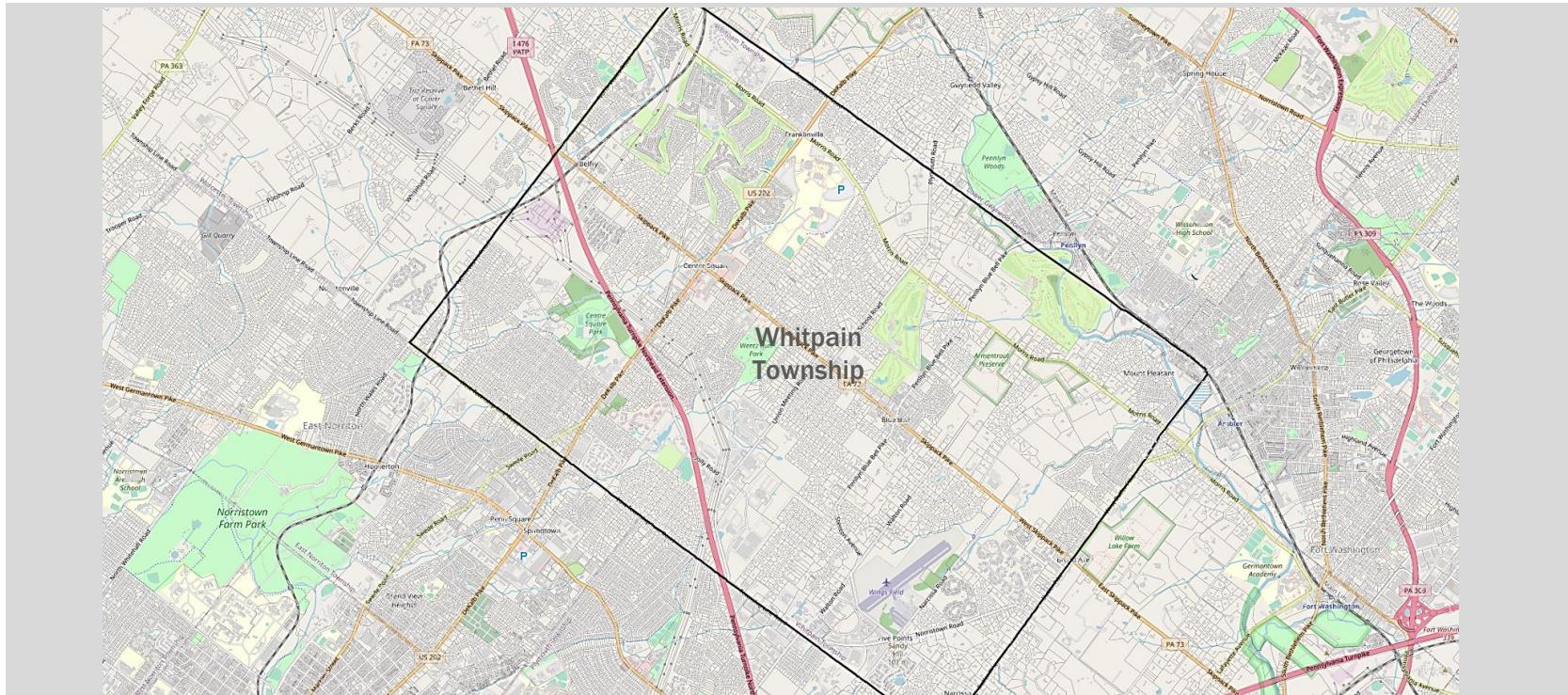




# Whitpain Township Residential Absorption Analysis

## *Whitpain Township, PA*

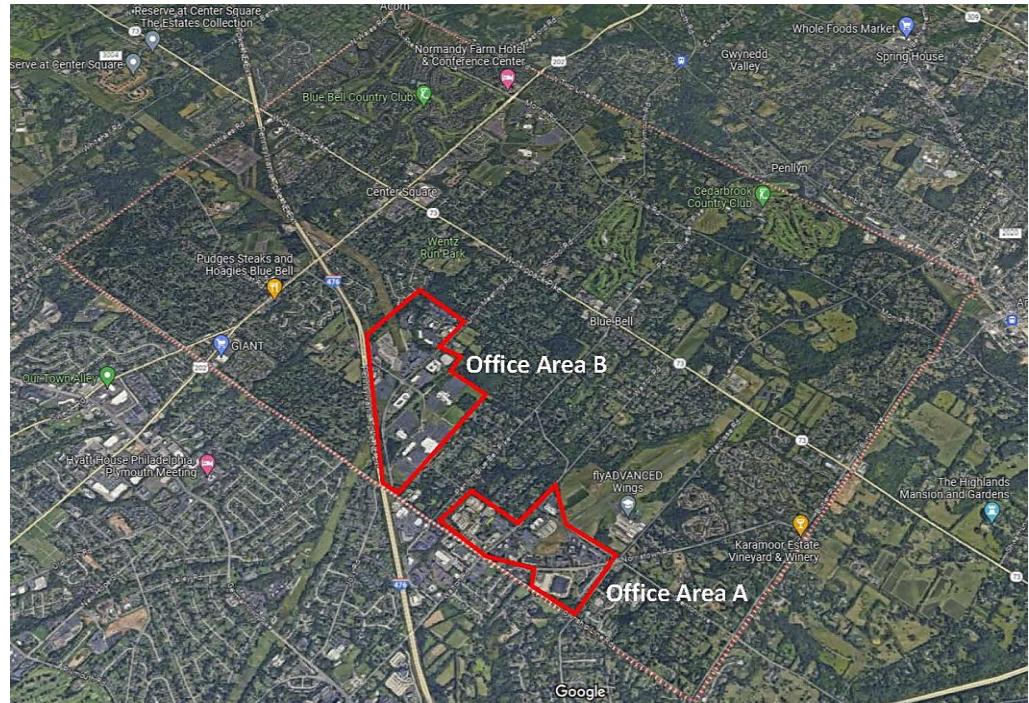
November 26, 2023



ECONOMIC AND REAL ESTATE ANALYSIS FOR SUSTAINABLE LAND USE OUTCOMES™

## Project Background: Background & Purpose

Whitpain Township retained Simone Collins Landscape Architecture (SC) to complete a limited update to its 2014 Comprehensive Plan. One area of plan update's focus is the township's southeast quadrant. The Township has, in recent months, received several inquiries from owners of office properties in the area about possible conversions of buildings and/or sites to residential uses. As post-pandemic remote work trends continue, it appears rising office vacancy rates will persist in the coming years - a threat to the continued viability of these office uses. 4ward Planning was retained by SC to perform a high-level residential unit absorption analysis, covering the next five to 10 years, for possible office-to-residential conversions in the study area.



