



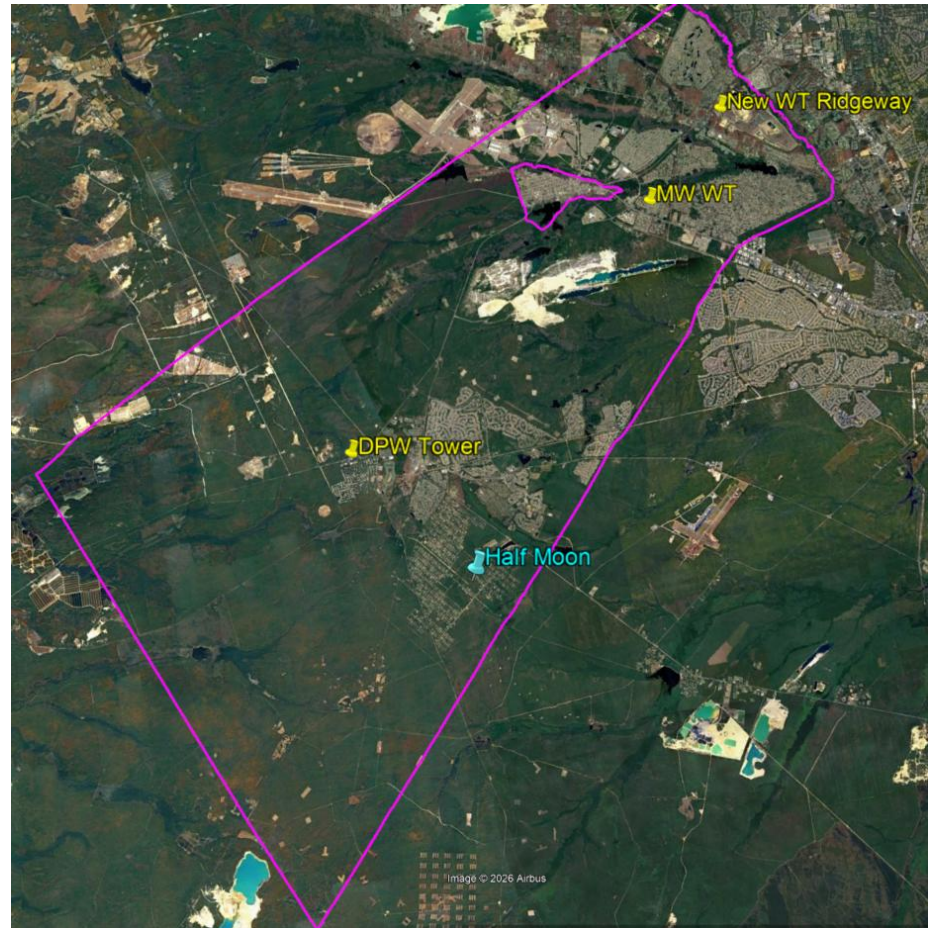
**MANCHESTER TWP COUNCIL
PRESENTATION FOR
PROPOSED
HALF MOON HILL
SITE
7/13/26**

RADIO SYSTEM PROJECT OVERVIEW

- Current Radio System End of Life
 - *Performance Failures, Officer Safety issues*
 - *Parts unavailable*
- After subsequent analysis it was determined affiliation to the State's NJICS system provides:
 - *Greatest short and long-term financial benefit*
 - *Maximizes local interoperability*
 - *Available to all Township agencies*
- Current Status
 - *3 Sites (of 4) Completed*
 - *Agencies cutover to new radio system*
 - *New State-of-the-art 911 Dispatch Center completed and cutover June 2026*

