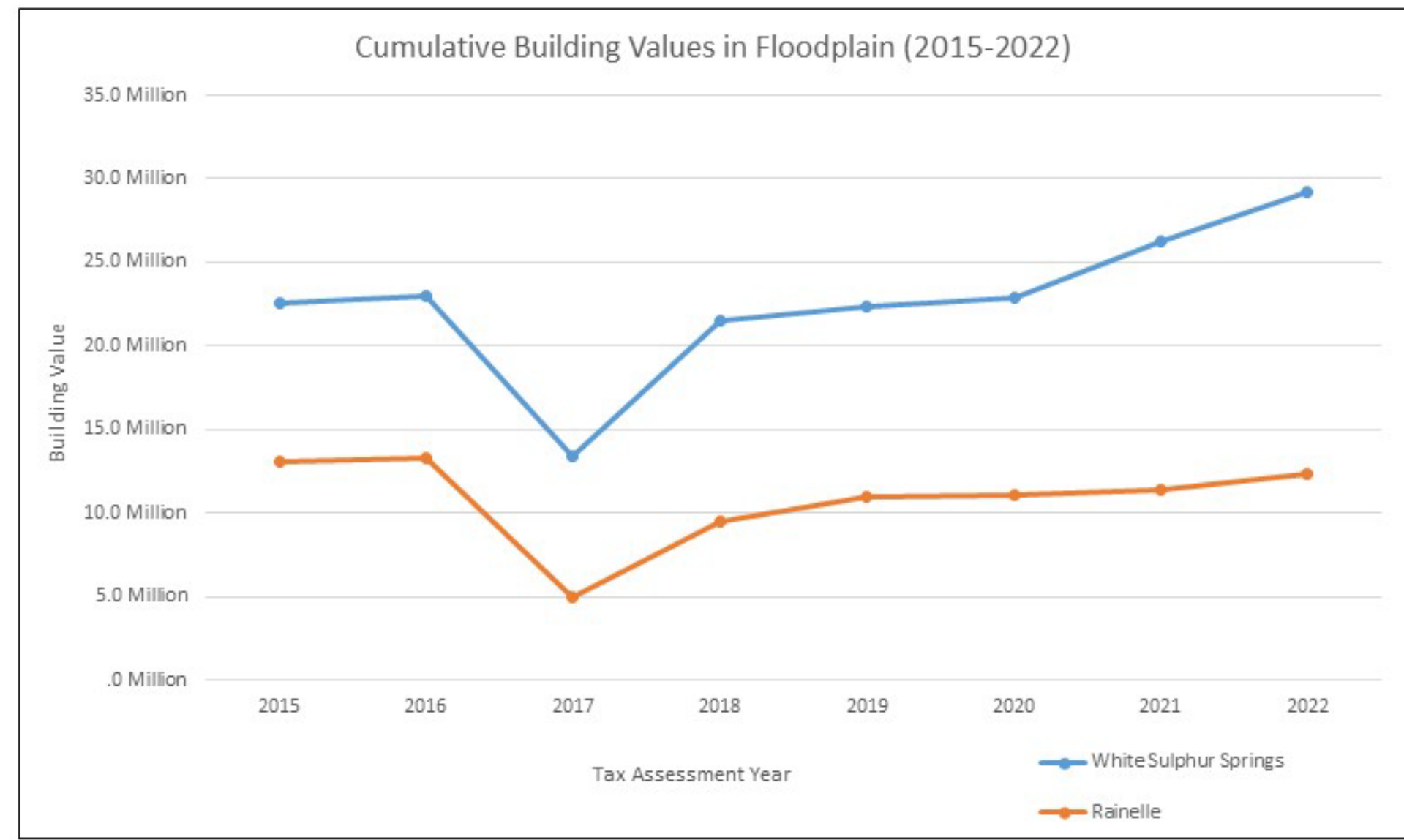


## Mitigation Measures White Sulphur Springs and Rainelle

Category	Mitigation Indicator	White Sulphur Springs	Rainelle
Mitigated Structures	Elevated Structures to Design Flood Elevation (DFE)	217	87
	Rehabilitated/Repaired Structures	394	278
	Unmitigated Low Value Structures	14	47
	Structures Removed (vacant parcel)	49	41
Open Space Preservation	Buyout Parcels (Deed Restricted)	16	18
	Community-Owned Vacant Parcels	66	88
	Area of Open Space Preservation (OSP)	5 Acres	3 Acres
Building Value Recovery	Ratio of Open Space Preservation (OSP to SFHA)	2.6%	4.5%
	Net Value 2016-2022 Tax Assessment Value	+\$6.1 Million	-\$1.0 Million
Loss Avoidance 100-year Flood	Loss Avoidance by Elevating or Removing Structures (preliminary results)	\$2.6 million	\$2.3 million