Existing office park areas within Whitpain Township

## Key Findings: Market Findings

### **A very desirable community, but relatively few new housing units developed.**

- With just 638 Township workers also living in the Township, and 3,508 Township workers commuting more than 25 miles to work, there is likely pent-up housing demand, as some workers may trade a long commute if quality housing were available in Whitpain Township. Despite this pent-up demand, there are only two residential conversion projects presently being conceptualized. However, based on other inquiries to the township, there are likely more possible projects being considered. According to feedback from local real estate professionals, while the Township is a very desirable community and there is strong demand for multi-family development targeted to millennials and empty nesters, housing supply is lagging housing demand due to developer barriers to entry and relatively high land costs.

### **The Township could accommodate between 970 and 1,210 units by 2033.**

- Based on the housing supply/demand analysis conducted for the primary market area, the Township could accommodate between 850 and 1,060 units by 2028 or between 970 and 1,210 units by 2033. These estimates are conservative based on feedback from local real estate professionals who suggested the Township could support 300 to 500 units annually in the coming years. It should be noted that some of the real estate professionals interviewed indicated a slight uptick in rental unit vacancies - a regional and national trend likely to increase in the coming two years due to overdevelopment of multi-family rental units over the past two-years. In some markets, rising rental vacancies will depress absorption rates.

## Key Findings: Market Findings (continued)

### 25 to 30 apartment units per month can be absorbed.

- According to feedback from local real estate professionals, the average monthly absorption rate in the area has been between 20 and 30 rental units per month for several years and can be up to 40 rental units per month in attractive housing markets like Whitpain Township. For example, assuming an average monthly absorption of 25 rental units per month and a natural four percent unit vacancy rate to allow for natural housing turnover, a hypothetical 100 unit apartment building could be fully leased on four months.

### 36 townhome units per year can be absorbed.

- Based on feedback from developers, a single-family housing development project, such as a townhouse development, could see an average sales pace of three per month or 36 per year.

### New multi-family is targeting households earning \$76,000 to \$180,000.

- Based on the two new apartment projects preparing to be leased in the PMA (Madison West Elm and Ember at Berwyn), new multi-family projects are likely targeting households with annual household incomes ranging from \$76,000 to \$180,000 (assuming monthly asking rent ranges represent 30 percent of a household's income).

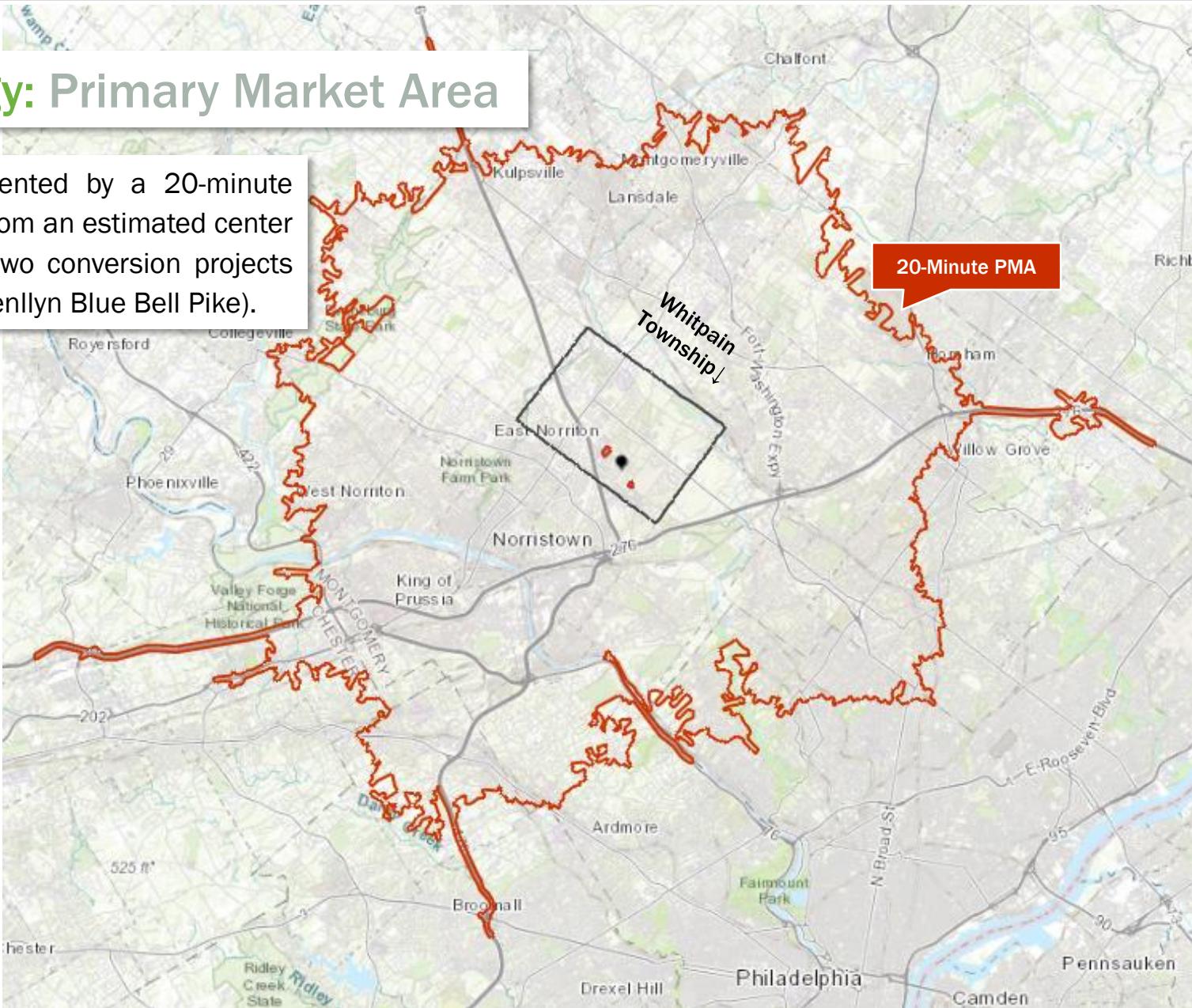
## Methodology: Residential Absorption Analysis

Since near-term housing demand is often driven by new household formation and pent-up demand from commuting workers, 4ward Planning used Esri (a proprietary socio-economic analysis application) population, household, and housing estimates for 2023 and projections for 2028. Projections were extended through 2033, applying 2023 to 2028 annualized rates provided by Esri for population, household, and housing. Population projections provided by Esri (which are based on 2020 U.S. Census population counts and pipeline development projects) were compared to those previously provided by the Delaware Valley Regional Planning Commission (which are based on 2015 Census population estimates). Data on primary job workers was based on 2020 data provided by U.S. Census Bureau (the last year provided at this geography level) and projected through 2033, based on average 2020 to 2030 industry employment growth rate projections provided by the Pennsylvania Department of Labor and Industry for Montgomery County.