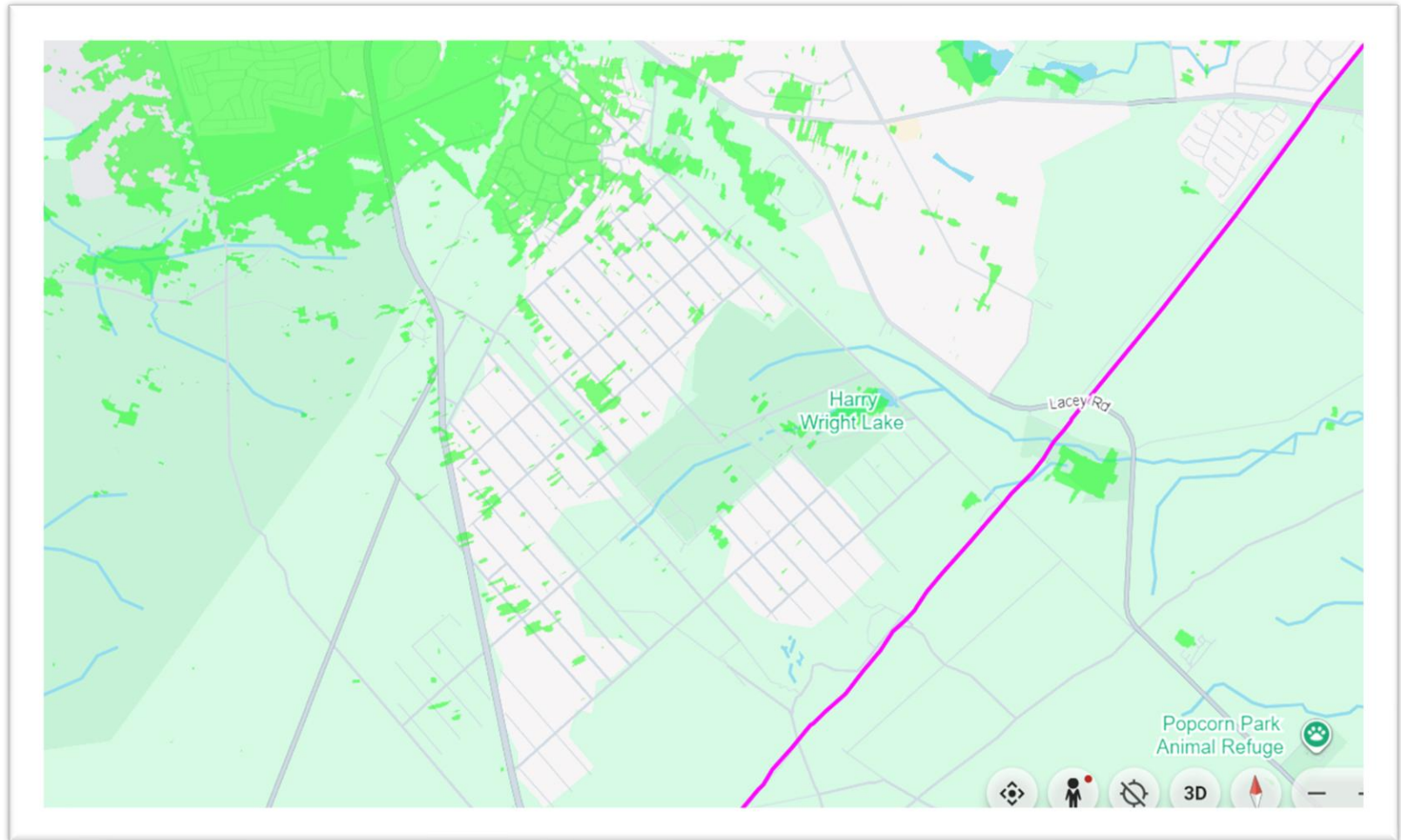
SITE NEED ANALYSIS

- AREA WAS IDENTIFIED AS COVERAGE DEFICIENT
 - Populated Area in southern/eastern portion of Township, near Harry Wright Park
 - Township identified poor coverage area in current UHF based system
 - 700 MHz coverage modeling confirmed need for additional site to achieve reliable coverage to area