## Floodplain Building Value Recovery White Sulphur Springs and Rainelle

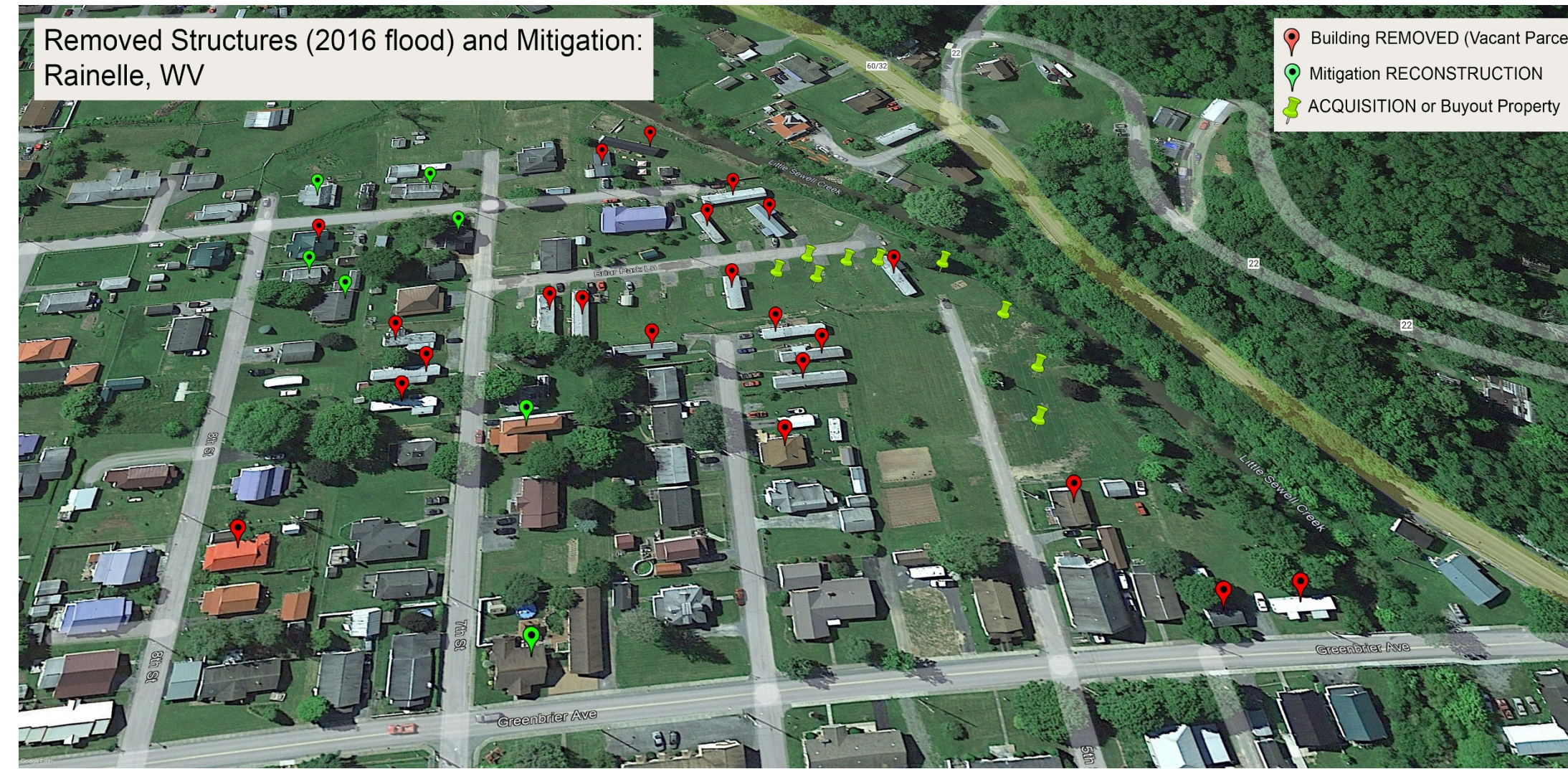


COMMUNITY	2015	2016	2017	2018	2019	2020	2021	2022
Rainelle (n=326)	13.1 Million	13.3 Million	5.0 Million	9.4 Million	11.0 Million	11.1 Million	11.3 Million	12.3 Million
White Sulphur Springs (n=409)	22.6 Million	23.0 Million	23.4 Million	21.5 Million	22.4 Million	22.9 Million	26.2 Million	29.2 Million

Source: Tax assessment database. May not include values for tax exempt properties.