To better understand new multi-family housing being developed in the primary market area (PMA), new construction and proposed multi-family projects in the Philadelphia Metro market were identified based on second-quarter 2023 data provided by Berkadia, a commercial real estate firm. Data for the two possible office-to-residential projects in the Township was added to pipeline data since it wasn't included in the Berkadia data. Based on starting rents for new multi-family projects in the PMA, 4ward Planning identified likely household income ranges associated with new multi-family development in the Township. Based on feedback from local multi-family developers, we identified a reasonable average annual absorption rate (for multi-family and townhouse units per month) associated with proposed conversion projects in the Township. To help ground-truth data analysis findings, quantitative analysis was supplemented by interviews with real estate professionals knowledgeable with the local residential market. Projected unmet housing demand was projected for the PMA through 2033 based on the assumptions provided on the following page.

## Methodology: Primary Market Area

The PMA is represented by a 20-minute drive-time contour from an estimated center point between the two conversion projects (Deaver Drive and Penllyn Blue Bell Pike).



# Methodology: Key Supply/Demand Analysis Assumptions

## Households expected to grow by 7,670 units by 2028

Esri projects that total households within the PMA will increase by 3,790 units from 2023 to 2028 (by 0.34 percent per year). Assuming a constant annualized households growth rate, the number of total households within the PMA will increase by another 3,880 households from 2028 to 2033.

## Housing inventory expected to grow by 7,710 units by 2028

Esri projects that total housing units within the PMA will increase by 3,860 units from 2023 to 2028 (by 0.33 percent per year). Assuming a constant annualized housing growth rate, the number of total housing units within the PMA will increase by another 3,850 units from 2028 to 2033.

## PMA will Maintain a Natural Average Annual Housing Vacancy Rate of Four Percent

These units represent the supply of units in a given market that are not leased or occupied, allowing for housing turnover.

## Remaining Vacant Housing within the PMA is Physically Obsolete or Unmarketable

The PMA's current vacancy rate of 5.6 percent, given an assumed naturally occurring rate of 4.0 percent, suggests 1.6 of the 5.6 rate represents housing units which are vacant due to need for major repairs, foreclosure, or other personal reasons.

## Employment Growth Based on Average Annual Growth Rate of 1.0 Percent over 2020 Base Employment

Based on 2020 primary worker data provided by the U.S. Census Bureau and average 2020 to 2030 industry employment growth rate projections provided by the Pennsylvania Department of Labor and Industry for Montgomery County, primary workers within the PMA are expected to increase by 36,230 from 2023 to 2033 (by 1.0 percent per year).

## Five of Every 100 PMA Workers Would Trade Commute for Adequate Housing Choice

Currently, approximately 22 out of every 100 primary workers commute from outside the PMA. It is assumed that five out of every 100 of these workers would trade their commutes if adequate housing choice was available.

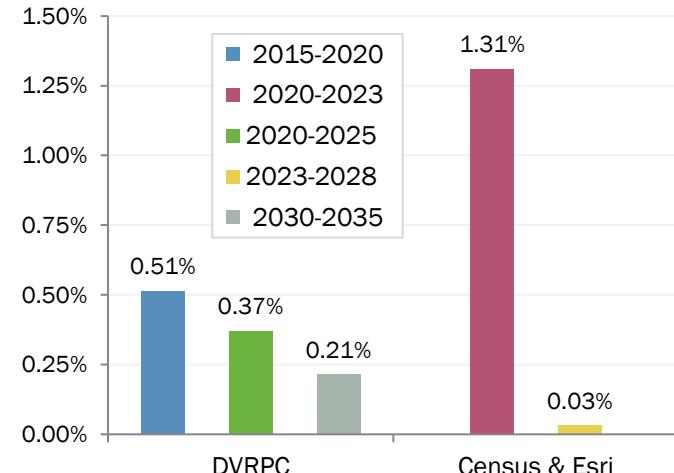
## 1.0 Percent of the PMA's Remaining Housing Stock Becomes Obsolete Annually

All housing stock gradually wears out over time, and, on average, one out of every 100 units becomes obsolete annually.

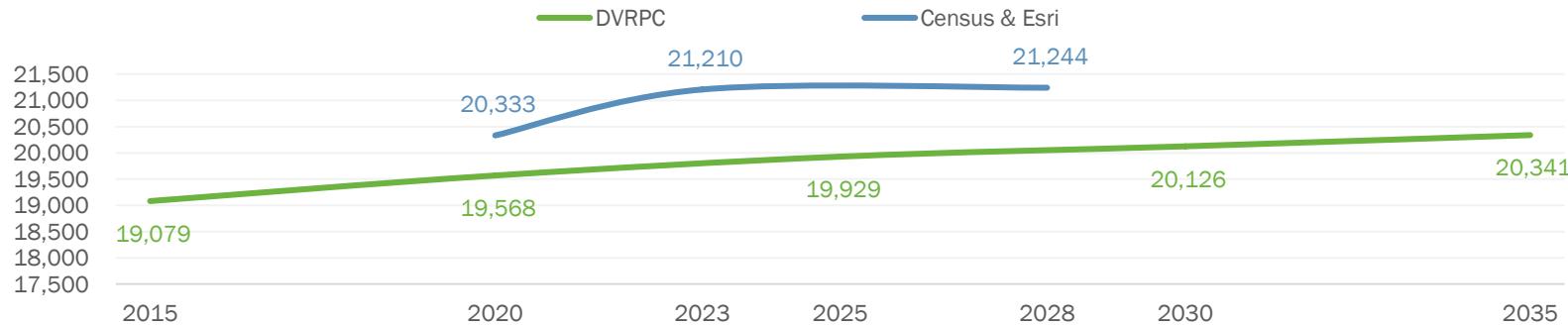
## Population Estimates & Forecasts: Whitpain Township

The table below compares five-year increment population projections estimates according to those provided by the Delaware Valley Regional Planning Commission (which are based on 2015 Census population estimates) with those provided by Esri (which are based on 2020 U.S. Census population counts and pipeline development projects). As illustrated below, population counts from the 2020 U.S. Census were higher than estimates projected by DVRPC in 2016.