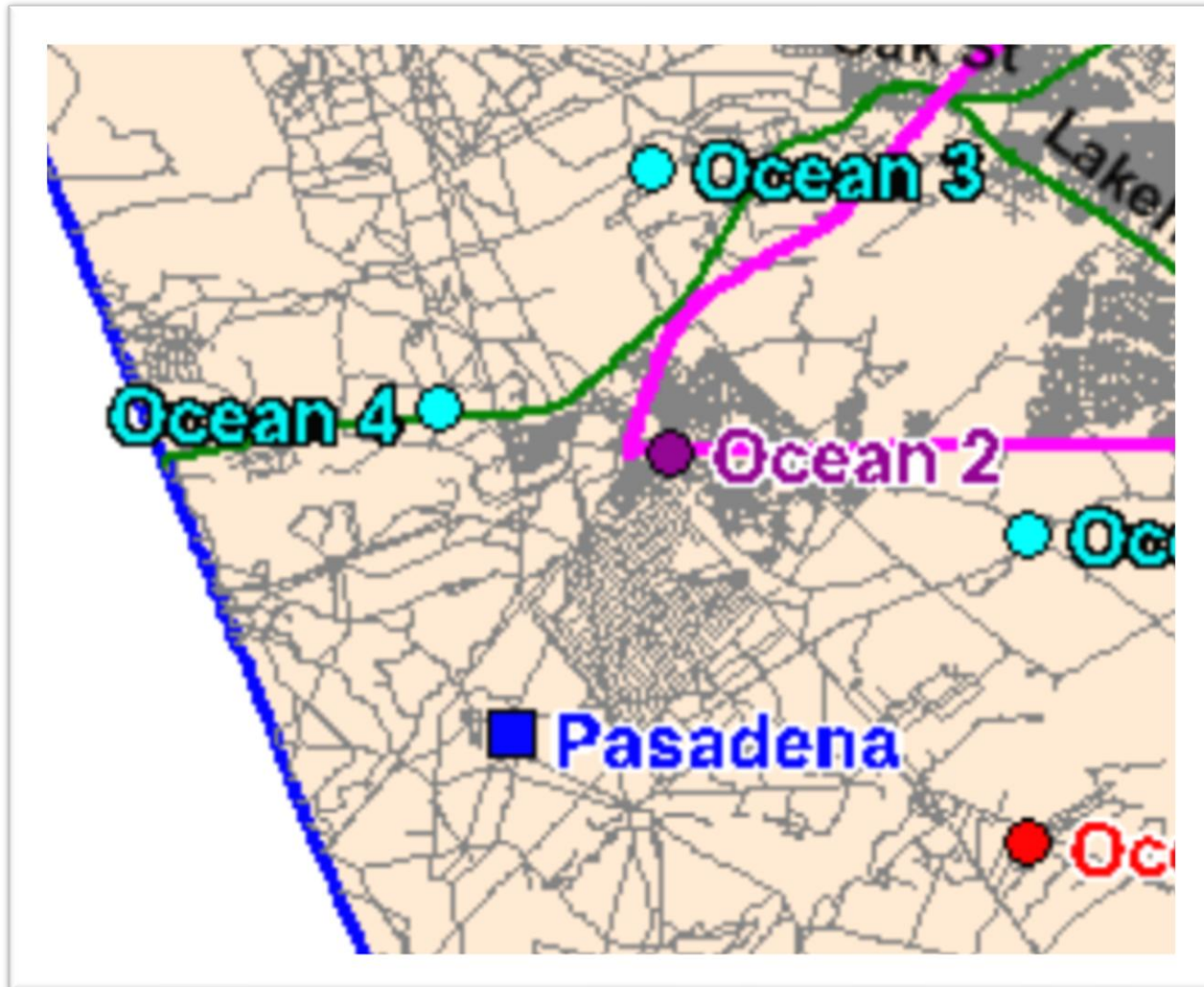
HALF MOON COVERAGE ANALYSIS

Area around Half Moon location has gap in-building reliable coverage gap
(Green meets coverage standards)