## Flood Risk Mitigation In Rainelle

WV GIS Technical Center  
May 2023



## Unmitigated Example in Rainelle

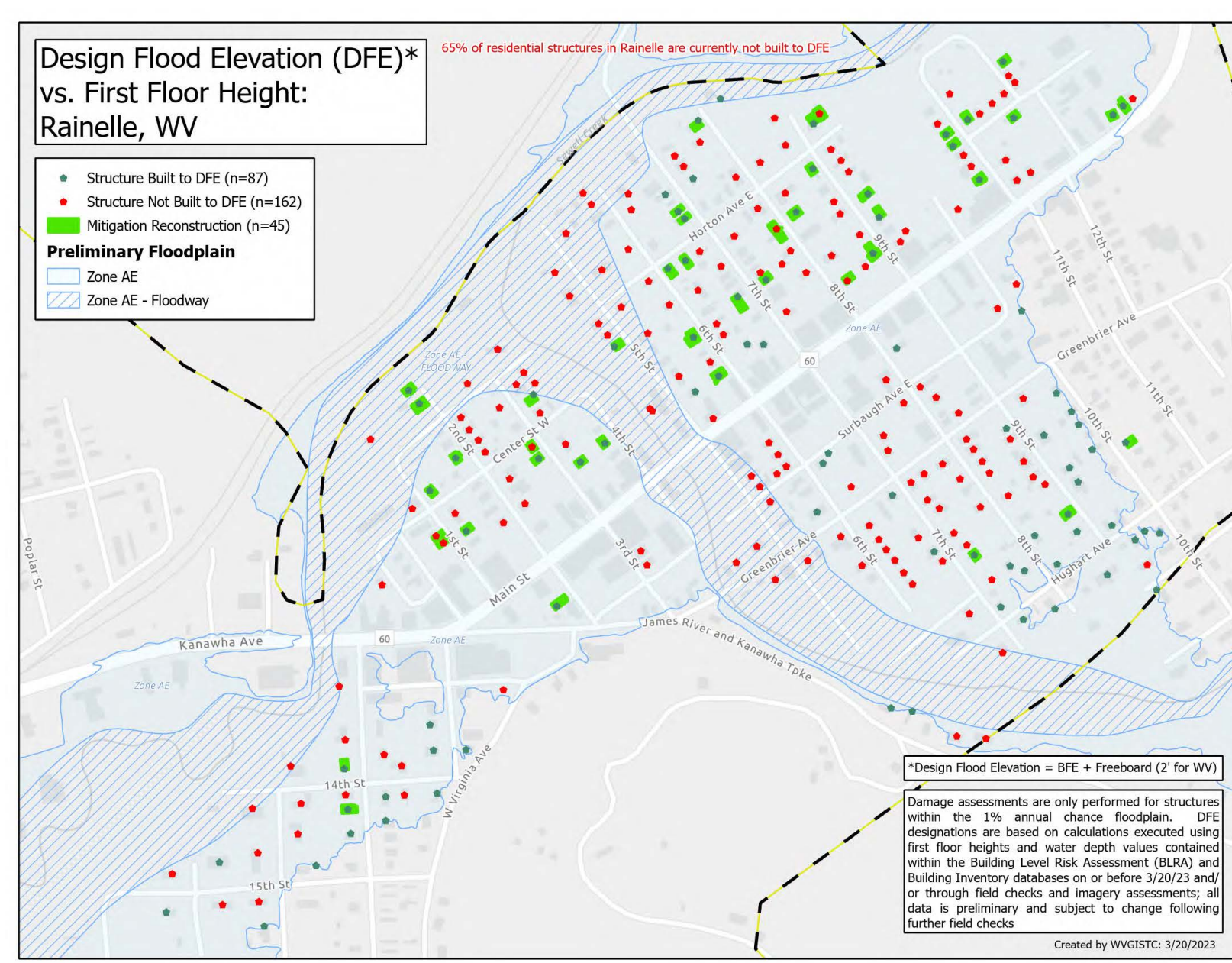
First Floor Height (FFH) BELOW FEMA 1-percent chance (100-yr) flood  
First Floor BELOW 2016 HWM; 1%+, 0.2-percent chance (500-yr) floods