Annualized Percent Change: Whitpain Township



### Population Estimates & Projections: Whitpain Township



Source: U.S. Census Bureau; Esri; 4ward Planning Inc., 2023

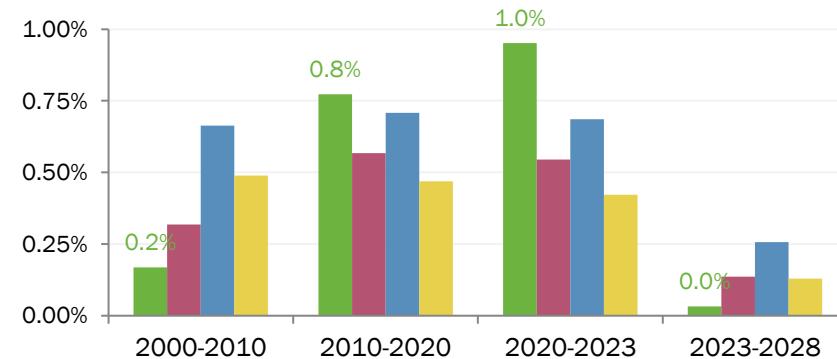
# Total Population

According to 2023 estimates provided by Esri, there are 21,210 people living in Whitpain Township and 560,686 people living in the 20-minute PMA. Although the Township experienced recent modest population growth from 2020 to 2023 (growing by 1.0 percent per year or by 877 persons), Esri projects that population growth in the Township will be relatively flat through 2028 (growing by just 0.03 percent per year or by 34 people), absent significant investment (other than what is already in the pipeline). Esri projects the rate of annualized population growth will be slightly stronger in the PMA and Montgomery County, but relatively flat as well.

Strong Positive Growth	Greater than	1.50%		annually
Modest Positive Growth	Between	1.50%	and	0.75% annually
Flat Growth	Between	0.75%	and	-0.75% annually
Modest Negative Growth	Between	-0.75%	and	-1.50% annually
Strong Negative Growth	Less than	-1.50%		annually

## Annualized Percentage Total Change

Whitpain Township      20-Minute PMA  
Montgomery County      Philadelphia MSA



## Total Population Estimates & Projections

	Total Population			Population Change			Annualized Population Growth Rate
	2023	2028	2033	2023-2028	2028-2033*		
Whitpain Township	21,210	21,244	21,276	34	32		0.03%
20-Minute PMA	560,686	564,494	568,457	3,808	3,963		0.14%
Montgomery County	871,229	882,409	893,940	11,180	11,531		0.26%
Philadelphia MSA	6,292,945	6,333,683	6,374,959	40,738	41,276		0.13%

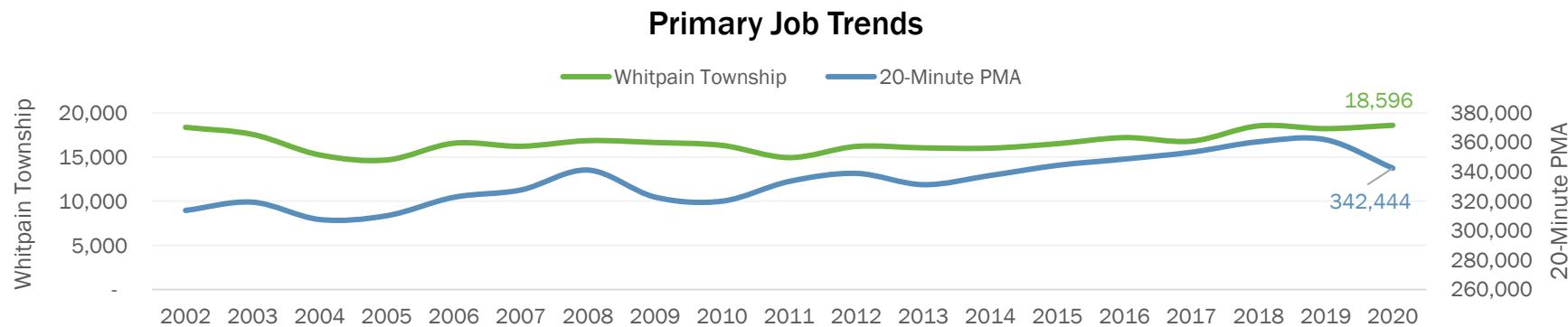
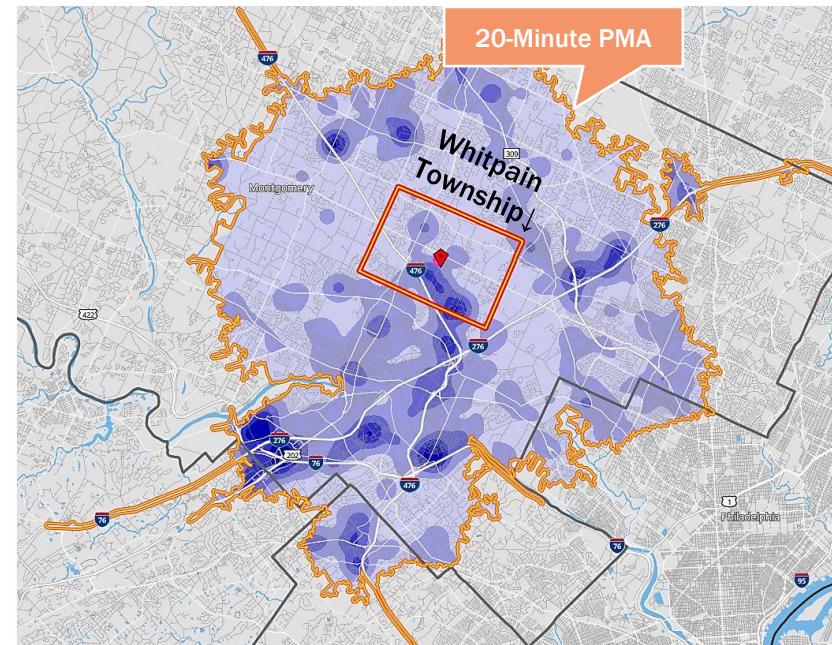
\*Estimates for 2033 are based on Esri's projections for 2028 and assumes a continued constant annualized growth rate through 2028.