Pinelands Plan Sites Map

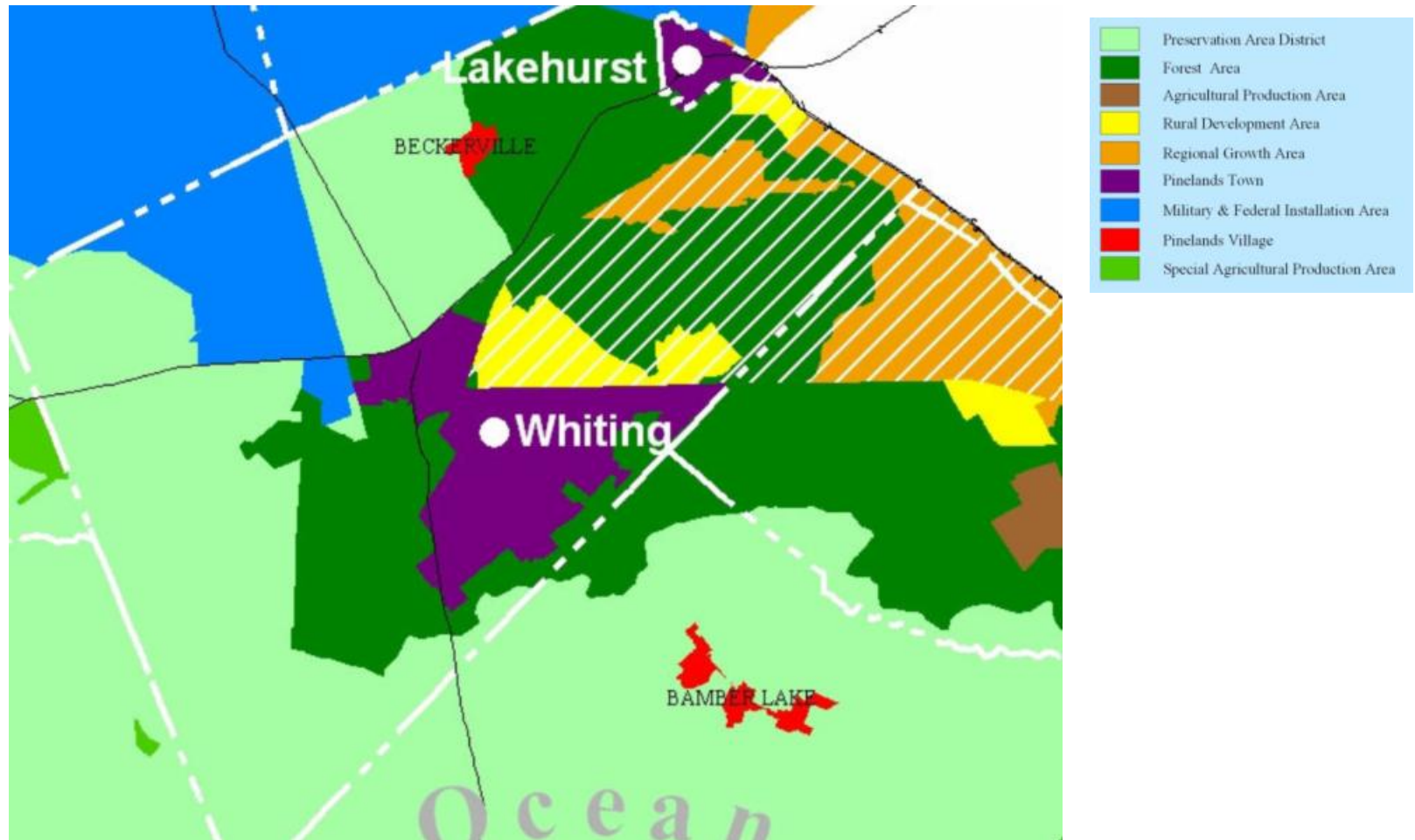
PINELANDS PLAN IDENTIFIES AS KNOWN COVERAGE ISSUE “Ocean 2”