## Mitigation Measures (Continued) White Sulphur Springs and Rainelle

Category	Mitigation Indicator	White Sulphur Springs	Rainelle
Resiliency to Future Floods	Percent Residential Structures in 100-year floodplain elevated to Design Flood Elevation (DFE)	59%	35%
Higher Standards	Freeboard (safety elevation factor above BFE)	2 ft.	2 ft.
	Community Rating System (above min. requirements)	No	No
Floodplain Management	Incorporated Place a compacted floodplain management area to enforce floodplain ordinance	Yes	Yes
	Continuity of operations and immediate response to disasters	?	?
	Record keeping (permits, EC's, substantial damage)	?	?
Flood Insurance	Number of Policies 2019	133	44
Risk Communications	Flood Risk Disclosure Laws in West Virginia	F grade	F grade
	Outreach to property owners about changes to flood maps (mapped in/mapped out of SFHA)	?	?

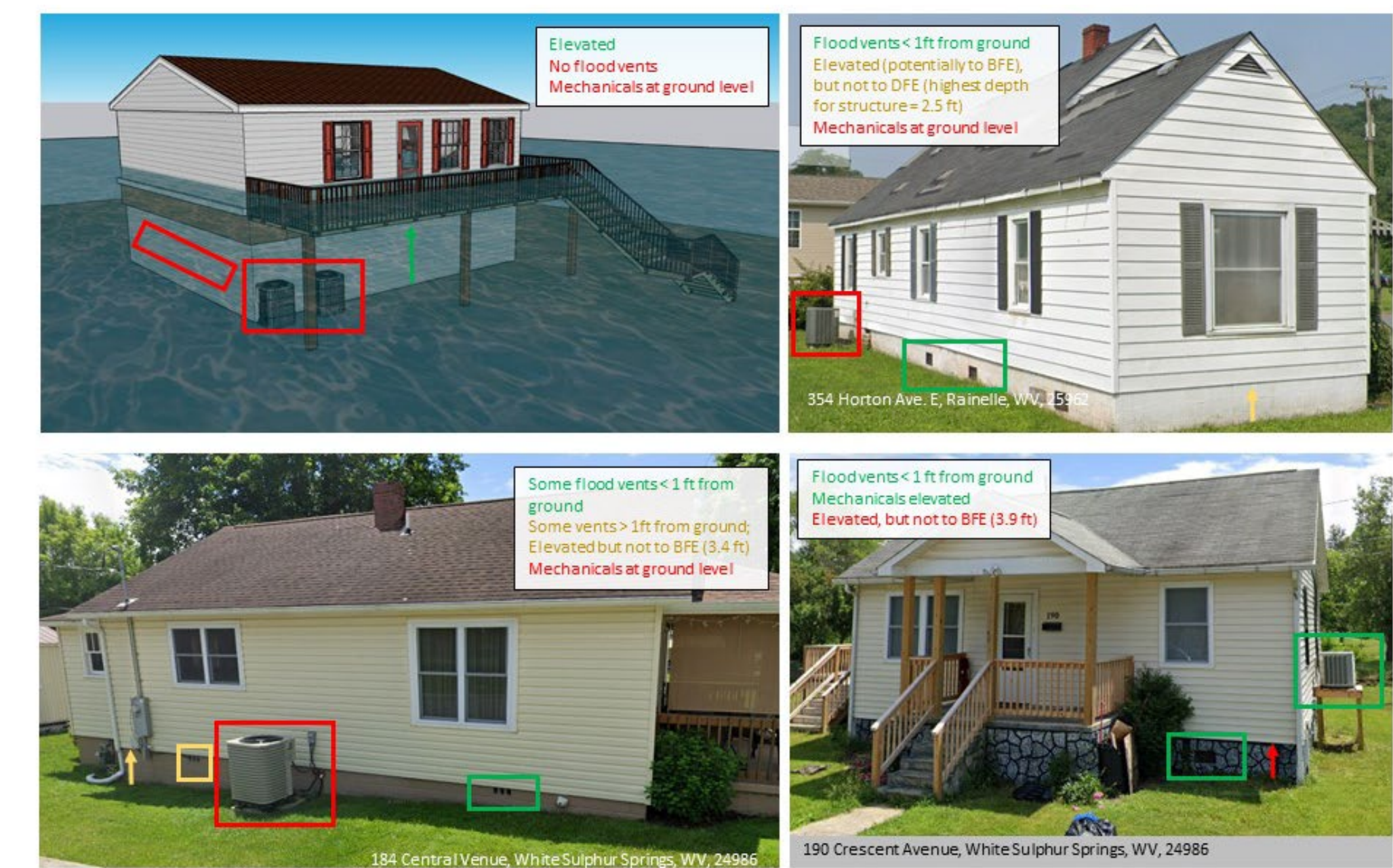
## Building Design Flood Elevation Rainelle