Source: U.S. Census Bureau; Esri; 4ward Planning Inc., 2023

## Primary Jobs

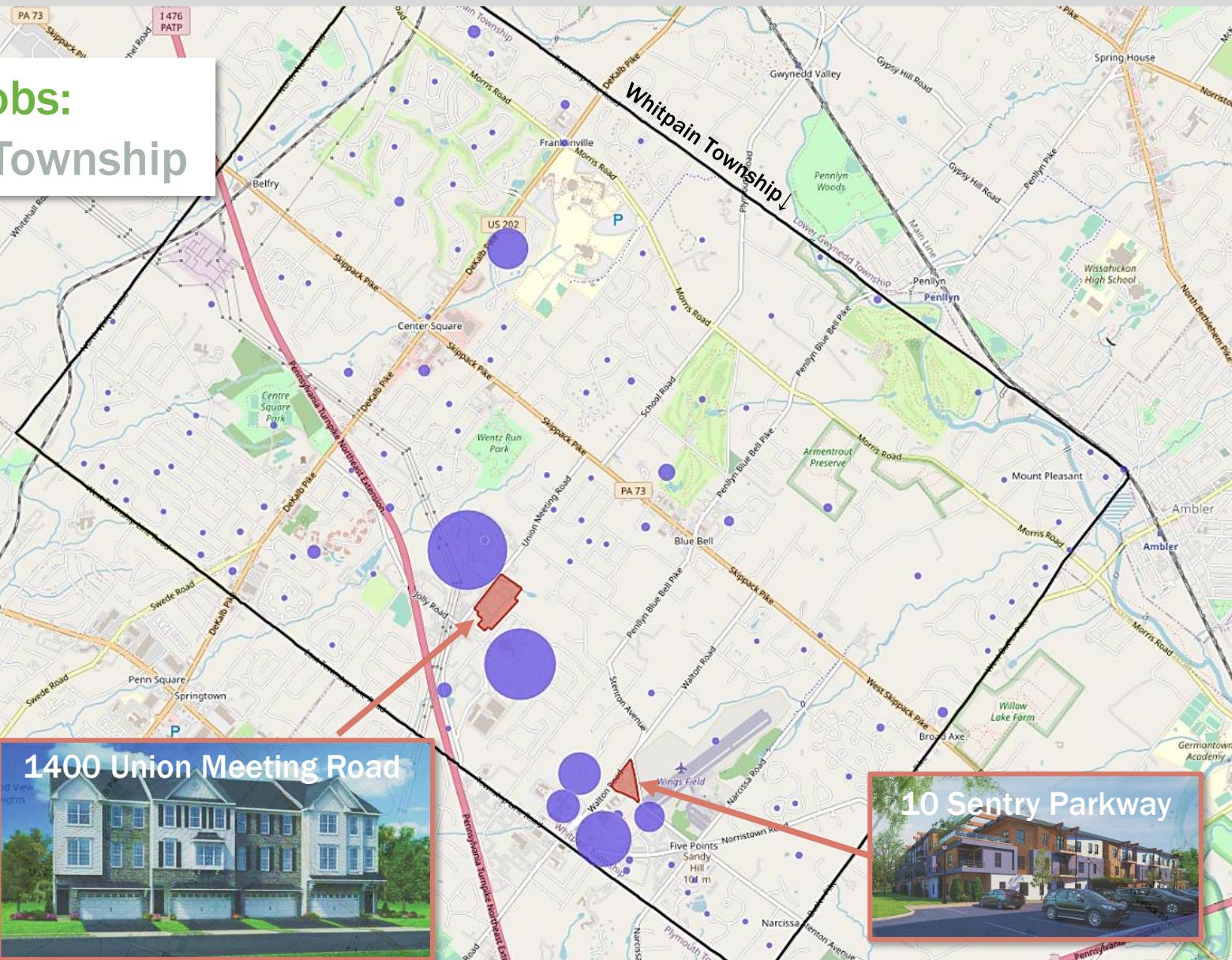
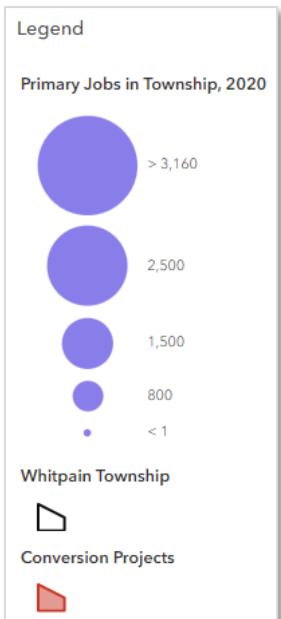
A primary job represents the highest paying job (if more than one job is held) for an individual worker for the year, and its count is equivalent to the total number of workers. According to primary job estimates provided by the U.S. Census Bureau for 2020 (the latest year available), there are approximately 18,600 primary jobs in Whitpain Township and 342,440 primary jobs in the PMA. As illustrated to the right (and in more detail on the following page), primary jobs are largely clustered in the southern portion of the Township, along Interstate 476 (I-476) close to the proposed office-to-residential conversion projects, making them attractive locations for commuting workers preferring to live near work.

### Primary Jobs: 20-Minute PMA, 2020



Source: U.S. Census Bureau, Center for Economic Studies, LEHD

# Primary Jobs: Whitpain Township

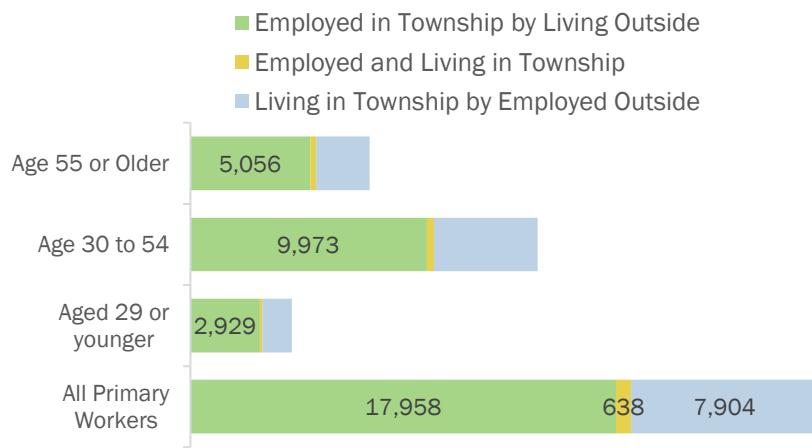


Source: U.S. Census Bureau, Center for Economic Studies, LEHD; ArcGIS

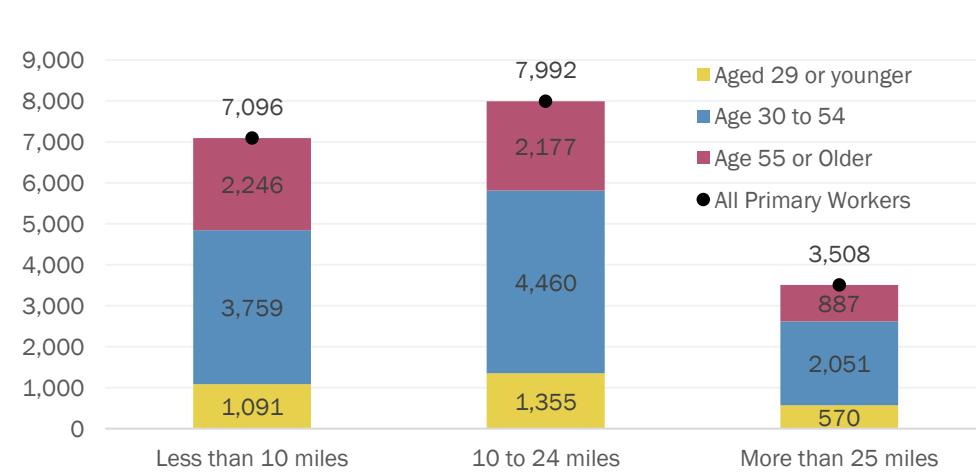
## Worker Travel Patterns: Whitpain Township

Some portion of primary job workers commuting into an area represent pent-up housing demand, as some may trade a long commute for housing closer to work. In 2020, 17,958 workers commuted into the Township for work (56 percent between ages 30 and 54), and 7,904 residents commuted outside the Township for work (an overall net inflow of workers). With just 638 Township workers also living in the Township, and 3,508 persons employed within the Township and commuting more than 25 miles to work, there is likely some percentage of these workers representing pent-up housing demand. Accommodating new, multi-family development and townhouse units in the Township could appeal to both younger and older workers looking to live closer to their places of employment.