CANDIDATES ANALYSIS

- AREA RESTRICTIONS
 - PINELANDS
 - All new infrastructure subject to Pinelands Plan
 - 2012 Pineland Plans already included site for this vicinity for commercial and public safety use (“Ocean 2”) (note DPW Tower = “Ocean 4”)
 - Pinelands Plan identification of Ocean 2 indicates strong need for infrastructure in area
 - FAA
 - Ocean County Robert J Miller Air Park could influence tower location and height
 - Military Runways could influence tower location and height

Pinelands Land Management Areas



CANDIDATES - Existing

- “Verizon” Tower on Route 530 (Pinewald-Keswick Road) near Township border
 - Township has access rights
 - Site evaluated and did not provide adequate coverage to area of concern
- DPW Tower – Already part of new system, does not provide adequate coverage to area of concern
- No other existing, adequate infrastructure in area

NEW INFRASTRUCTURE REQUIRED TO MEET COVERAGE NEEDS

CANDIDATES - NEW

1. HARRY WRIGHT PARK

- Restricted by Green Acres Acquisition Limitations
- Eliminated from further consideration



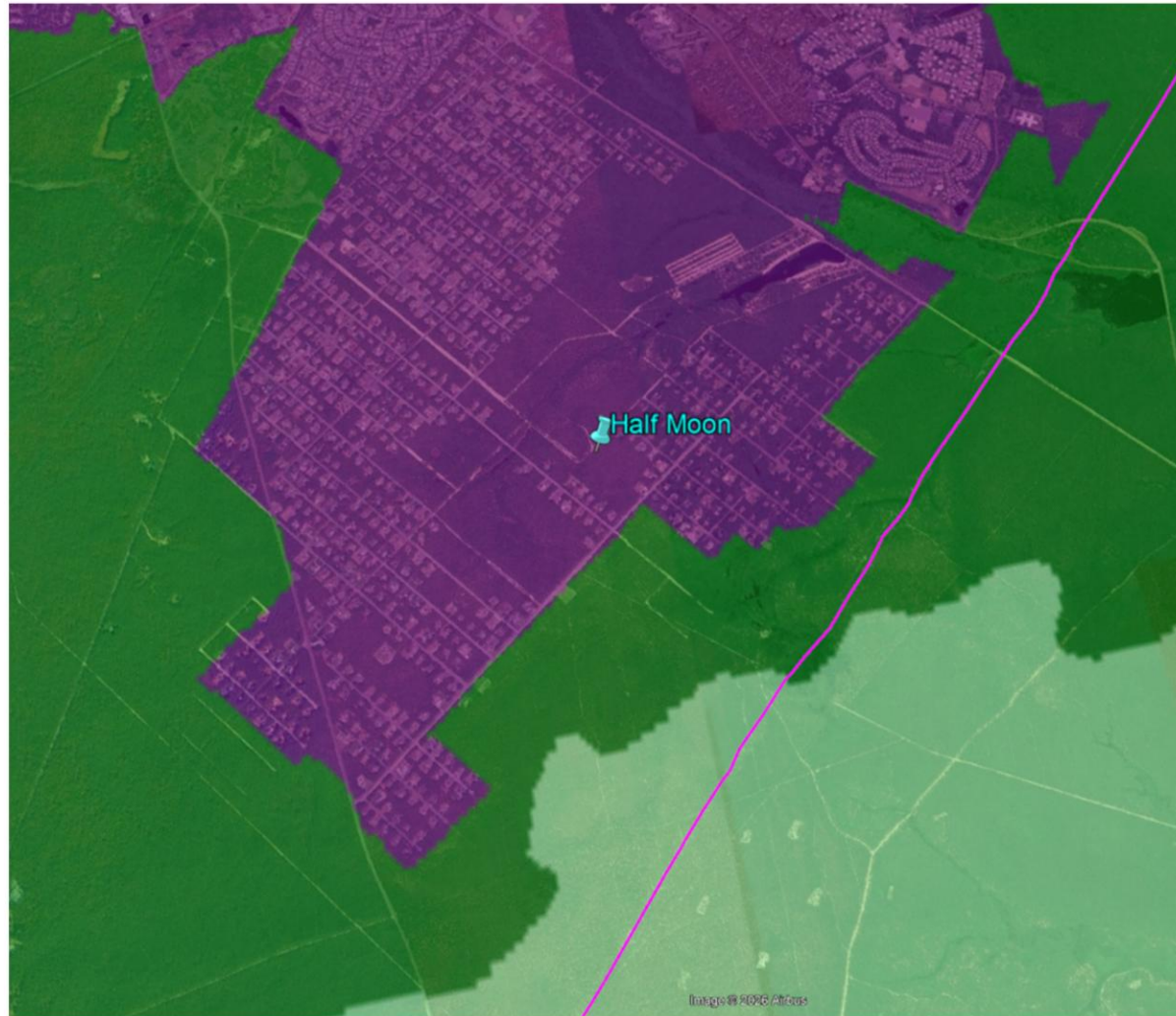
CANDIDATES - NEW

- HALF MOON HILL
 - Township Owned Property - No land lease costs
 - Excellent elevation profile to maximize radio coverage
 - Excellent access
 - Construction access via unimproved roadway off of Roosevelt Blvd
 - Selected location minimizes “driveway” tree removal/disturbance, saves cost
 - Away from existing buildings
 - Between improved roads Trenton Ave and New York Ave
 - Camden Ave = “Paper road” near site
 - ~390’ to nearest occupied lot line
 - ~460’ to nearest residence
 - Utilities service available via Trenton Ave

CANDIDATES - NEW

- HALF MOON HILL (con't)
 - Pinelands
 - Conforms with Pinelands Plan preferred area for “Ocean 2”
 - Conforms with Pinelands tower development areas, criteria (“Pinelands Town”)
 - Application submission completed for Pinelands approval
 - FAA
 - Study executed at Half Moon location
 - FAA “*Determination of No Hazard*” for 170’ tower with appurtenances up to 185’

Pinelands Land Management Areas



- Preservation Area District
- Forest Area
- Agricultural Production Area
- Rural Development Area
- Regional Growth Area
- Pinelands Town
- Military & Federal Installation Area
- Pinelands Village
- Special Agricultural Production Area

