DELAWARE VALLEY dvrpc REGIONAL PLANNING COMMISSION

ADR026 I April 2020

Analytical Data Report

Land Use in the Delaware Valley, 2015

Enhanced Land Use Data

DELAWARE VALLEY li..data

The Delaware Valley Regional Planning Commission is the federally designated Metropolitan Planning Organization for a diverse nine-county region in two states: Bucks, Chester, Delaware, Montgomery, and Philadelphia in Pennsylvania; and Burlington, Camden, Gloucester, and Mercer in New Jersey.

DELAWARE VALLEY dvrpc REGIONAL PLANNING COMMISSION

DVRPC's vision for the Greater Philadelphia Region is a prosperous, innovative, equitable, resilient, and sustainable region that increases mobility choices by investing in a safe and modern transportation system; that protects and preserves our natural resources while creating healthy communities; and that fosters greater opportunities for all.

DVRPC's mission is to achieve this vision by convening the widest array of partners to inform and facilitate data-driven decision-making. We are engaged across the region, and strive to be leaders and innovators, exploring new ideas and creating best practices.

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DVRPC is funded through a variety of funding sources including federal grants from the U.S. Department of Transportation's Federal Highway Administration (FHWA) and Federal Transit Administration (FTA), the Pennsylvania and New Jersey departments of transportation, as well as by DVRPC's state and local member governments. The authors, however, are solely responsible for the findings and conclusions herein, which may not represent the official views or policies of the funding agencies.

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Background

Land use information and analysis is a fundamental tool in the planning process. Since 1970, DVRPC has produced land use files for the nine-county Greater Philadelphia region, based on information derived from aerial photography. Originally updated every ten years, since 1990 DVRPC's land use data has been updated based on aerial surveillance gathered every five years. For the 2015 aerial photography a more detailed set of land uses have been created. The reason for this change was to create a more thorough and standardized land use product to support DVRPC's goals for more detailed analyses into the future.

This analytical data report (ADR) summarizes the second of two DVRPC 2015 land use products. The preliminary 2015 land use product was described in DVRPC publication ADR024. Like other land use data reported in five-year increments since 2000, the preliminary 2015 product classified land uses into 31 separate categories. This report summaries the final 2015 product, the *enhanced land use* dataset. The enhanced land use data delineates land uses into a more comprehensive and detailed set of 73 uses. Table 1 lists the 13 parent categories of the enhanced land use dataset and its 73 subcategories. There are 41 non-parking subcategories for which 32 have a corresponding parking use.

Table 1: Enhanced Land Use Data Categories and Subcategories

Parent Category	Subcategories	
Residential	Residential: Single-Family Detached	Residential: Mixed-Use *
	Residential: Multifamily *	Residential: Mobile Home *
Industrial	Industrial: General *	Industrial: Warehousing/Distribution/Open Storage *
	Industrial: Mixed-Use *	
Transportation	Transportation: Facility *	Transportation: Rail Right-of-Way
	Transportation: Highway Right-of-Way	Transportation: Airport *
	Transportation: Roadway	
Utility	Utility: Right-of-Way	Utility: Other Facility *
	Utility: Landfill *	Utility: Recycling *
	Utility: Wastewater Treatment *	
Commercial	Commercial: General *	Commercial: Mixed-Use *
	Commercial: Shopping Mall *	Commercial: Office *
	Commercial: Regional & Community Retail Center *	Commercial: Hotel/Motel *
	Commercial: Single Large-Site Retail *	Commercial: Public Storage *
Institutional	Institutional: General *	Institutional: Religious *
	Institutional: Medical *	Institutional: Correctional Facility & Detention Center *
	Institutional: Education *	Institutional: Cemetery *
Military	Military *	
Recreation	Recreation: General *	Recreation: Golf Course *
Agriculture	Agriculture *	
Mining	Mining *	
Wooded	Wooded	
Undeveloped	Undeveloped: General	Undeveloped: Transitional Land
	Parking - Undeveloped: Undetermined Use	Undeveloped: Drainage Basin
Water	Water	

** Subcategory has an associated parking subcategory.*
Source: DVRPC.

A key departure from all previous datasets and reports is the comprehensive delineation of all regional roadways in the enhanced land use data. Previous products did not delineate roadways with a right-of-way narrower than 60 feet in width. In addition to the wider classification of highway right-of-way use, the enhanced data has a new classification of Transportation: Roadway that captures facilities previously designated by adjacent uses. In prior ADRs an assumption was made that smaller roadway facilities were largely found in residential areas outside of Philadelphia and a greater mix of uses in Philadelphia. To approximate the unaccounted for, narrower roadways, the reports assumed that 25 percent of uses other than Military, Mining, and Water were Transportation in Philadelphia, and 25 percent of residential uses were transportation in the surrounding counties. This created a discrepancy between summary tables in the reports and what was downloaded as a Geographic Information Systems (GIS) dataset from DVRPC's GIS data portal. The comprehensive inventory of the region's roadways means GIS files will be consistent with summary tables in this report and future reports. Table 2 compares the percentage of uses assumed to be roadways in previous reports to the actual percentage of uses in roadways now delineated in the enhanced land use data.

Table 2: Actual Roadway Percentage of Land Use Classifications Compared to Assumptions from Prior Reports

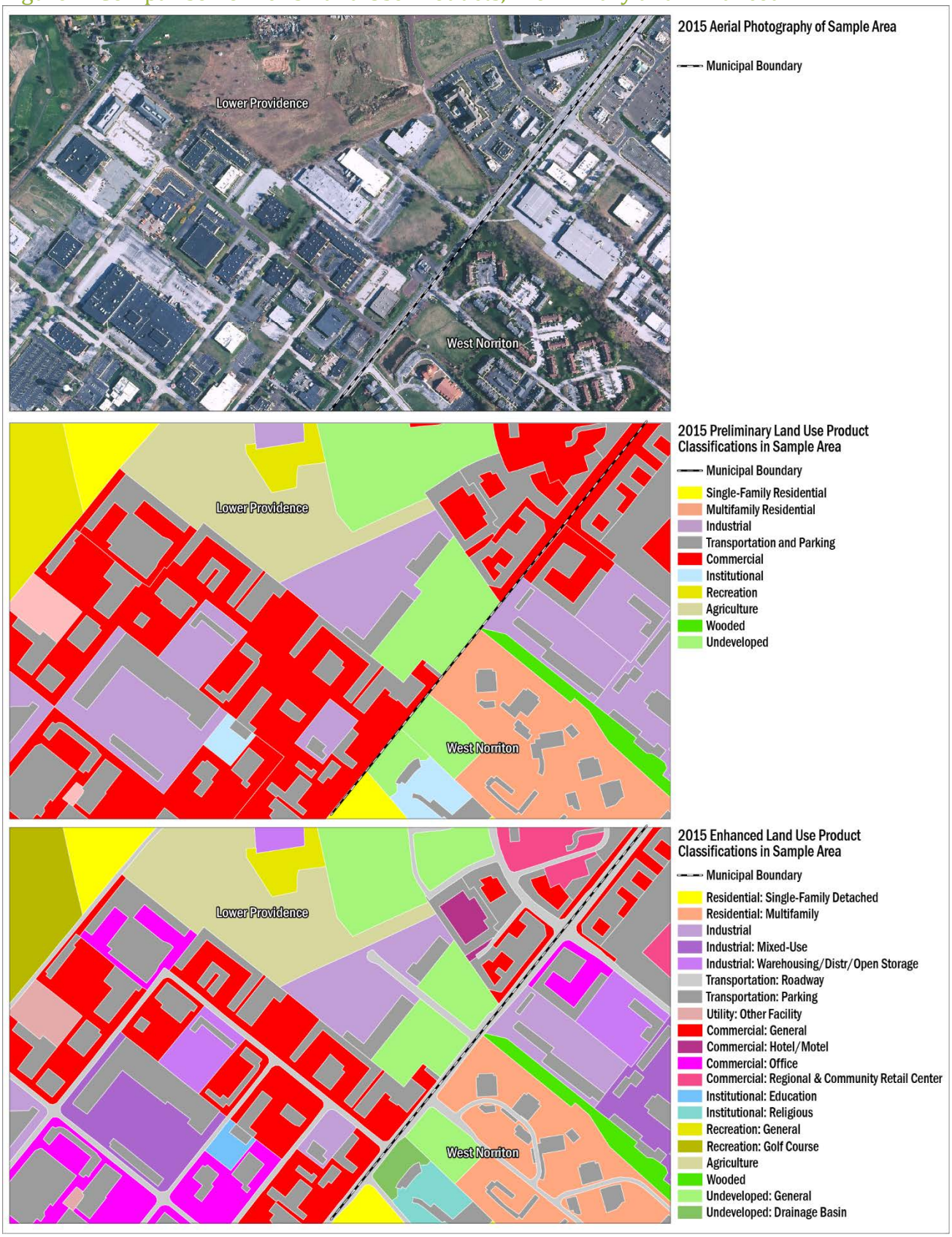
Former Parent Categories	Philadelphia		All Other Counties	
	Previous Assumption	Actual	Previous Assumption	Actual
Residential	25.0%	17.4%	25.0%	7.8%
Manufacturing	25.0%	5.1%	0.0%	3.2%
Utility	25.0%	3.2%	0.0%	1.5%
Commercial	25.0%	11.0%	0.0%	6.6%
Community Services	25.0%	8.4%	0.0%	4.5%
Military	0.0%	6.8%	0.0%	1.0%
Recreation	25.0%	5.8%	0.0%	2.2%
Agriculture	25.0%	3.8%	0.0%	1.0%
Mining	0.0%	8.8%	0.0%	0.6%
Wooded	25.0%	3.8%	0.0%	0.9%
Water	0.0%	0.0%	0.0%	0.1%

Source: DVRPC.