### Workers Inflow/Outflow by Primary Jobs, 2020



### Commuting Distance to Work in Township, 2020



Source: U.S. Census Bureau, Center for Economic Studies, LEHD

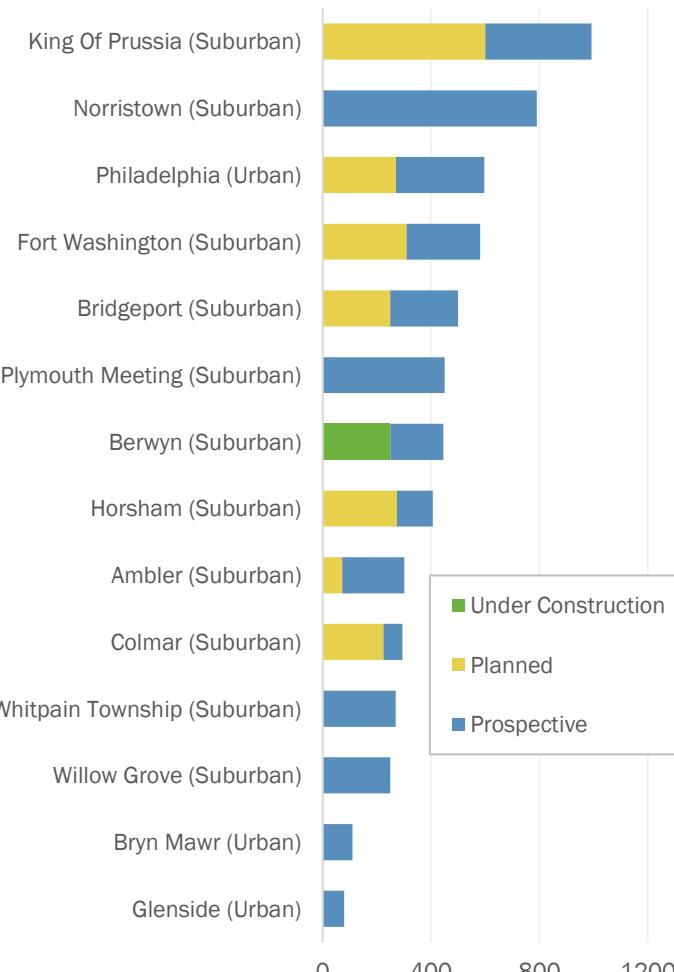
# Multi-Family Project Pipeline: Metro & PMA, 2Q 2023

According to second-quarter 2023 new construction and proposed multi-family project data provided by Berkadia (a commercial real estate firm) and prospective office-to-residential conversion projects for Whitpain Township, there are approximately 7,330 units in the development pipeline in the 20-minute PMA, representing 8.6 percent of those in the Philadelphia Metro market (84,760 units). Approximately 5,280 of these units in the PMA are classified as being within the suburban market (those most comparable to proposed conversion projects in the Township). Based on current phases, approximately 600 units are under construction (with forecasted completion expected in early 2024), 2,600 are planned units, and 4,130 are prospective units. It should be noted that not all planned or prospective units will ultimately be built. There are two possible office-to-residential conversion projects in Whitpain being suggested by developers.

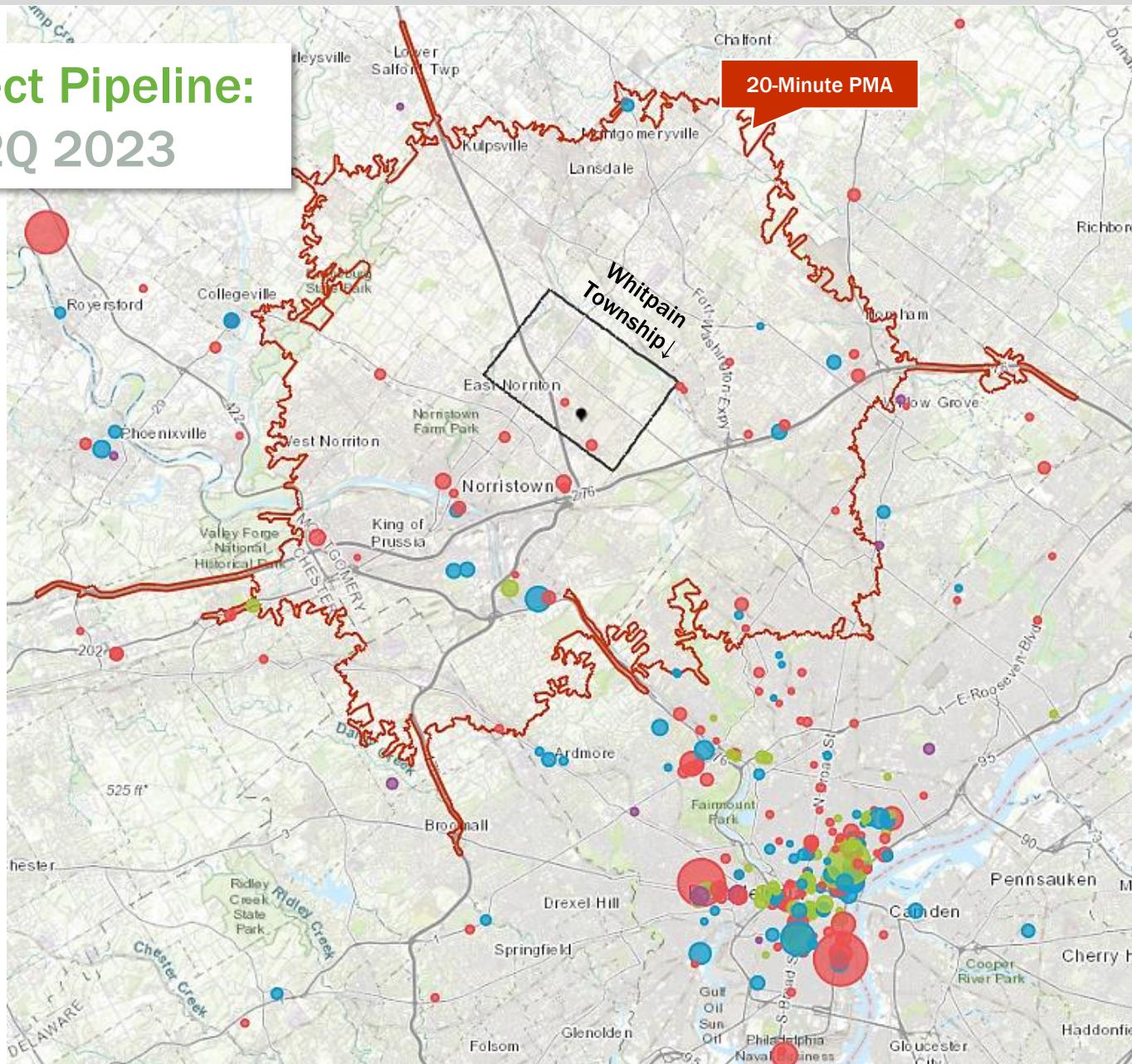
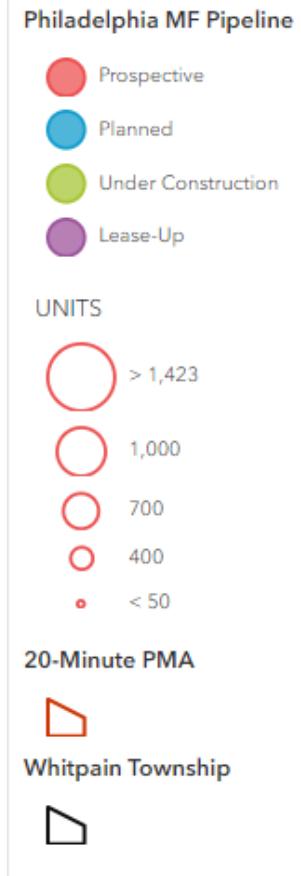
Market	Submarket	Lease-Up	Under Construction	Planned	Prospective	Total
Philadelphia Metro Market	Suburban	2,649	1,568	9,441	24,128	37,786
	Urban	1,447	9,159	14,713	21,659	46,978
	<b>Total Metro</b>	<b>4,096</b>	<b>10,727</b>	<b>24,154</b>	<b>45,787</b>	<b>84,764</b>
20-Minute PMA	Suburban	-	250	1,731	3,302	5,283
	Urban	-	348	869	828	2,045
	<b>Total PMA</b>	<b>-</b>	<b>598</b>	<b>2,600</b>	<b>4,130</b>	<b>7,328</b>

