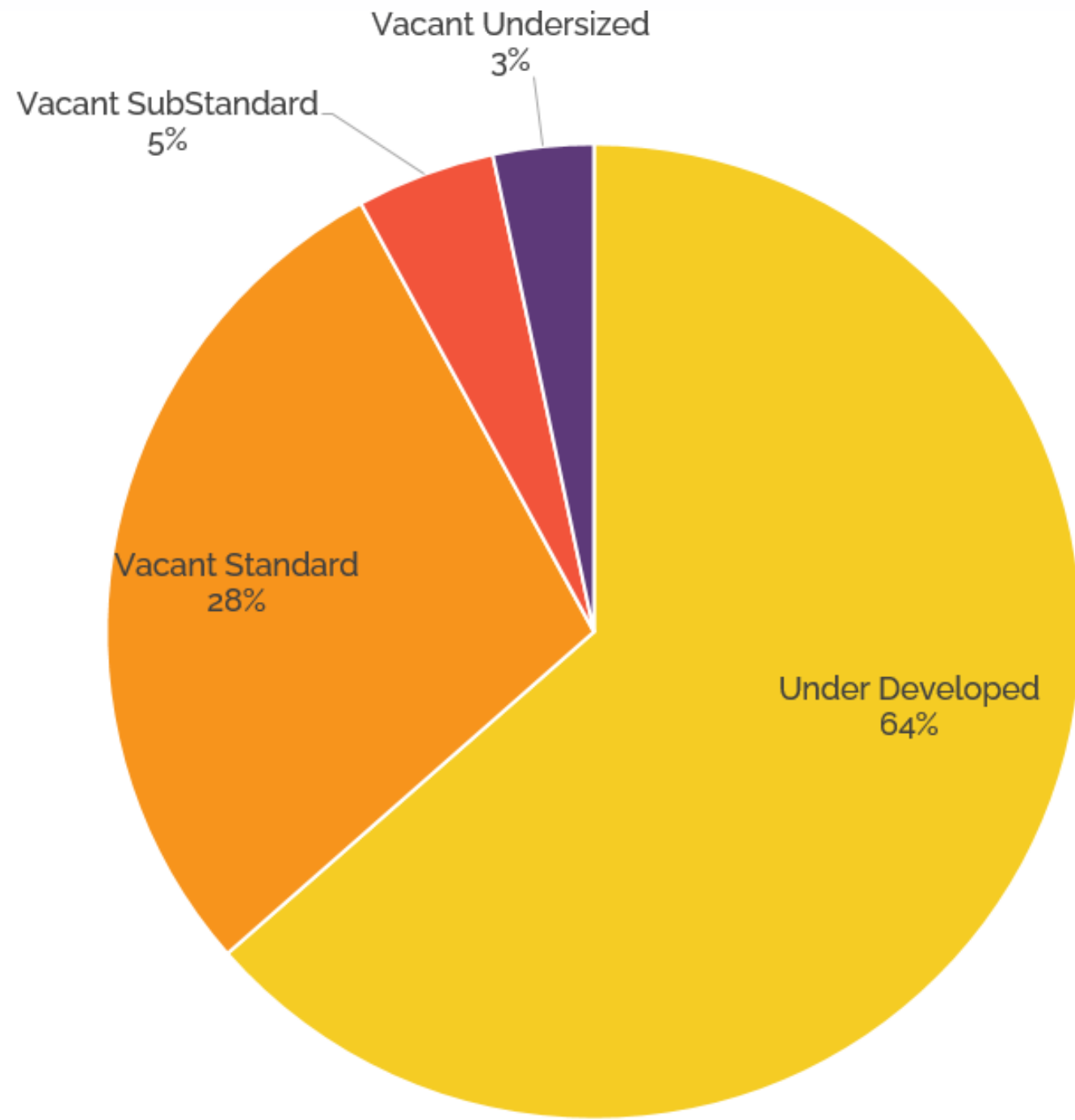
RESIDENTIAL OCCUPANCY PERMITS

Average over the
past 10 years

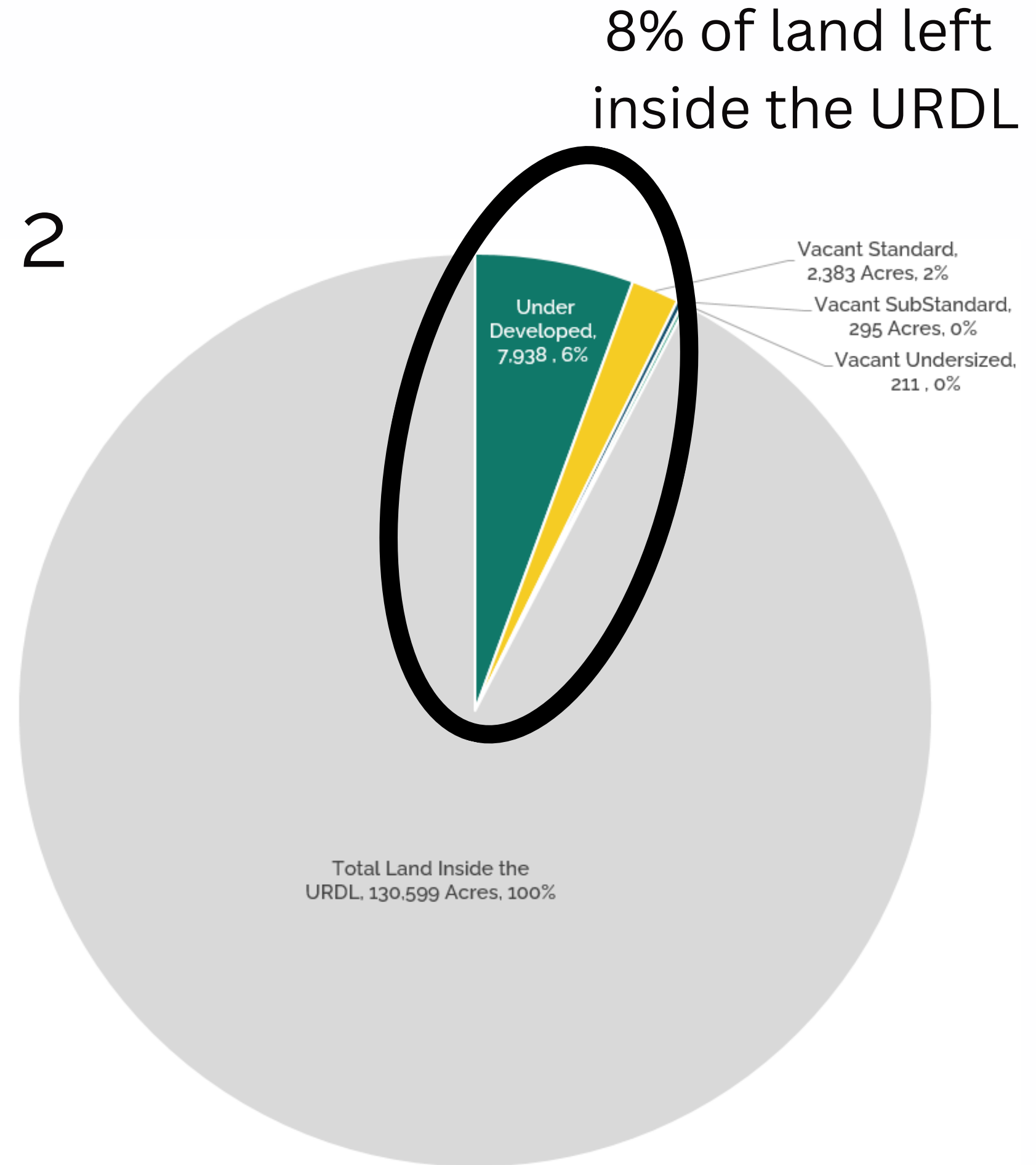
1327



1



2





Growth Framework

Baltimore County Department of Planning
April 17, 2023

Residential Development Capacity (GF.2)

Baltimore County is running out of land inside the URDL.

In December of 2021, new capacity numbers were calculated for the urban areas based on current land use, zoning and growth tiers.

The most recent model results shows that the number of potential units could range from **10,890 units** with the "moderate" build-out scenario to **26,956 units** assuming the "full zone" build-out. Most lots do not build out to their fullest density, but rather to a moderate density. These figures also do not include redevelopment potential.

The current residential building rate is 1,300 residential permits per year for urban areas of the County. If this building rate continues with no change to zoning, the urban areas will reach full build-out in 20.7 years, or 8.4 years at the moderate build-out rate.



MODERATE SCENARIO
Urban build out is reached using the Moderate Scenario. This Scenario uses a *historic build out calculation* for each zone.

FULL POTENTIAL SCENARIO
Urban build out is reached using the Full Scenario. This scenario uses a *full density build out calculation* for each zone. Most zones are not built out to full density.

Land inside the URDL will build out to full capacity in 8 to 20 years.