Mixed uses are one of the most requested enhancements to DVRPC land use data. Previously, mixed use was designated as Commercial. The enhanced land use file adds new residential, industrial, and commercial mixed-use subcategories, each paired with a parking subcategory. Residential: Mixed-Use land uses are multifamily buildings between five and ten stories with ground floor commercial. Commercial: Mixed-Use occurs in buildings between two and four stories tall with evidence of one or more residential units in one or more of the upper floors. Industrial: Mixed-Use typically occurs in 'flex' developments or business, industrial, and commercial parks where space can easily be converted between light industrial and commercial use.

Figure 1 shows a sample area where the preliminary and enhanced 2015 land use products differ in how they classify land use. Most notably, Transportation: Roadway is present with the enhanced data. Additionally, the Industrial: Mixed-Use had formerly been classified as Commercial. The map series also gives a sampling of the subcategories now found within parent categories.

Figure 1: Comparison of 2015 Land Use Products, Preliminary and Enhanced



Source: DVRPC.

Many land use data enhancements came by breaking larger categories into subcomponents. Along with decisions to add more detail, however, some simplifications were made.

- Residential added Residential: Mixed-Use, but folded Residential: Row Home into the Residential: Multifamily category.
- Industrial: General contains what was formerly classified as Manufacturing: Light Industrial and Manufacturing: Heavy Industrial.
- Industrial: Warehousing/Distribution/Open Storage was added along with Industrial: Mixed-Use to the Industrial parent category; both were previously classified as Commercial.
- Transportation is further classified into Transportation: Rail Right-of-Way, Transportation: Airport, Transportation: Facility (e.g., rail stations, rest stops, highway maintenance yards, intermodal facilities, etc.).
- Utility was split into Utility: Right-of-Way, Utility: Landfill, Utility: Wastewater Treatment, Utility: Recycling, and Utility: Other Facility.
- Commercial was further split into Commercial: Shopping Mall, Commercial: Regional and Community Retail Center, Commercial: Single Large-Site Retail, Commercial: Office, Commercial: Hotel/Motel, Commercial: Public Storage, or Commercial: General, beyond the new Commercial: Mixed-Use designation.
- Institutional (previously named “Community Services”) is broken into Medical, Educational, Religious, Correctional Facilities and Detention Centers, Cemeteries, and General Institutional.
- Recreation was split into Recreation: Golf Course and Recreation: General.
- Agriculture and Agriculture: Bog were consolidated into one Agriculture category.
- Vacant was renamed to Undeveloped, and adds Undeveloped: Drainage Basin, Undeveloped: Transitional Land, Undeveloped: General, and Parking - Undeveloped: Undetermined Use.

The following uses were not changed:

- Residential: Single-Family Detached;
- Residential: Mobile Home and Parking - Residential: Mobile Home;
- Military and Parking: Military;
- Parking - Agriculture;
- Mining and Parking - Military;
- Wooded; and
- Water.

For more information on what changed from the preliminary 2015 product to the enhanced product, as well as the three-phase methodology used for delineating these more detailed uses, see Appendix A. Table A-4 in Appendix A provides a direct crosswalk between the enhanced land use categories and the preliminary dataset.

DVRPC's Previous Land Use Files

DVRPC produced an extensive land use data file and regional land use map in the early 1970s based on the Department of Housing and Urban Development/Bureau of Public Records (HUD/BPR) classification system. The 1970 land use file included 88 separate land use categories (later modified to a total of 98 categories), which were then grouped into 12 major categories. The data was tabulated by census block (over 66,000 aerial units), and the resulting file contained over one million separate entries. The data was then mapped at a scale of one inch to one mile, necessitating the generalization of the original data into units that were appropriate for mapping.

The 1970 land use file was updated in the early 1980s using a very limited method, by aggregating the land use data to 14 major categories and updating only the development changes on parcels of 25 acres or more. While this interim product provided a crude data base and map, it was subsequently noted that up to one-third of all development changes over the decade were on small parcels not captured by the large parcel limit. Historical comparisons between the 1980 files and any other DVRPC land use file are, therefore, not recommended.

The acquisition of Computer Assisted Mapping (CAM) and GIS software in the early 1990s significantly altered DVRPC's production of land use data. In 1991, the Commission completed a digital land use file based on aerial photography gathered in April and November 1990. Land use was interpreted in 14 separate categories from 1,330 aerials at a scale of one inch to 400 feet. The annotated photographs were digitized to create CAM line work which was registered to USGS quad maps. Each area was annotated with its land use classification and the results incorporated into the DVRPC CAM/GIS system.

In 1998, DVRPC completed and released land use information based on the interpretation of aerial photographs taken in the spring of 1995. Land uses were delineated in 17 separate categories based on 1,330 photo atlas sheets at a scale of one inch to 400 feet, and again digitized to create CAM line work registered to USGS one-inch-to-2,000-feet quad maps. Simultaneously, the 1990 land use files were revised after a review of the original files identified some inconsistencies in the detail for parking and some other small parcels. At that time, DVRPC staff also decided that it would be useful to attach parking to its related land use to allow an alternative method of data organization and make the 1990 file consistent with the categories used in the 1995 land use file.

Because of these changes in the way land uses were classified, data from the initial 2015 land use product should not be compared to any DVRPC land use data issued prior to Data Bulletin #58: 1995 and Revised 1990 Land Use by Minor Civil Division (August 1998). The use of digital orthophotography beginning in 2000 and the addition of color to the aerials in 2005 allowed more accurate land use interpretation, particularly when differentiating between various developed uses. While reasonable comparisons can be drawn between DVRPC's land use files, users should be cautious when comparing files produced in 2005 or later with earlier land use data—particularly within specific developed land use categories and/or specific municipalities.

Important Notes on Enhanced Land Use Dataset Use and Future Reports

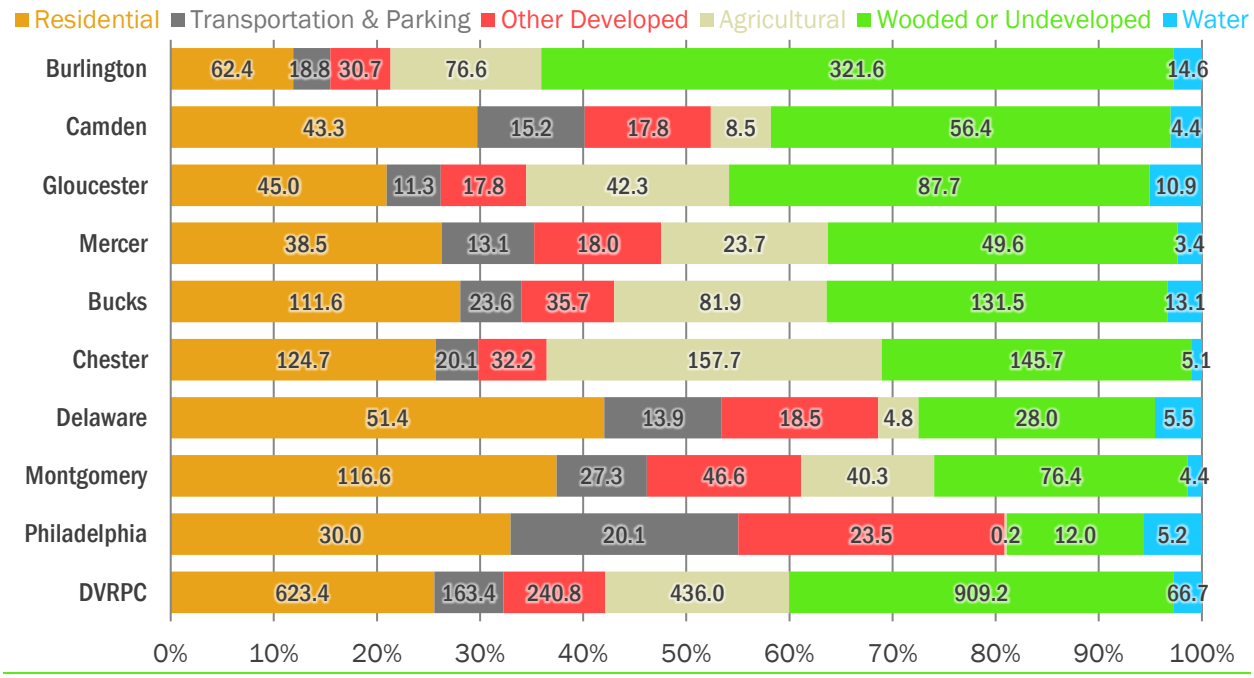
The enhanced land use data is a departure from the preliminary 2015 product, and all earlier products. Despite some overlap in the land use classification and data capture criteria for each effort, the preliminary and enhanced datasets do not completely correlate to one another due to the more detailed classification in the latter, changes in the categorization of some land use features from preliminary to enhanced, and revisions to the original DVRPC data capture criteria. Comparisons with previous products are problematic and discouraged. Therefore this report does not examine trends in land use shifts from earlier products compared to the enhanced data. Limited comparisons are drawn between the preliminary 2015 and the enhanced 2015 data to illustrate differences between the datasets and the enhancements made.