Source: Berkadia, Philadelphia – Urban & Suburban | New Construction & Proposed Multifamily Projects, 2Q 2023; Whitpain Township

## Multi-Family Pipeline: 20-Minute PMA, 2Q 2023



# Multi-Family Project Pipeline: 20-Minute PMA, 2Q 2023



Source: Berkadia, Philadelphia – Urban & Suburban | New Construction & Proposed Multifamily Projects, 2Q 2023; Whitpain Township

# Multi-Family Project Pipeline: 20-Minute PMA, 2Q 2023 (continued)

Name	Market	Submarket	Location	Status	Units	Permit Date	Forecasted Completion Date
Madison West Elm	Urban	Conshohocken	Conshohocken	Under Construction	348	3/11/2022	3/31/2024
Ember at Berwyn	Suburban	Delaware	Berwyn	Under Construction	250	5/20/2022	2/29/2024
Madison Fort Washington	Suburban	Ambler	Fort Washington	Planned	310	-	-
401 Washington Street	Urban	Conshohocken	Conshohocken	Planned	598	-	-
723 Dresher Road	Suburban	Horsham	Horsham	Planned	274	-	-
Maple Glen Pointe	Suburban	Horsham	Ambler	Planned	72	-	-
2501 Renaissance Blvd	Suburban	King Of Prussia	King Of Prussia	Planned	300	-	-
2901 Renaissance Blvd	Suburban	King Of Prussia	King Of Prussia	Planned	300	-	-
Bridgeview	Suburban	King Of Prussia	Bridgeport	Planned	250	-	-
Luxor Montgomeryville	Suburban	Lansdale	Colmar	Planned	225	-	-
Germantown Avenue	Urban	Northwest - East	Philadelphia	Planned	114	-	-
Ridge Avenue	Urban	Northwest - West	Philadelphia	Planned	80	-	-
The Royale	Urban	Northwest - West	Philadelphia	Planned	77	-	-
Keswick Commons Phase II	Urban	Abington	Glenside	Prospective	80	-	-
Ambler Station	Suburban	Ambler	Ambler	Prospective	50	-	-
The Ambler	Suburban	Ambler	Ambler	Prospective	92	-	-
The Dublin	Suburban	Ambler	Fort Washington	Prospective	171	-	-
The Woods Phase II	Suburban	Ambler	Ambler	Prospective	88	-	-
Virginia Drive	Suburban	Ambler	Fort Washington	Prospective	100	-	-
Bryn Mawr Square	Urban	Ardmore	Bryn Mawr	Prospective	110	-	-
Conshohocken	Urban	Conshohocken	Conshohocken	Prospective	256	-	-
Dryden Court	Urban	Conshohocken	Conshohocken	Prospective	56	-	-
Luxury Living	Suburban	Delaware	Berwyn	Prospective	196	-	-
104 Witmer	Suburban	Horsham	Horsham	Prospective	133	-	-
Executive Mews	Suburban	Horsham	Willow Grove	Prospective	250	-	-
King of Prussia Mall Renovation	Suburban	King Of Prussia	King Of Prussia	Prospective	50	-	-
River Pointe	Suburban	King Of Prussia	Bridgeport	Prospective	250	-	-
Royale Garden	Suburban	King Of Prussia	King Of Prussia	Prospective	342	-	-
Hatfield Station Senior	Suburban	Lansdale	Colmar	Prospective	70	-	-
410 Markley Street	Suburban	Norrisville	Norristown	Prospective	320	-	-
City View	Suburban	Norrisville	Norristown	Prospective	180	-	-
DeKalb Pike	Suburban	Norrisville	Norristown	Prospective	179	-	-
Midrise	Suburban	Norrisville	Plymouth Meeting	Prospective	300	-	-
One Plymouth	Suburban	Norrisville	Plymouth Meeting	Prospective	150	-	-
The Grand at Main & DeKalb	Suburban	Norrisville	Norristown	Prospective	111	-	-
102 East Mermaid Lane	Urban	Northwest - East	Philadelphia	Prospective	250	-	-
20 - 30 West Aliens Lane	Urban	Northwest - East	Philadelphia	Prospective	76	-	-

Source: Berkadia, Philadelphia – Urban & Suburban | New Construction & Proposed Multifamily Projects, 2Q 2023

## Household Income Ranges

According to Apartments.com, an apartment rental website, and confirmed by interviews with the property managers, the 348-unit Madison West Elm apartment project currently under construction has asking monthly rents ranging from approximately \$1,920 for a studio to \$4,470 for a two-bedroom unit, with move-ins expected for December 2023 through April 2024. Likewise, the 250-unit Ember at Berwyn apartment project currently under construction has asking monthly rents ranging from approximately \$1,910 for a studio to \$4,520 for a three-bedroom unit, with move-ins expected for the end of October 2023 through January 2024. If monthly asking rents represent 30 percent of a household's income (considered an affordable rent), these two new apartment projects in the PMA would likely attract households with annual household incomes ranging from \$76,000 to \$180,000.