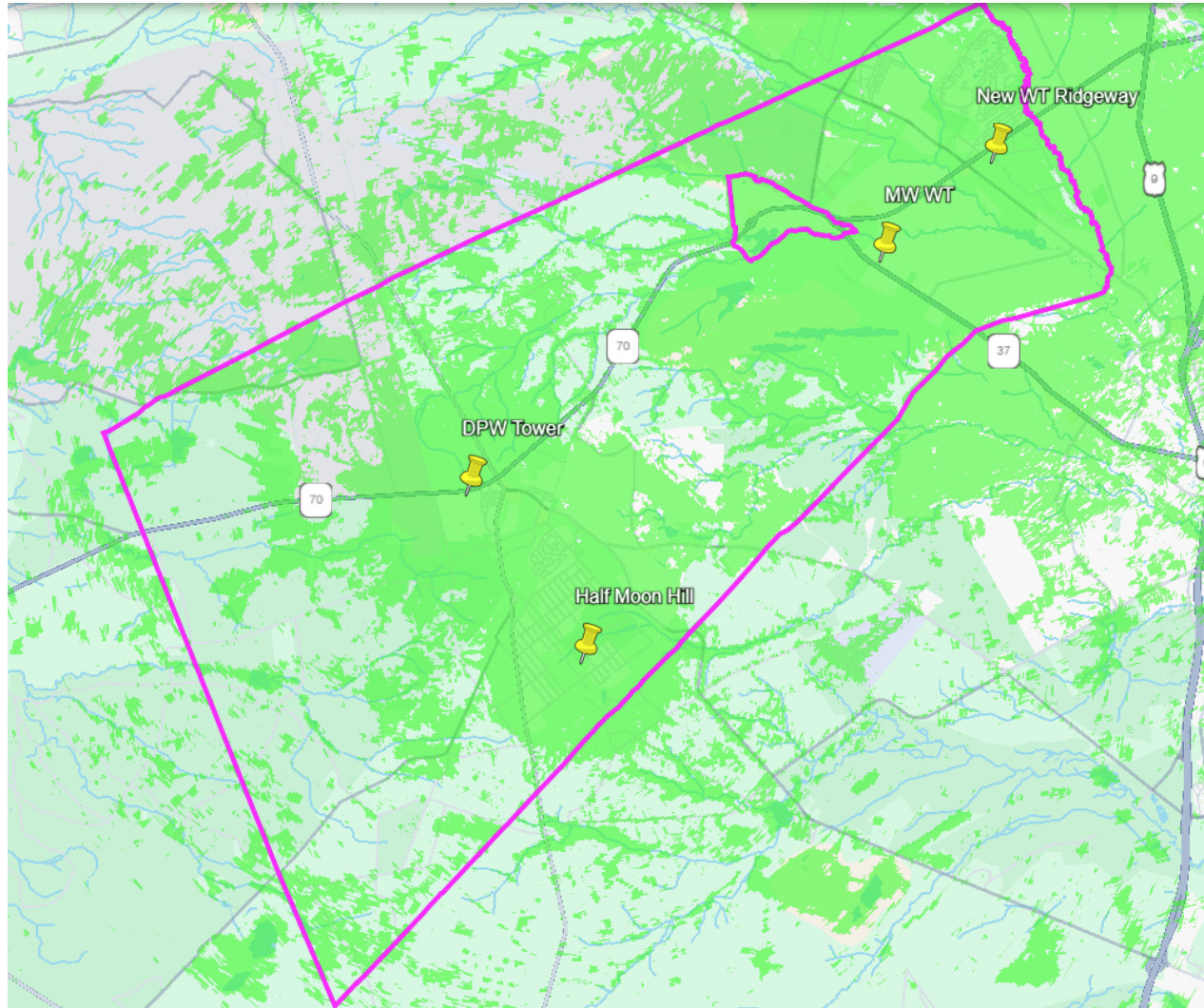
HALF MOON COVERAGE ANALYSIS

Proposed Half Moon Location provides reliable in-building coverage



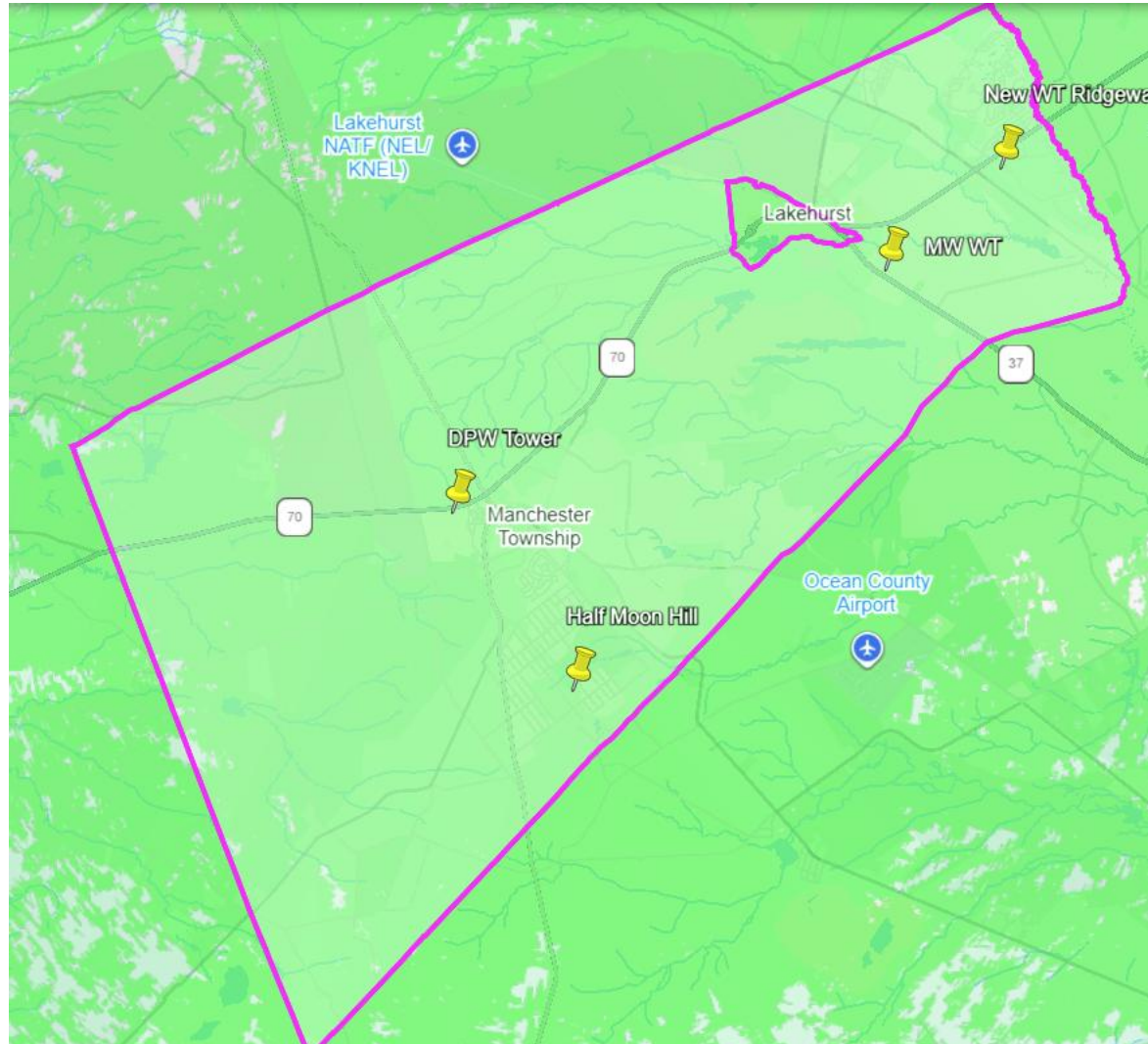
COVERAGE ANALYSIS

- Fulfills radio system portable in-building coverage across Township



COVERAGE ANALYSIS

- Fulfills radio system on-street mobile coverage across Township



HALF MOON HILL - RFE

- RF SAFETY
 - Site located away from existing buildings
 - ~390' to nearest occupied lot line
 - ~460' to nearest residence
 - Between improved roads Trenton Ave and New York Ave
 - Camden Ave = "Paper road" near site
 - 100% compliant with all existing standards (FCC, FDA, OSHA)
 - FCC revisited 1996 Standards in 2019¹; no changes to levels or calculation methodology required
 - RF Energy levels calculated at 0.014% of standard at nearest residence lot boundary
 - Highest level calculated is at 140' feet from the site at 0.028%
 - Please note that both of these values are greater than 3,500 times below the FCC standard for electromagnetic energy exposure
 - Detailed RF Emissions Study developed, provided to Township, and available for review at Township

(1) See FCC Resolution of Notice of Inquiry, Second Report and Order: FCC 19-126

HALF MOON TOWER BID

- BID SCHEDULE
 - 5/11/2026 - Bid Release Date
 - 6/7/2026 - Non-Mandatory bid walk
 - 6/14/2026 – Vendor questions received
 - 6/17/2026 - Vendor questions answered
 - 6/24/2026 - Bids Received