Going forward, DVRPC will continue to publish future land use files using the enhanced land use methodology, but without the "enhanced" nomenclature.

2015 Enhanced Land Use

DVRPC's 2015 land use files are based on digital orthophotography created from aerial surveillance completed in the spring of 2015. Figure 2 summarizes the portions of county and regional land classified as Residential; combined Transportation and Parking; Other Developed; Agriculture; and Wooded or Undeveloped land; and Water in 2015. Delaware County had 42 percent of its total land in Residential uses, exceeding all the other counties in percentage of Residential land. Philadelphia ranked highest in percentage of land use for Transportation and Parking, as well as percentage of Other Developed uses. Other Developed includes Industrial, Utility, Commercial, Institutional, Military, Recreation, and Mining uses. These uses made up nearly half of Philadelphia's area. Chester County had the greatest percentage (32.5 percent) and acreage (more than 157,000 acres) of Agriculture land. And Burlington County had the highest share of Wooded or Undeveloped land (more than 60 percent of its land area), primarily in the Pinelands region.

Figure 2: 2015 Enhanced Land Use Summary (by Thousands of Acres and Percentage of Total)



Bar segment labels represent area in thousands of acres while the x-axis shows the percentage distribution of acreage. Source: DVRPC.

Figure 3 shows the spatial distribution of these same categories on a regional map. For further detail of mapped uses refer to the county-level maps in Appendix B.

Tables 3 and 4 summarize the acreage, by total and percentage of total, for additional land use categories by county. With over 5,800 acres of Montgomery County has the greatest area of Industrial land in the region—but Philadelphia has the highest percentage, with 5.8 percent. Montgomery also has the greatest area of combined Transportation, Parking, and Utility area in the region (32,139) and Commercial acreage (9,247). Due to the presence of much of Joint Base McGuire-Dix-Lakehurst, Burlington ranks highest for combined Military and Mining area (5,854 acres) and percent land use (1.1 percent). At 5.4 percent of its area, Gloucester County has the highest percentage of Undeveloped land, but Burlington has the most land area (21,766 acres). For greater detail of land uses by county and municipality, refer to Appendices C and D, providing land use categories in acres and percentage, in each major land use category.

Table 5 shows the distribution of generalized land uses within the region. Burlington County is the largest county in land area and its Wooded, Water, or Undeveloped land contributes the greatest share (34.4 percent) of that classification to the region. Chester County contributes the greatest portion of Residential (20 percent) and Agricultural (36.2 percent) land. Montgomery County has the largest share of regional Other Developed land.

Figure 3: Greater Philadelphia Region Land Use 2015

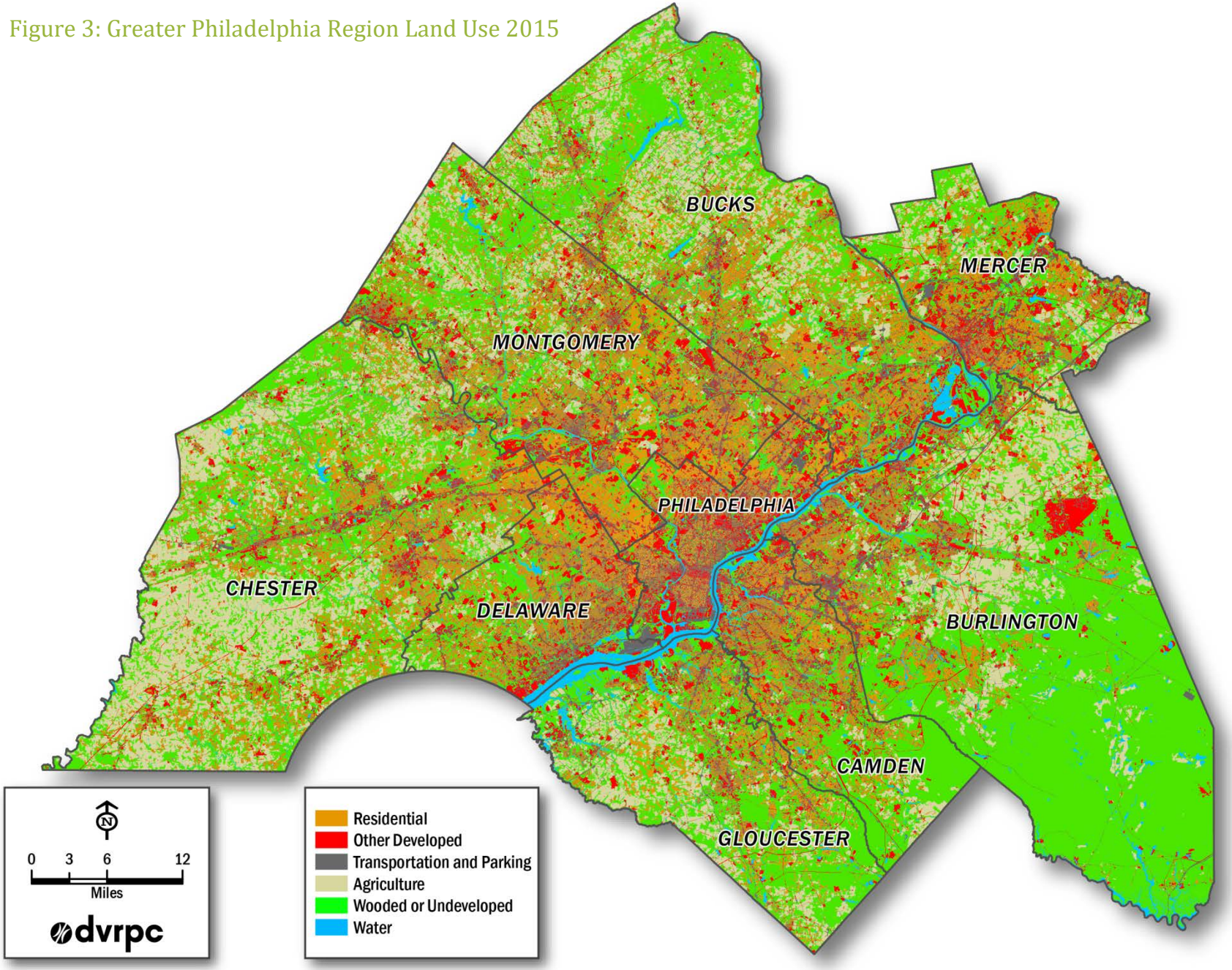


Table 3: 2015 Land Use in Acres, by County

County	Total Acres	Residential	Other Developed Uses					Agriculture	Undeveloped		
			Industrial	Transport./ Utility	Commercial	Military/ Mining	Recreation/ Institutional		Wooded	Water	Undeveloped
Burlington	524,704	62,371	3,423	22,655	5,539	5,843	11,995	76,625	299,861	14,626	21,766
Camden	145,551	43,261	2,605	17,464	4,357	563	7,884	8,494	51,401	4,400	5,122
Gloucester	215,012	45,005	4,453	14,240	3,582	269	6,534	42,325	76,053	10,889	11,662
Mercer	146,349	38,481	2,107	15,244	3,759	314	9,694	23,674	42,506	3,422	7,148
NJ Counties	**1,031,616**	**189,118**	**12,588**	**69,603**	**17,237**	**6,989**	**36,107**	**151,118**	**469,821**	**33,337**	**45,698**
Bucks	397,492	111,593	5,733	29,264	7,218	1,331	15,787	81,894	117,407	13,113	14,152
Chester	485,468	124,702	3,194	25,237	7,050	767	15,989	157,694	132,030	5,088	13,717
Delaware	122,220	51,378	2,985	15,154	3,666	250	10,407	4,775	24,103	5,550	3,952
Montgomery	311,635	116,598	5,811	32,139	9,247	1,515	25,121	40,291	65,308	4,436	11,169
Philadelphia	90,991	29,985	5,316	22,087	4,929	211	10,999	197	7,949	5,177	4,141
PA Counties	**1,407,806**	**434,256**	**23,039**	**123,881**	**32,110**	**4,074**	**78,303**	**284,851**	**346,797**	**33,364**	**47,131**
DVRPC Region	**2,439,422**	**623,374**	**35,627**	**193,484**	**49,347**	**11,063**	**114,410**	**435,969**	**816,618**	**66,701**	**92,829**

All parking uses have been included in the transportation category (regardless of the use with which they are associated).
Source: DVRPC.