### Asking Rents and Housing Income Range Estimates: Multi-Family Project Pipeline: 20-Minute PMA

Bedrooms	Price (Low)	Price (High)	Annual HH Income (30% of monthly income)	
<b>Madison West Elm</b>				
Studio	\$1,919	\$2,335	\$76,760	\$93,400
1-Bed	\$2,475	\$2,929	\$99,000	\$117,160
2-Bed	\$3,499	\$4,474	\$139,960	\$178,960
<b>Ember at Berwyn</b>				
Studio	\$1,910	\$1,965	\$76,400	\$78,600
1-Bed	\$2,000	\$2,640	\$80,000	\$105,600
2-Bed	\$2,665	\$3,730	\$106,600	\$149,200
3-Bed	\$4,265	\$4,520	\$170,600	\$180,800

Source: Apartments.com, 4ward Planning Inc. 2023

# Supply/Demand Analysis: Whitpain Township

Largely due to pent-up demand from primary workers who commute into the PMA and replacement of physically obsolescent housing, by 2028, there will be an estimated net demand for 4,840 residential units in the PMA. Assuming the Township could capture between 20 to 25 percent of the PMA's net housing demand, the Township could accommodate between 850 and 1,060 units by 2028 or between 970 and 1,210 units by 2033. These estimates are conservative based on feedback from local real estate professionals, who suggested the Township could support 300 to 500 units annually in the coming years.

## Net Dwelling Unit (DU) Demand and Capture through 2033

	2023	2028	2033
<b>Housing Demand Metrics</b>			
<i>Estimated Households in 20-Minute PMA (0.34% growth rate)</i>	222,390	226,180	230,060
Estimated Primary Workers in 20-Minute PMA (1% growth rate)	352,020	369,410	388,250
Estimated Primary Workers Residing Outside 20-Minute PMA (22%)	78,660	82,540	86,750
<i>Estimated Pent-Up Housing Unit Demand from Commuting Area Workers (5%)</i>	3,930	4,130	4,338
<i>Estimated Number of Naturally Occurring Vacant Housing Units (4%)</i>	9,430	9,580	9,738
<i>Estimated Aggregate Housing Unit Demand in 20-Minute PMA</i>	235,750	239,890	244,136
<b>Housing Supply Metrics</b>			
Estimated Housing Units in 20-Minute PMA (0.32% growth rate)	235,750	239,610	243,460
<b>Physically Obsolescent Units (1.6% of total units, 1% annual obsolescence rate)</b>	<b>3,770</b>	<b>3,960</b>	<b>4,162</b>
New Units Added in PMA	-	3,860	3,850
<i>Estimated Net Marketable Housing Units in 20-Minute PMA</i>	231,980	235,650	239,298
<b>Net Housing Demand/Supply Calculation</b>			
<i>Estimated Aggregate Housing Unit Demand in 20-Minute PMA</i>	235,750	239,890	244,136
<i>Subtract Estimated Net Marketable Housing Units in 20-Minute PMA</i>	231,980	235,650	239,298
<b>Net Housing Unit Demand/(Excess Units)</b>	<b>3,770</b>	<b>4,240</b>	<b>4,838</b>
<b>Township Unit Capture (20%)</b>	<b>754</b>	<b>848</b>	<b>968</b>
<b>Township Unit Capture (25%)</b>	<b>943</b>	<b>1,060</b>	<b>1,209</b>

Source: 4ward Planning Inc. 2023

## Projected Unit Absorption: Whitpain Township

According to feedback from local real estate professionals, Whitpain Township is a very desirable community with excellent schools and there is existing unmet housing demand for Class A multi-family development targeted to millennials and empty nesters looking for more space. The average apartment absorption rate in the local market area has consistently been between 20 and 30 rental units per month in recent years but, according to one interviewee, can be up to 40 rental units per month in attractive housing markets like Whitpain Township. At an estimated average sales pace of three units per month for townhomes, according one developer, a 30-unit townhome development project could be sold out in less than a year.

Assuming an average absorption of 25 rental units per month and a natural four percent unit vacancy rate to allow for turnover, a hypothetical 100-unit apartment building could lease up in four months.

### Proposed Office-to-Residential Conversion Unit Absorption

	10 Sentry Parkway	1400 Union Meeting Road
Type	Apartments	Townhomes
Total Proposed Units	180	90
Natural Vacancy Rate	4.0%	0.5%
Occupied Units	173	89
Average Absorption Rate	25-30/month	36/year
Time to Absorption	6-7 month	2.5 years

Source: 4ward Planning Inc. 2023

## Real Estate Professional Feedback

The following bullet points summarize the opportunities and challenges for office to residential conversion projects in the Township based on interview feedback.

### Opportunities:

- Whitpain Township is a very desirable community with excellent schools.
- There is existing housing demand for Class A multi-family development targeted to millennials and empty nesters looking for more space.
- Area average monthly absorption rates for rental units have been 20 and 30 units per month for several years and can even reach 40 units per month in attractive housing markets like Whitpain Township.
- Barring an adjacent community "mega boom," the Township could easily support a couple thousand rental units over next five years or 300 to 500 units annually for the coming years.
- Creating a greater mix of housing options, including active adult units, could be beneficial for the Township.

### Challenges:

- Barriers to entry and land costs are high for developers, which is partially why housing supply is dramatically lagging housing demand. Utilizing existing zoning could help alleviate this issue.
- There may be a slowdown in rental unit demand in the coming years, as the larger region has seen a boom in multi-family rental development.
- Adaptive reuse of office to residential can be cost-prohibitive, making demolition more cost-effective. However, some former office buildings (e.g., those with atriums) are suitable for adaptive reuse.
- Negative community perceptions of housing density should be addressed.

## Interviews: Real Estate Professionals

The following were interviewed for their perspectives of the local market, as well as for verification of data, where applicable:

### **Residential Developers**

- Peter Clelland, Vice President of Development, BET Investments, Dresher, PA
- David Della Porta, Partner, Cornerstone Tracy, Villanova, PA
- Brian Thierrin, Senior Vice President, PA-DE, Toll Brothers, Philadelphia, PA

### **Realtors**

- Ryan Godshall, Realtor/Director of Sales, Keller Williams Real Estate, Harleysville, PA
- Michael Maerten, Agent, Keller Williams, Blue Bell, PA

### **Property Managers**

- Ember at Berwyn, Berwyn, PA
- Korman Communities (Blue Bell Villas Townhomes, AVE Blue Bell Apartments)
- Madison West Elm, Conshohoken, PA



For more information, please contact:

Todd Poole  
267.480.7133  
[tpoole@landuseimpacts.com](mailto:tpoole@landuseimpacts.com)