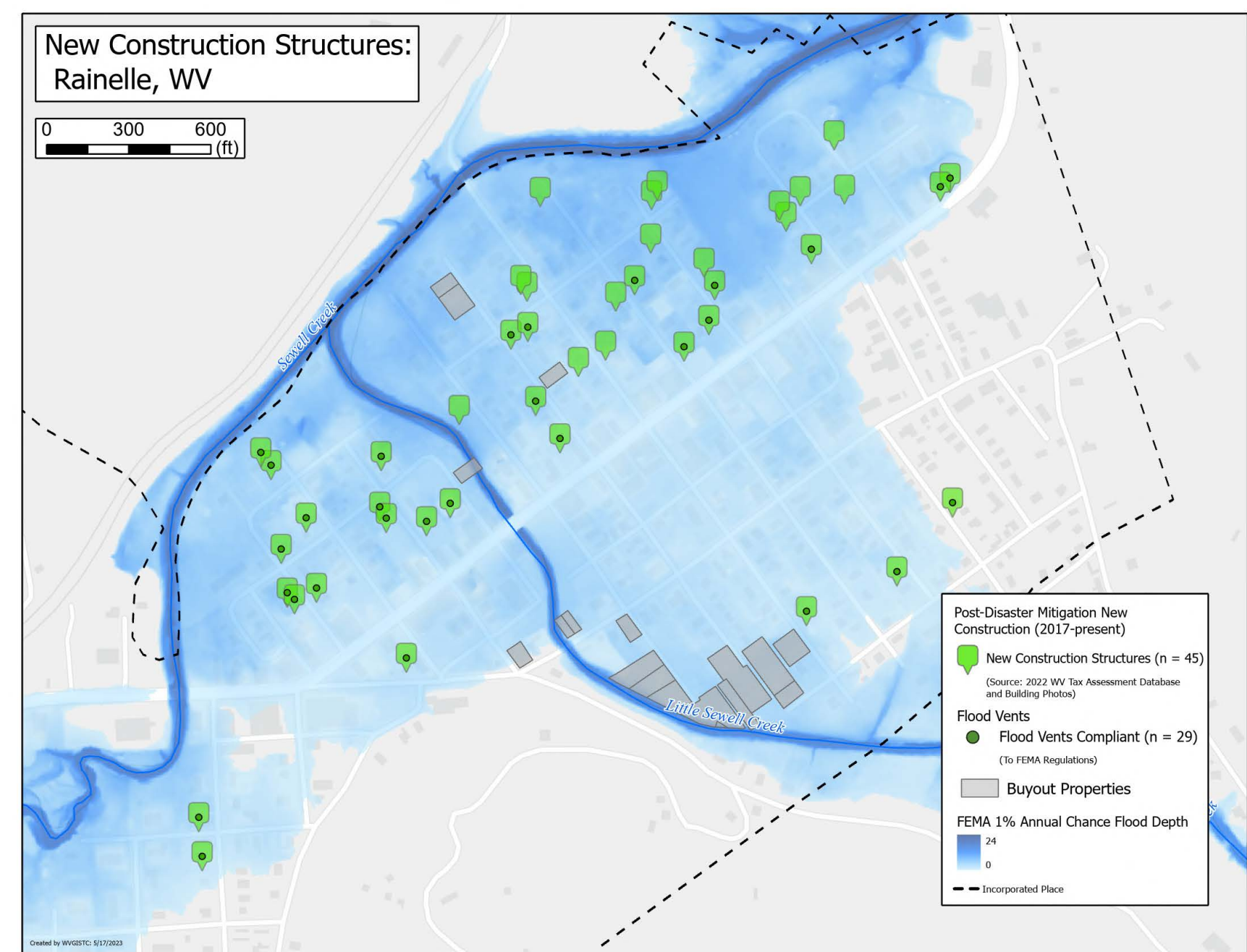
## New Streamgages Rainelle



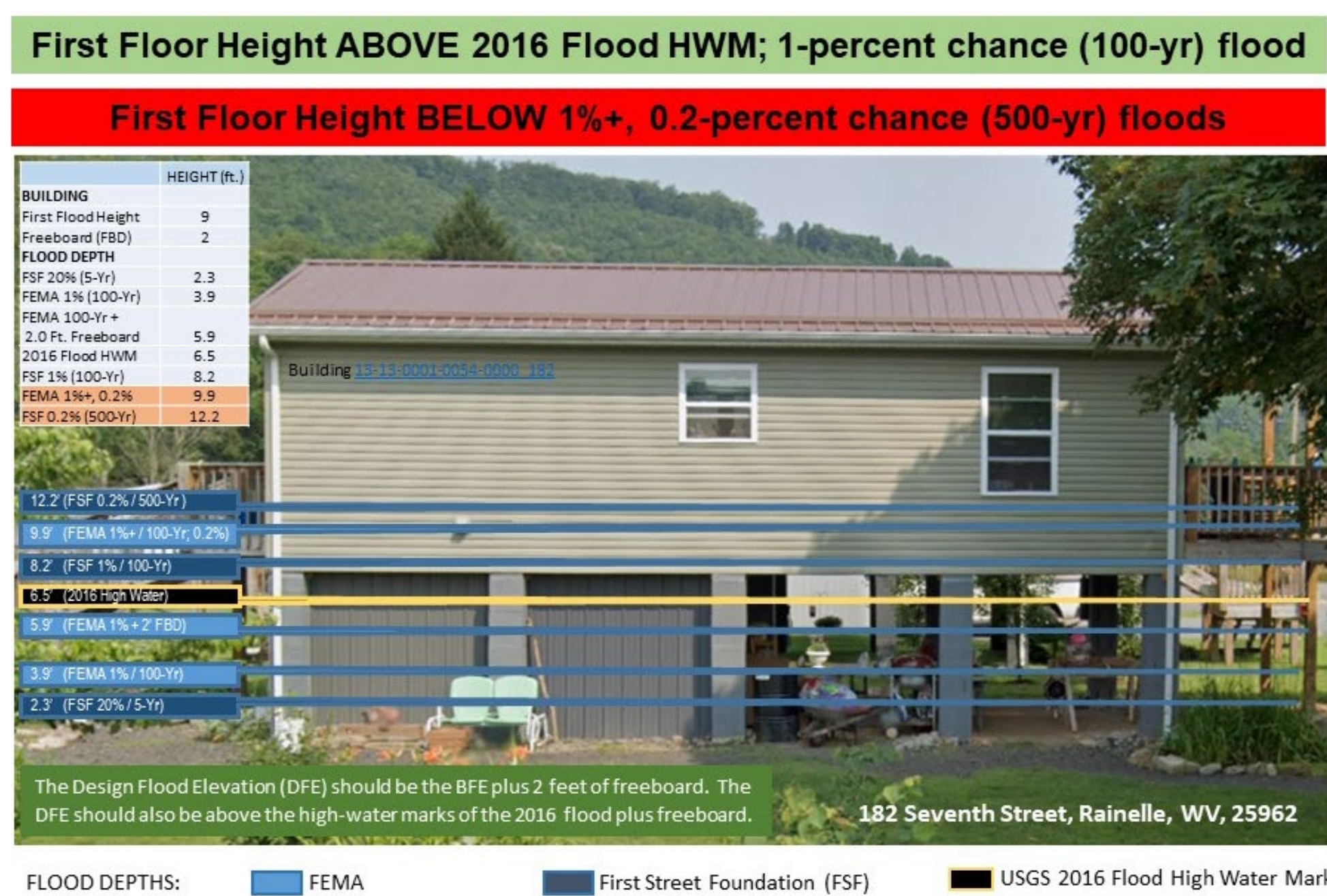
## Partial Mitigation Examples



## Mitigated Properties Rainelle



## Mitigation