Table 4: 2015 Land Use by Percent within Each County

County	Total Acres	Residential	Other Developed Uses					Agriculture	Undeveloped		
			Industrial	Transport./ Utility	Commercial	Military/ Mining	Recreation/ Institutional		Wooded	Water	Undeveloped
Burlington	524,704	11.9%	0.7%	4.3%	1.1%	1.1%	2.3%	14.6%	57.1%	2.8%	4.1%
Camden	145,551	29.7%	1.8%	12.0%	3.0%	0.4%	5.4%	5.8%	35.3%	3.0%	3.5%
Gloucester	215,012	20.9%	2.1%	6.6%	1.7%	0.1%	3.0%	19.7%	35.4%	5.1%	5.4%
Mercer	146,349	26.3%	1.4%	10.4%	2.6%	0.2%	6.6%	16.2%	29.0%	2.3%	4.9%
NJ Counties	**1,031,616**	**18.3%**	**1.2%**	**6.7%**	**1.7%**	**0.7%**	**3.5%**	**14.6%**	**45.5%**	**3.2%**	**4.4%**
Bucks	397,492	28.1%	1.4%	7.4%	1.8%	0.3%	4.0%	20.6%	29.5%	3.3%	3.6%
Chester	485,468	25.7%	0.7%	5.2%	1.5%	0.2%	3.3%	32.5%	27.2%	1.0%	2.8%
Delaware	122,220	42.0%	2.4%	12.4%	3.0%	0.2%	8.5%	3.9%	19.7%	4.5%	3.2%
Montgomery	311,635	37.4%	1.9%	10.3%	3.0%	0.5%	8.1%	12.9%	21.0%	1.4%	3.6%
Philadelphia	90,991	33.0%	5.8%	24.3%	5.4%	0.2%	12.1%	0.2%	8.7%	5.7%	4.6%
PA Counties	**1,407,806**	**30.8%**	**1.6%**	**8.8%**	**2.3%**	**0.3%**	**5.6%**	**20.2%**	**24.6%**	**2.4%**	**3.3%**
DVRPC Region	**2,439,422**	**25.6%**	**1.5%**	**7.9%**	**2.0%**	**0.5%**	**4.7%**	**17.9%**	**33.5%**	**2.7%**	**3.8%**

All parking uses have been included in the transportation category (regardless of the use with which they are associated).
Source: DVRPC.

Table 5: 2015 County Percentages of the Regional Total

County	Total Acres	Developed		Agriculture	Wooded, Water, or Undeveloped
		Residential	Other Developed		
Burlington	21.5%	10.0%	12.2%	17.6%	34.4%
Camden	6.0%	6.9%	8.1%	1.9%	6.2%
Gloucester	8.8%	7.2%	7.2%	9.7%	10.1%
Mercer	6.0%	6.2%	7.7%	5.4%	5.4%
NJ Counties	**42.3%**	**30.3%**	**35.3%**	**34.7%**	**56.2%**
Bucks	16.3%	17.9%	14.7%	18.8%	14.8%
Chester	19.9%	20.0%	12.9%	36.2%	15.5%
Delaware	5.0%	8.2%	8.0%	1.1%	3.4%
Montgomery	12.8%	18.7%	18.3%	9.2%	8.3%
Philadelphia	3.7%	4.8%	10.8%	0.0%	1.8%
PA Counties	**57.7%**	**69.7%**	**64.7%**	**65.3%**	**43.8%**

Source: DVRPC.

Previous land use inventory ADRs have examined residential densities in the region's municipalities. Table 6 gives recalculated residential densities in light of new land use coding. These values reflect that actual land use area of Residential uses (without assumptions about percentages of Transportation: Roadway within uses), the addition of Residential: Mixed-Use previously categorized under Commercial uses, and the most recent, 2018, vintage of 2015 county housing unit estimates. For residential densities by municipalities and Philadelphia Planning Districts using American Community Survey housing unit estimates, see Appendix E.

Table 6: 2015 Residential Densities

County	Residential Acres	Housing Units	Housing Units per Residential Acre
Burlington	62,371	178,090	2.86
Camden	43,261	206,135	4.76
Gloucester	45,005	112,470	2.50
Mercer	38,481	144,486	3.75
NJ Counties	**189,118**	**641,181**	**3.39**
Bucks	111,593	248,752	2.23
Chester	124,702	197,983	1.59
Delaware	51,378	223,857	4.36
Montgomery	116,598	330,917	2.84
Philadelphia	29,985	679,864	22.67
PA Counties	**434,256**	**1,681,373**	**3.87**
DVRPC Region	**623,374**	**2,322,554**	**3.73**

Source: DVRPC, U.S. Census Bureau's Population Estimates Program.
Residential parking uses have been excluded.

The enhanced 2015 land use data features many more subcategories within standard parent categories, beyond just parking. The following tables reveal the insights and nuance the new data gives within many categories. Table: A3 in Appendix A provides detailed definitions of each subcategory.

Residential land and associated Parking uses comprises more than 629,000 acres in Greater Philadelphia, about 26 percent of all land in the region, see Table 7 for details on each Residential subcategory. The Residential category is primarily comprised of Single-Family Detached uses. While single-family homes may have parking pads, driveways, and garages designated for parking, this is not delineated in the enhanced land use file. Multifamily includes attached units like rowhomes. The new Mixed-Use subcategory—those mixed-uses with a primary residential use—is small in area (not even registering as a tenth of a percent of regional Residential land) but has a high percentage of Parking designated for it. Mobile Home makes up a half percent of regional Residential area.

Table 7: 2015 Residential Subcategories

Subcategory	Total Acres	Percent Parking	Share of Parent Category
Single-Family Detached	552,329	n/a	87.8%
Multifamily	73,778	7.9%	11.7%
Mixed-Use	47	26.4%	0.0%
Mobile Home	3,087	0.3%	0.5%
Total	**629,241**	**0.9%**	**100.0%**

Source: DVRPC.

Industrial uses cover more than 40,000 acres in Greater Philadelphia, less than two percent of the region's land, see Table 8 for more information about Industrial land use subcategories. The General industrial subcategory for light and heavy manufacturing makes up nearly two thirds of regional Industrial land. The new Mixed-Use subcategory within the Industrial category, similar to its Residential counterpart, has a high proportion of Parking area designated to it (28.1 percent of overall Industrial Mixed-Use). Warehousing/Distribution/Open Storage makes up more than a quarter of regional Industrial land.

Table 8: 2015 Industrial Subcategories

Subcategory	Total Acres	Percent Parking	Share of Parent Category
General	26,526	10.5%	66.1%
Mixed-Use	2,674	28.1%	6.7%
Warehousing/Distribution/Open Storage	10,916	8.7%	27.2%
Total	**40,116**	**11.2%**	**100.0%**

Source: DVRPC.

Transportation accounts for nearly 120,000 acres of land in the region, about five percent of all land. Table 9 shows Transportation subcategories. While Roadway did not take up as great a portion of other uses when it was not fully delineated, it is clearly the most significant subcategory of Transportation uses. Together with Highway Right-of-Way, auto-oriented Transportation uses make up almost 84 percent of the region's Transportation land use. That total still does not take into account the facilities like rest stops and roadway maintenance facilities found in the Facility subcategory.

Table 9: 2015 Transportation Subcategories

Subcategory	Total Acres	Percent Parking	Share of Parent Category
Facility	5,038	14.3%	4.2%
Roadway	100,313	n/a	83.8%
Highway Right-of-Way	5,832	n/a	4.9%
Rail Right-of-Way	3,251	n/a	2.7%
Airport	5,246	3.7%	4.4%
Total	**119,680**	**0.8%**	**100.0%**

Source: DVRPC.

Utility covers more than 30,000 acres in the region, just over one percent of all land. Table 10 examines Utility subcategories. A majority of Utility uses are Right-of-Way for large power transmission lines and other utilities. Landfill covered almost 3,400 acres in the region, comprising 11 percent of Utility land. Recycling facilities took up roughly half that space. Wastewater Treatment uses made up nearly 6 percent of the category.

Table 10: 2015 Utility Subcategories

Subcategory	Total Acres	Percent Parking	Share of Parent Category
Right-of-Way	16,639	0.0%	54.2%
Landfill	3,397	0.1%	11.1%
Wastewater Treatment	1,785	1.4%	5.8%
Other Facility	7,193	3.7%	23.5%
Recycling	1,658	0.6%	5.4%
Total	**30,671**	**1.0%**	**100.0%**

Source: DVRPC.

Commercial uses account for more than 70,000 acres in the region, nearly three percent of all land. Table 11 looks at the subcategories of Commercial land use. While a significant amount of Commercial land is designated as General (smaller service or professional buildings distinct from larger adjacent larger retail or office centers), the enhanced land use data parses out several Commercial subtypes that may be of interest. Perhaps most striking, relative to other categories, is the difference in percent Parking for commercial uses. Shopping Malls make up over 1,200 acres in the region with three-fifths of land used for Parking. Regional and Community Retail Center as well as Single Large-Site Retail have half their land in Parking. Office is also very high at 46.2 percent and Hotel/Motel Parking makes up over 40 percent of its land. Unlike other mixed-uses, Commercial Mixed-Use Parking proportions are lower. Public Storage has the lowest percentage of Parking.

Table 11: 2015 Commercial Subcategories

Subcategory	Total Acres	Percent Parking	Share of Parent Category
General	44,899	22.1%	63.9%
Shopping Mall	1,223	60.5%	1.7%
Regional & Community Retail Center	9,555	49.7%	13.6%
Single Large-Site Retail	1,884	49.6%	2.7%
Mixed-Use	1,511	10.4%	2.2%
Office	8,252	46.2%	11.7%
Hotel/Motel	1,364	40.2%	1.9%
Public Storage	1,566	2.3%	2.2%
Total	**70,254**	**29.8%**	**100.0%**

Source: DVRPC.

Institutional uses account for more than 51,000 acres in the region, just over two percent of all land, see Table 12. One-third of Institutional land is used for Education. Religious and Cemetery subcategories each make up over 16 percent of the parent category. Medical and Correctional Facility and Detention Center was the smallest, with 7.7 and 2 percent of the category, respectively. Medical and Religious uses had a quarter of their land as a Parking use. General Institutional (e.g., non-military government services, non-residential, community centers, and museums and historic sites) and Education were next highest with over 18 percent Parking.

Table 12: 2015 Institutional Subcategories

Subcategory	Total Acres	Percent Parking	Share of Parent Category
General	12,430	18.6%	24.1%
Medical	3,948	26.1%	7.7%
Education	17,164	18.7%	33.3%
Religious	8,344	25.1%	16.2%
Correctional Facility & Detention Center	1,005	9.4%	2.0%
Cemetery	8,618	0.2%	16.7%
Total	**51,509**	**17.0%**	**100.0%**

Source: DVRPC.

Recreation accounts for more than 74,000 acres in the region, about three percent of all land. Recreation was split into a General subcategory (e.g., parks, playgrounds, pools, theaters, stadiums) and a Golf Course subcategory, the acres of which are found in Table 13. Golf Course covers almost 23,500 acres in the region—almost a third of all Recreation land and one percent of the region.

Table 13: 2015 Recreation Subcategories

Subcategory	Total Acres	Percent Parking	Share of Parent Category
General	50,832	4.6%	68.4%
Golf Course	23,479	1.4%	31.6%
Total	**74,311**	**3.6%**	**100.0%**

Source: DVRPC.

The Undeveloped category is divided into multiple subcategories found in Table 14. Undeveloped land accounts for nearly 93,000 acres in the region, almost four percent of the total. General Undeveloped encompassed over 80 percent of the 92,828 acres of the parent Undeveloped category. Drainage Basins accounted for 12.2 percent and Transitional Land—that undergoing construction—was 7.2 percent of the total. 291 acres in the region is designated as Parking – Undeveloped: Undetermined Use and is therefore classified under the Undeveloped category.

Table 14: 2015 Undeveloped Subcategories

Subcategory	Total Acres	Percent Parking	Share of Parent Category
Parking – Undeveloped: Undetermined Use	291	100.0%	0.3%
General	74,568	n/a	80.3%
Transitional Land	6,649	n/a	7.2%
Drainage Basin	11,320	n/a	12.2%
Total	**92,828**	**0.3%**	**100.0%**

Source: DVRPC.

There are only three categories that do not have subcategories beyond their corresponding Parking uses: Military, Agriculture, and Mining. Additionally, there are two categories that have no corresponding Parking use: Wooded and Water. All these categories are examined in Table 15.

Table 15: 2015 Single Categories

Category	Total Acres	Percent Parking
Military	6,973	5.6%
Agriculture	436,033	0.0%
Mining	4,486	0.1%
Wooded	816,617	n/a
Water	66,700	n/a

Source: DVRPC.

Appendix A: Enhanced Land Use Methodology

Appendix A: Enhanced Land Use Methodology

Project Overview

Purpose

To create a more thorough and standardized (enhanced) version of DVRPC's 2015 land use data in order to support DVRPC's more detailed planning analyses goals. Intended to be used for planning purposes only.

Project Phases

Three phases of contractor work were performed with the 2015 aerial photography and these phases created two interim and one final land use product discussed in this report:

1. Phase 1 (P1), employing previous methods to derive the 31 categories of previous five-year land use products;
2. Phase 2 (P2), delineating 72 subcategories from 13 parent categories, and;
3. Phase 3 (P3), carving out the new, comprehensive Transportation: Roadway subcategory that completed the work for the enhanced 2015 land use product.

The resulting three land use products—GIS layers—were:

1. The P1 product: a preliminary 2015 land use product highlighted in DVRPC publication ADR024,
2. The P2 product: an interim layer originally intended to be the new enhanced product; and
3. The P3 product: the enhanced 2015 land use product detailed in this report ADR026.

A Request For Proposals for the 2015 land use update was posted to the DVRPC website in December, 2015. Aerial Information Systems (AIS) of Redlands, California was selected to perform a 2015 land use update and to create an enhanced 2015 land use update data set for the nine-county DVRPC region consisting of Bucks, Chester, Delaware, Montgomery, and Philadelphia counties in Pennsylvania, and Camden, Burlington, Gloucester, and Mercer counties in New Jersey. The project started in February 2016 and completed in April 2017. AIS used computer interactive photo interpretation and heads-up digitizing to create both land use datasets. This consisted of all P1 and P2 work.

P2 created a land use layer using a more detailed land use classification and standardized data capture criteria, including minimum mapping size guidelines for built-up land use types and parking lots. Despite some overlap in the land use classification and data capture criteria for each effort, the P1 and P2 geodatabases do not completely correlate to one another due to the more detailed P2 classification, changes in the categorization of some land use features from P1 to P2, and revisions to the original DVRPC data capture criteria.

In June, 2018, DVRPC contracted AIS to conduct the third phase of the enhanced land use work. The P3 update mapped additional road land use features for the nine-county DVRPC region and integrated the new features into the P2 dataset. The P3 project started in June 2018 and completed in March 2019.

All work was performed by AIS staff, at the AIS office in Redlands, California. For the P1 and P2 layers, Esri ArcGIS 10.3 software capabilities were used. For the P3 layer, Esri ArcGIS 10.6.1 software capabilities were used. No sub-contractors or outside consultants were used throughout the performance of the contract.

The P3 work addressed a long-standing discrepancy between prior land use datasets and DVRPC ADRs about those datasets. In the absence of comprehensive roadway data, the reports used simplistic assumptions on what percentage of land uses fell within roadways not captured in the dataset. As the analysis shows in Table 2 of this report, the assumptions did not reflect actual conditions. The final P3 product enables uses to more accurately represent conditions in 2015. It also allows totals generated from DVRPC's GIS land use layer and summary tables in DVRPC plans and reports to be consistent with each other.

In 2020 land use datasets and beyond, the methodologies used in the final 2015 product will be the new standard for creating land use products. The label “enhanced” will not be used to describe future products.

Phase 1 Procedures

AIS used heads-up digitizing methods to update the DVRPC 2010 land use dataset to 2015 conditions, per the existing 2010 land use categories. DVRPC’s 2015 imagery served as the basis for the update interpretations.

AIS interpreters reviewed the existing 2010 data against the 2015 baseline imagery, looking for areas of land use change greater than ¼ acre in size or parking lots of ten parking spaces or more. Where areas of change meet the ¼ acre or parking space requirements, the existing land use boundaries and/or attributes were revised as needed. Areas of change that did not meet the minimum size or parking space requirements were not captured. Land use boundary and/or code errors in the existing 2010 land use data were not addressed.

The 2015 land use delineations and codes were edgematched to adjacent modules to ensure the continuity of information across module boundaries.

Phase 2 Procedures

Adjust Parcels to County Boundaries

The first task of the P2 update was to adjust the individual county parcel datasets to the DVRPC regional county boundary file to ensure there were no gaps or overlaps in the parcel data along county boundaries. Parcel boundaries along the county edge were extended and/or “clipped” to the regional county boundaries, thereby removing gaps and/or overlaps in the parcel data. The parcel boundaries were not otherwise adjusted.

Fast-Track Mapping

Upon completion of the P1 mapping effort, a fast-track mapping effort was performed in Camden County, NJ to test the data capture criteria and assumptions developed for the P2 mapping. Issues identified during this process were discussed and resolved in consultation with DVRPC through a series of conference call “webinars.” The process helped to resolve major criteria issues at an early stage of the project, thereby facilitating the consistent data capture and uninterrupted workflow of the P2 production mapping.

Land Use Data Creation

The P1 update and the 2015 DVRPC imagery were used as the baseline for the P2 land use interpretations, using the same working production module grid developed for the P1 mapping process. The same computer interactive heads-up digitizing techniques used to capture the P1 data were used for the P2 mapping, but the information was captured per the more detailed land use categories and the P2 mapping criteria described later in this appendix.

The interpreters reviewed the newly created P1 land use layer against the 2015 digital imagery and revised the data to 2015 conditions following the more detailed P2 land use classification and minimum mapping unit guidelines. Polygon boundaries and/or attributes were modified accordingly, regardless of whether it was a subdivision of the P1 data to reflect the more detailed classification and mapping criteria, or a revision to correct legacy coding/boundary errors retained in the data from previous land use inventories.

The P2 land use delineations and codes were edgematched to adjacent production modules and across county boundaries, as applicable, to ensure the continuity of information across boundaries.

Quality Control Review

To ensure the accuracy and completeness of the interpretations for both the P1 and P2 land use, a comprehensive quality control (QC) review was performed to ensure the land use delineations and codes adhered to the project criteria and classification for both the P1 and P2 mapping efforts.

Senior AIS staff members reviewed the updated and enhanced land use features to verify the accuracy and consistency among interpreters, looking for completeness, uncoded polygons, unnecessary boundaries, and how well the delineations match the imagery. The edgematch to adjoining completed modules was also reviewed and any discrepancies along the edges were resolved. In addition, automated final checks for topology errors and invalid codes were also conducted once the production modules were joined together.