Reconstruction Example in Rainelle

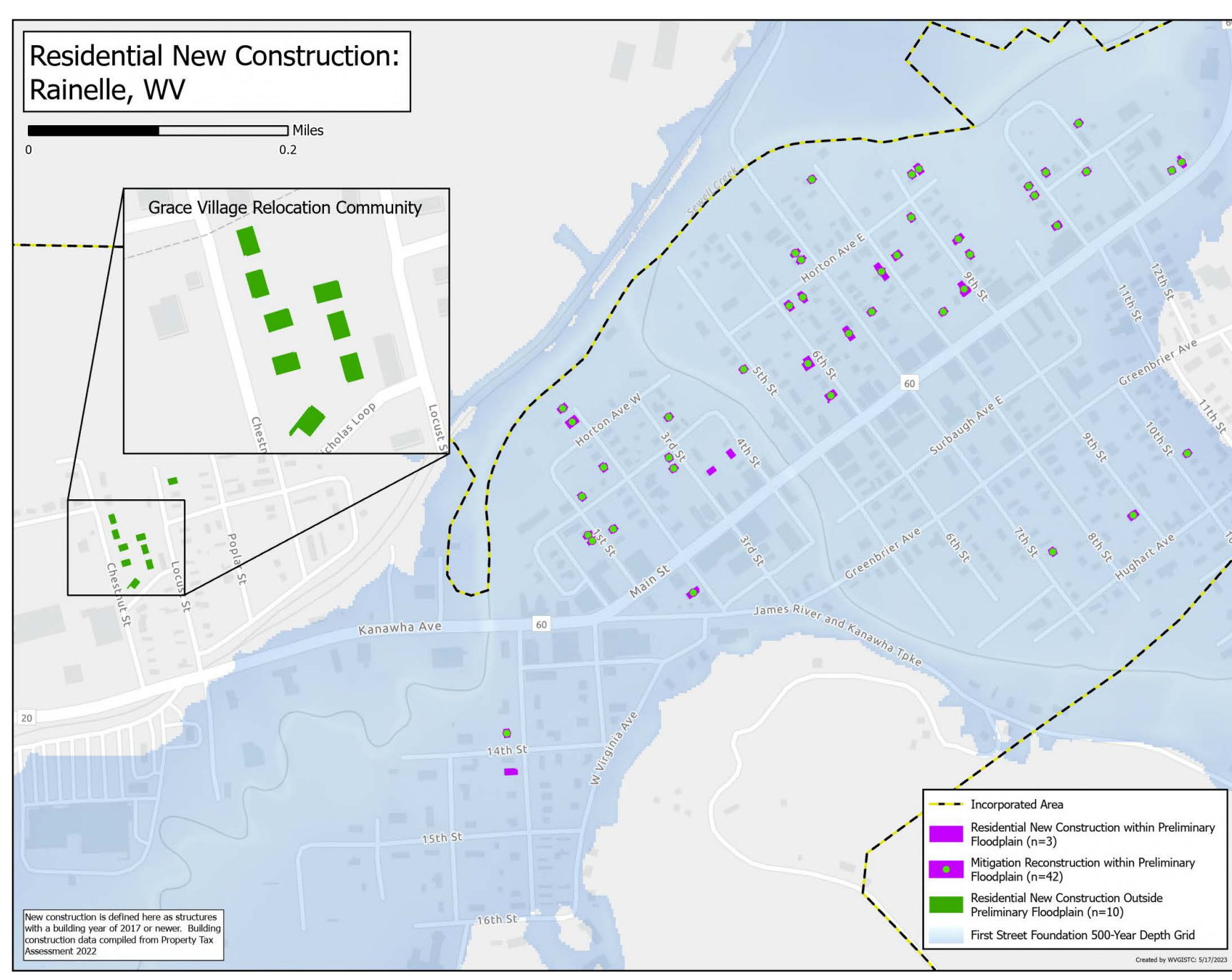


## Removed Structures (2016 Flood) and Mitigation 7th St, Rainelle

## Removed Structures (2016 flood) and Mitigation: Rainelle, WV



## Relocation Community Rainelle



## Examples of Properly Elevated Structures in Rainelle



● Building REMOVED (Vacant Parcel)  
● Mitigation RECONSTRUCTION  
● ACQUISITION or Buyout Property