One last quality control review was conducted on the completed geodatabases prior to the draft and final deliveries to ensure that the database was seamless and was processed correctly.

Map Validation

In addition to the quality control task, a series of map validation procedures were performed to ensure the accuracy of the data and the enhanced P2 mapping per the P1 and P2 project classifications and mapping criteria. The validation process consisted of online virtual field surveys using internet resources such as Google Maps, Bing Maps, Google Earth, and other websites; review of multiple image sets representing different eras; correlation to county parcel data; and DVRPC staff comments arising from AIS questions and the DVRPC review of the data.

Ancillary Digital Imagery

In addition to the 2015 base imagery, the interpreters referred to the 2010 natural color digital ortho-rectified imagery provided by DVRPC and online imagery available through Google Maps, Google Earth, and Bing Maps. The ancillary imagery provided the interpreters with a more comprehensive picture of the land use by providing them with views of the study area under different seasonal conditions, in different eras. The interpreters used this information to make more accurate informed decisions about the pattern of land use and types of land use change for a given area.

Virtual Field Checks (Internet Resources)

The internet proved to be a significant resource of information for the 2015 land use update and was used to perform “virtual” field checks for both the P1 and P2 land use interpretations. The amount and quality of online information obtained by this virtual field survey method was particularly valuable for the more detailed P2 mapping effort due to the level of classification detail and the ¼-acre minimum mapping unit for built-up land use types. The Google Maps and Bing Maps Street View images, where available, often allowed the interpreter to read building signs and other information, to help identify the land use type. Google Maps was also an excellent resource for built-up (urban) land use types as it provided the names and point locations of private and public entities, often with additional links to associated websites.

Google Earth provided the same advantages that Google Maps did, but in addition, it also had multiple sets of imagery spanning different timeframes, which enabled the interpreter to get a historical perspective of an area. The imagery from multiple eras was advantageous when historical knowledge of an area helped make coding decisions. This was primarily useful when evaluating change in transitional areas, particularly when trying to determine the status of agricultural land.

Bing Maps was primarily used by the interpreters for the Bird’s Eye and Street View images, where available. The Bird’s Eye imagery provided the interpreters with a close-up view of the area in question, sometimes at multiple oblique angles, in order to see more clearly areas of change, determine property boundaries, and even the relative height of vegetation when these features were not clearly visible on the project imagery. Bing Maps also provided land use information but not to the same degree as Google Maps.

The Google search engine was frequently used by interpreters to further research the information obtained from Google Maps and Bing Maps, in order to more accurately classify the land use type.

Digital County Parcel Data

The county parcel data provided varying levels of land use information depending on the level of parcel land use detail and how closely the parcel land use classes matched the P1 and P2 land use class descriptions. The interpreters used the information to corroborate the land use attributes for the P1 and P2 data, accordingly.

Digital USGS Raster Data

Open source USGS raster data (DRGs) was another resource used to increase the accuracy of the interpretations. Due to the age of the DRG information, they were used primarily to verify the general topography and to get a historic perspective of the vegetation and land use for a given area.

DVRPC Interactive Teleconference, Data Review, and Comment

Additional validation steps of the land use assignment were performed through consultation with DVRPC staff over the course of the project, particularly for the P2 mapping effort. AIS created bookmarks in the data identifying issues requiring further discussion and resolution with DVRPC staff. These issues were reviewed during a series of teleconference webinars using the JoinMe computer program that allowed for the sharing of computer screens in real time. This process was immensely helpful in furthering the development of the mapping criteria and classification descriptions for the P2 mapping effort. The issues/questions were documented and the meeting notes delivered to DVRPC for their internal documentation. In some instances, the resolution coming from DVRPC resulted in global changes to the criteria. In other situations, the issues were localized, only affecting a limited number of features. In both examples, the input from DVRPC increased the accuracy and provided validation of the land use types in question.

DVRPC Review

Upon completion of the mapping for each county, the draft datasets were submitted to DVRPC for review and acceptance, for both the P1 and P2 mapping efforts. The DVPRC review comments, if any, were redelivered to AIS for revision, and if necessary, further comment. Upon completion of this process, the final data set was delivered to DVRPC.

Mapping Criteria

The following sections set general rules on delineating polygons.

General Representation of Land Use Features

- When a road separated differing land use features, the polygons for these features followed the perceived road centerline. Although roads often include a right-of-way on either side, these slivers of land between the roads and the adjacent land use features were aggregated with the land use unless they could be reasonably extracted. The above criteria were applied for the delineation of new land use polygons. Existing land use polygon boundaries that fell within the road right-of-way but did not follow road centerlines due to image registration issues were not corrected.
- Where roads and features on the orthophoto differed from those represented on other collateral sources, the location on the orthophoto was used to depict the feature.
- Boundaries were followed as closely as possible. Where boundaries were particularly jagged, however, some cartographic smoothing was deemed appropriate. This was generally for use along natural boundaries and was rarely needed along “man-made” boundaries.
- Built-up land uses usually follow “man-made” features such as fence lines, roads, and property boundaries. Boundaries were typically drawn with straight lines and right-angle corners were used; lines were placed down the centerline of boundaries (such as roads and tree lines).
- Buildings housing different land use types were typically not split. Where different land use types are connected to one another (share a common wall), the building was typically delineated as a single feature and assigned the appropriate land use type. Covered walkways that connected buildings also allowed the buildings to be captured as a single feature (examples include Regional & Community Retail Centers).

Where there were gaps between buildings (they do not share a common wall), the buildings were assessed individually. This criterion applied to all land use types. Exceptions are noted in the classification description.

- Commercial shopping developments (P2 only) code assignments were based on the building configuration, not the general development of the area. For example, where both stand-alone and connected buildings are on a single property, they will be captured independently of one another, assuming each meets the project minimum mapping unit of ¼ acre.
- Abandoned built-up land uses were coded as the last known use if the buildings appear in reasonably good order. If the buildings have been demolished, or have deteriorated to the point where they cannot be used "as is" (i.e., they should be demolished), the feature was coded as Undeveloped (14000).
- Natural vegetation boundaries tend to be transitional, therefore the line separating different classes was often less distinct. These polygons seldom contained straight edges or angles unless the vegetation unit was adjacent to built-up or "man-made" features. Vegetation category polygons were usually represented with flowing and curvilinear lines, reflecting the more natural shape of the land cover.

Minimum Mapping Units (MMU)

- Quarter-acre (¼ acre) = built-up land use, Agriculture, Water, and Undeveloped in urban areas.
- Two (2) acre = Single-Family Residential in non-urban areas, Undeveloped in non-urban areas, and Wooded.
- Sixty foot (60') minimum width for water and other linear features excluding Highway ROW and Rail ROW.
- Highway ROW = Divided highway (as shown on Google Maps) and where they are one-hundred feet (100') wide. Existing ROW that do not meet criteria are grandfathered in.
- Rail ROW = Three (3) Rail lines within ROW. Existing ROW that do not meet criteria are grandfathered in.
- No minimum size for "remnant" built-up land uses. Remnant land uses are below resolution features created by the subdivision of their original boundaries due to land use, criteria changes, or street casing splits.
- Parking lots with ten (10) parking spaces or more.

Below-MMU polygons

- Below resolution polygons were left intact or created in the following situations: Below resolution land use features were mapped provided they were significant to the overall classification of the area. Typically, this occurred where the land use type was present within a given area but no single feature attained the minimum mapping size. If the MMU had been strictly observed, these units would not have been captured in the database. By mapping certain land use classes smaller than the MMU, the user is given a more accurate depiction of land use conditions in these areas.
- Remnant polygons from the 2010 Update were kept in the data as long as they were significant to the overall classification of the area. Typically, these included built-up land uses and wetland vegetation types. Upland vegetation remnants were usually re-classified into surrounding land use polygons.

Land Use Aggregation

Where a non-exempted class did not meet the minimum mapping unit size, it was aggregated into an adjacent land use type per the following general guidelines:

- Built-up land uses took precedence over non built-up categories. For example, if a below-MMU residential land use was adjacent to a below-MMU forest cover, the forested area was typically absorbed into the residential land use.
- In general, residential land uses took precedence over other built-up land uses. If a below-MMU residential land use was adjacent to a below-MMU commercial land use, typically the commercial area was absorbed into the residential land use.

- If a below-MMU land use feature was surrounded by a number of other above-MMU land use features, then the below-MMU unit would be absorbed into the unit that most closely represented its class. For example, if a below-MMU residential class was next to above-MMU commercial, industrial, and forested polygons, the residential land use was absorbed into the commercial polygon.
- An isolated below-MMU land use feature completely surrounded by a single land use feature was absorbed into the surrounding land use class.
- Some remnant polygons remaining from the 2010 Update were merged according to the criteria above if they were not significant to the overall classification of the area.

Order of Precedence

- Roads take precedence over Transportation: Rail Right-of-Way, Utility: Right-of-Way, and Water.
- Transportation: Rail Right-of-Way takes precedence over Utility: Right-of-Way and Water.
- Water takes precedence over Utility: Right-of-Way.
- Transitional Land takes precedence over Utility: Right-of-Way.
- Residential backyards (developed) and areas of equipment/material storage associated with industrial/commercial uses take precedence over Utility: Right-of-Way.
- Utility: Right-of-Way takes precedence over Agriculture, Undeveloped, and Wooded.
- Undeveloped: Drainage Basins take precedence over Transportation: Highway Right-of-Way and Utility: Right-of-Way.

Parking Lot Criteria

- Minimum mapping size = ten (10) parking spaces.
- Includes parking areas designated for residents, visitors (shoppers), and employees.
- Does not include parking for company vehicles, such as police, fire, and utility yards, bus yards, trucking companies, or industrial truck parking.
- Does not include undesignated or “opportunistic” parking areas such as vacant lots that function as informal parking for an area.
- Parking lots can be paved or unpaved (gravel).
- Unpaved lots should have some kind of parking infrastructure visible on the photos, such as light standards or other indications that the lot is used for parking.
- Where the infrastructure is not visible and no clearly defined parking relationship can be established with the adjacent land use, the gravel lots were coded as vacant.
- Where a single parking lot serves multiple land use types, the parking lot will be delineated based on visible boundaries, e.g., walls, landscaping, changes in pavement, roads, etc., that can be correlated to the individual land use types. Where these boundaries are not present, an arbitrary boundary was drawn based on a “reasonable” division of the parking area and proximity to the associated land use.
- Where a “reasonable” division cannot be made, the parking lot was captured as a single feature and assigned the most appropriate land use code.
- Where buildings have been demolished but the associated parking lot remains, the new code, Parking - Undeveloped: Undetermined Use (14009) was applied.
- Former parking lots that have deteriorated to the point of being not viable for parking (asphalt removed, very weedy, etc.) were captured as Undeveloped: General (14000) in P2.
- Parking lots for model homes are captured as Parking – Commercial: General (06009).
- Parking lots that cannot be correlated to a specific land use were captured as Parking - Undeveloped: Undetermined Use (14009).
- The entire parking area of abandoned car lots is captured as Parking – Commercial: General (06009). This includes the new car parking areas previously coded in the P1 product and previous land use inventories as Commercial. The abandoned sales offices and service garages remain Commercial, per the abandoned land use mapping criteria.

- Parking lots owned/operated by government (municipal, county, state) parking authorities are captured as Parking – Institutional: General (07009), if the lots are not clearly associated with other non-institutional use; ownership directed the code attribution. If the lots were linked to non-institutional land uses, the parking was captured for the use; the use took precedence over ownership.
- Free-standing garages in multifamily residential developments are captured as Parking – Residential: Multifamily (01019), not as Residential: Multifamily.
- Multi-story parking structures where the ground floor contains other uses are captured as Parking for the associated use, not the non-parking ground floor use.
- Does not include "head-in" street parking.
- Does not include temporary parking lots associated with construction sites.
- A parking garage in Philadelphia has the following features: it serves both an office tower and apartments, and it has an urban park on the roof. It is best captured as Parking - Commercial: Office (06059).
- If landscaping is located between the parking and the street, with no buildings in between, the landscaping will be included with the parking. Where there are large areas of landscaping (one acre or more), an exception can be made, and the area captured as the associated use.
- If the landscaping is located between the building and the street, the landscaping was included with the use.
- If the landscaping is located adjacent to the street, building(s), and parking, the landscaping was typically captured with the associated use; it was not be subdivided at the point where it is adjacent to the parking area.

Phase 3 Procedures

Identify Roadway Data Sources

Multiple source datasets were used to capture the roadway land use features, based on county. The source used for each county is listed below.

- DVRPC Impervious Surface (IS): Bucks, Chester, Delaware, and Montgomery counties, PA.
- Philadelphia County Curb: Philadelphia County, PA.
- NJDOT roadway Centerlines: Burlington, Camden, Gloucester, and Mercer counties, NJ.
- PADOT Centerlines (RMS and Local roads): All five PA counties. The PADOT centerline data served as supplemental source to flag potential roadway land use features that were not shown in either the DVRPC Impervious Surface or Philadelphia Curb datasets. The first task of the Enhanced Land Use Update was to adjust the individual county parcel datasets to the DVRPC regional county boundary file to ensure there were no gaps or overlaps in the parcel data along county boundaries. Parcel boundaries along the county edge were extended and/or "clipped" to the regional county boundaries, thereby removing gaps and/or overlaps in the parcel data. The parcel boundaries were not otherwise adjusted.
- Online sources such as Google and Bing maps and street view, where available, were used to verify road location, continuity, and/or existence, when that information was indeterminate or not visible on the project imagery.
- County parcel data, provided by DVRPC, were used to verify public and private road ROW boundaries.

Create Roadway Land Use Features

Due to the differences between the project source data, each of the three road source datasets required a slightly different process to create the roadway land use features in P3, described below under the source headings. Regardless of the source, all visual review tasks were performed using heads-up digitizing techniques and the final roadway land use data capture was performed per the project criteria described under "Mapping Criteria."

DVRPC Impervious Surface roadway Layer (Bucks, Chester, Delaware, and Montgomery counties)

- *Pre-process IS data*. DVRPC's existing IS layer was pre-processed to extract the IS roadway and remove the "islands" (holes) from the resulting IS roadway layer, in order to create a draft roadway land use layer for each source county.
- *Visual review*. Photo interpreters performed a visual review of the processed IS data, comparing the draft roadway land use features against the project imagery. The data was corrected for the following errors:
    - Removed roadway land use features that didn't exist on the imagery.
    - Added roadway seen on the project imagery, if they met the data capture criteria. The PADOT centerline datasets were used to help flag potential roadway land use features not captured in the original DVRPC IS data.
    - Corrected roadway alignment issues per the project criteria.
    - Removed cartographic anomalies.

Philadelphia Curb Layer (Philadelphia County)

The process used to extract the roadway land use from the curb layer was virtually the same as that used for the DVRPC IS layer, except the curb data did not have "islands" requiring removal, therefore minimal pre-processing of the source dataset was required.

- *Visual review*. Photo interpreters performed a visual review of the processed IS data, comparing the draft roadway land use features against the project imagery. The data was corrected for the following errors:
    - Removed roadway land use features that didn't exist on the imagery.
    - Added roads seen on the image, if they meet the data capture criteria. The PADOT centerline datasets were used to help flag potential roadway land use features not captured in the original Philadelphia curb data.
    - Corrected road alignment issues per the project criteria.
    - Removed cartographic anomalies.

NJDOT Centerlines (Burlington, Camden, Gloucester, and Mercer counties)

This process differed significantly from the PA counties, as there was no polygonal road data source for the DVRPC NJ counties. The roadway land use features for those counties had to be created by buffering the NJDOT road centerline data.

- *Create working copy of NJ centerlines*. A copy of the NJDOT centerlines was created for each DVRPC NJ County. This data was not included in the project deliverables as it was developed solely as an in-house working dataset to facilitate the creation of the roadway land use features, not as a replacement/correction of the official NJDOT centerline data
- *Visual review*. A visual review was performed, where the working copy of the NJDOT centerlines were compared against the project imagery and corrected for the following:
    - The lines were adjusted, as needed, to comply with the perceived centerline on the imagery and/or the >10' minimum off-set criteria for the final road casing.
    - Centerlines were added or removed, as needed, to complete the road network.
    - Centerlines that correlated to valid roadway land use features were kept in the final working centerline dataset.
    - Centerlines that did not correlate to a valid roadway land use feature on the image, e.g., the road services commercial or industrial complexes or there is no road on the image, were not included in the final working centerline dataset.
- *Buffer centerline to create roadway land use features*. A buffer was generated for each valid centerline-based measurements of representative street widths for a given area. The buffers were created by the photo interpreters and the buffered roadway land use features were immediately reviewed against the project imagery to ensure the buffering was done correctly and the roadway land use feature adhered to the roadway land use capture criteria. Corrections, including re-buffering of the centerline or edits to

buffered roadway land use boundary were performed, as needed. Cartographic anomalies that occurred as a result of the buffering process were also removed.

Roadway Land Use Criteria

General Criteria

Roadway land use features are defined as freeways, major highways, thoroughfares, commuter roads, and single-family residential roads. In general, "roads" in commercial, industrial, multifamily residential, or government complexes, parks, and other open space land uses, are not included. As a result, not all "roads" shown on the source data (DVRPC IS, Philadelphia curbs, or NJDOT centerlines) or visible on the project imagery were captured as roadway land use features.

Exceptions to General Criteria

Apartments/Multifamily Residential Developments, including Retirement Communities

In general, roads through multifamily residential complexes were not captured unless they function as a "through" road or the complex contains individual garages and driveways immediately adjacent to the residence. The latter situation is more common in townhome and/or condo complexes.

Commercial and Industrial Developments

Roads through commercial and/or industrial complexes were typically not captured unless they functioned as a "through" road or the complex contains multiple individual businesses that are not part of a single development such as a shopping mall, etc.

Dirt Roads

Dirt roads that traverse open space, agricultural, parks, or forested/brush areas were not captured, unless the road serviced three or more houses within relative proximity to one another.

Military Installations

NJ Counties: Roads through military installations were captured if there was a NJDOT Centerline and the road was paved.
PA Counties: Roads through military installations were captured if they were present on the county source data.

Mobile Home Parks

In general, roads through mobile home parks were not captured, except where the mobile homes gave the appearance of a "single family residential" neighborhood rather than a "residential park complex" configuration.

Parks, Cemeteries, and other Open Space

Roadways through parks were not captured if they weren't in the source data (centerlines, IS, or Curb data).

Rural Single family Residential

Roads servicing two houses or less are not considered Transportation: Roadway features, and were not added to the data. However, road casings may be left in the database if already in the IS or Curb dataset.

Additional Criteria

- Roadways were captured from curb to curb. They can include gravel shoulders and "pseudo-lanes" for turning into developments and/or streets off of the main roadway. They do not include parkways, sidewalks, or ROWs.
- Alleys are considered roadway land use features.
- All roadway land use features were coded as a single type, "04011 Transportation: Roadway". No distinction was made between road types, such as local, arterial, etc.
- *Street parking*. Parking areas in the street, both head-in and parallel parking, were included in the roadway polygon. In some cases, this resulted in previously mapped land use parking features (XXXX9) being

included in the roadway. Exceptions to this rule include head-in parking areas that were physically demarcated from the "main" road by physical barriers such as concrete curbs or other structures.

- *Pennsylvania county source data*. Where there were discrepancies between the roads on the source data and roads on the project imagery, the project image road took precedence. Existing road features in the source data that met the road capture criteria, were retained "as is" in the roadway land use unless the road did not exist on the image, there was a significant error in the source data representation, or the feature off-set from the image location was >10'.
- *2015 base imagery versus Google imagery*. Where discrepancies existed between roads shown on the 2015 base imagery and the supplemental Google imagery, the 2015 imagery took precedence. The roadway land use represents a "snapshot in time" of the roadways in 2015. So even if Google showed roads that had been added or removed at a later date, the mappers captured 2015 conditions.
- The Google imagery was used primarily to confirm ambiguous road conditions on the 2015 imagery. For example, if the 2015 imagery showed a roadway under construction where the full extent of the road is visible but unpaved and the later Google imagery confirmed the road was completed, the feature was captured in the 2015 layer.

Roadway Land Use Edgematch

All roadway land use features, regardless of source, were edgematched across production module, county, and state boundaries, to ensure a seamless roadway land use coverage across the study area.

Roadway Land Use and P2 Land Use Integration

Prior to the integration process, all roadway features were assigned the newly created land use code, "04011 Transportation: Roadway". The roadway land use data was then joined to the P2 land use to create a P3 land use layer. The roadway land use features displaced any overlapping P2 land use features. P2 land use boundaries located within the roadway land use polygons were programmatically removed. P2 land use "slivers" located outside of the roadway land use polygons that were created during the joining process were also programmatically removed.

Photo interpreters performed a visual review of the joined dataset by comparing the P3 land use layer features to the project imagery, to ensure that no problems occurred during the joining process. "Cut-off" P2 land use polygons, i.e., features that were below resolution but not small enough to qualify as a "sliver", were reviewed against the project imagery and the polygons edited per the P2 land use aggregation criteria.

In general, the roadway land use and P2 land use integration criteria followed the P2 land use mapping classification and data capture criteria established during the 2015 DVRPC P2 land use mapping project, including the minimum mapping size of land use, the retention of "remnant/cut-off" polygons, rules of aggregation, and the parking lot (XXXX9) minimum mapping size. New criteria added due to the integration process is shown below:

- The 04011 Transportation: Roadway features took precedence over other P2 land use types.
- Roadway Median Minimum Mapping Size
  - Open space, vacant land, and existing highway right-of-way land use types located between roadways were retained in the integrated data if they met the minimum mapping size requirements of 14 meter minimum width and/or 0.25 acre minimum mapping unit for non-median land use in roadways.
  - If they did not meet the minimum size requirements, the medians were captured as part of the Transportation: Roadway polygon.
- Remnant Highway Right-of-Way
  - Remnant 04010 Transportation: Highway Right-of-Way polygons that did not meet capture criteria were merged into the surrounding land use, including Roadway polygons, following the best-fit and aggregation rules.
- Below resolution P2 land use polygons were aggregated into adjacent non-Roadway (04011) polygons, using the following guidelines:

- If the below-resolution “remnant/cut-off” polygon was a built-up land use class, the polygon was retained in the data down to a MMU of approximately .10 acres.
- If the below-resolution “remnant/cut-off” polygon was a vegetated, open space, vacant land use class, or a built-up land use type <.10 acres, and it was not surrounded by Transportation: Roadway features, it was aggregated with an adjacent non-road land use type.

Integration Edgematch

All the integrated land use features in P3 were edgematched across production module, county, and state boundaries to ensure a seamless integrated land use dataset across the study area.

Quality Assurance Review

To ensure the accuracy and completeness of the roadway land use, a comprehensive quality assurance (QA) review was performed on P3 GIS layers to ensure the data adhered to the roadway land use and P2 land use data capture and integration criteria. A senior AIS staff member reviewed the data to verify accuracy and consistency among interpreters and the completeness of the data capture. The QA analyst also reviewed the roadway land use registration and the accuracy of the roadway-to-P2 land use integration to ensure the integrated land use in P3 conformed to the established P2 land use capture criteria. The edgematch across county and state boundaries was also reviewed and discrepancies along the edges were resolved.

Automated final checks were also performed to identify topology errors and invalid codes. A final quality control review was conducted on the completed geodatabase prior to the final delivery to ensure the data had been processed correctly.

DVRPC Review

Upon completion of roadway land use and integration for each state, a draft dataset containing the relevant counties was submitted to DVRPC for their review and acceptance. DVPRC review comments, if any, were re-delivered to AIS for revision, and if necessary, further comment. Upon completion of this process, the final data set was delivered to DVRPC.

Proper Sourcing

Recipients of DVRPC digital files are encouraged to credit DVRPC as the source of the data when producing maps, graphics, or other documents that utilize DVRPC files.

Metadata

The following metadata is for the latest (P3) DVRPC 2015 land use product. Table A-1 identifies the fields used in the GIS dataset, with descriptions of each field name. Table A-2 specifies the color names and Red, Green Blue (RGB) values used to display those colors in a GIS map project. Table A-3 describes how each subcategory of land use used is defined, what parent category it belongs in, its generalized development status, and former land use codes and category names. The RGB values for mapping subcategory features are also identified. Finally, Table A-4 provides a simpler cross-walk of how subcategories were previously classified in the P1 product and the land use datasets DVRPC published in the past.

Table A-1: Fields in GIS Dataset

Field Name	Description
lu15cat	Land use main category two-digit code.
lu15catn	Land use main category name.
lu15sub	Land use subcategory five-digit code.
lu15subn	Land use subcategory name.
lu15dev	Development status. A classification used to generalize land use into simple categories.
mixeduse	Mixed-Use status (Y/N). Features belonging to one of the Mixed-Use subcategories (Industrial: Mixed-Use, Multifamily Residential: Mixed-Use, or Commercial: Mixed-Use).
lufmcat	Former land use category code. Equivalent land use category codes employed during previous land use delineation (1990, 1995, 2000, 2005, and 2010), prior to the creation of the 2015 land use categories. This is not applicable to the 2015 "Transportation: Roadway" (04011) subcategory, since the newly-created roadways layer pulled from several different previous categories.
lufmcatn	Former land use category name. Equivalent land use category names employed during previous land use delineation (1990, 1995, 2000, 2005, and 2010), prior to the creation of the 2015 land use categories. This is not applicable to the 2015 "Transportation: Roadway" (04011) subcategory, since the newly-created roadways layer pulled from several different previous categories.
acres	Area of feature, in US acres.
GEOID	10-digit geographic identifier. In all DVRPC counties other than Philadelphia, a GEOID is assigned by municipality. In Philadelphia, it is assigned by County Planning Area (CPA).
state_name	State name.
co_name	County name.
mun_name	Municipal/CPA name. In Philadelphia, County Planning Area (CPA) names are used in place of municipal names.

Table A-2: Land Use Main Categories and Map Colors

		Mapping Color			
lu15cat	lu15catn	ArcGIS Color Name	R	G	B
01	Residential	Solar Yellow	255	255	0
03	Industrial	Lilac Dust	194	158	215
04	Transportation	Gray 60%	104	104	104
05	Utility	Rose Quartz	255	190	190
06	Commercial	Mars Red	255	0	0
07	Institutional	Sodalite Blue	190	232	255
08	Military	Delft Blue	0	132	168
09	Recreation	Citroen Yellow	230	230	0
10	Agriculture	Lime Dust	215	215	158
11	Mining	Tuscan Red	168	0	0
12	Wooded	Quetzel Green	76	230	0
13	Water	Big Sky Blue	0	197	255
14	Undeveloped	Medium Key Lime	165	245	122

Table A-3: GIS Layer Land Use Subcategory Metadata

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
01000	Residential: Single-Family Detached	Free-standing, permanent, residential structures, including related curtilage (where residential boundaries are evident). In cases where no boundaries are evident, their boundaries are estimated. In non-urban areas, single-family residential are mapped where there are three or more contiguous lots containing free-standing residential structures or where a single residential lot = two acres in size.	01	Residential	Residential	01000	Residential: Single-Family	255	255	0
01010	Residential: Multifamily	Multiple-unit residential structures, including related curtilage (where residential boundaries are evident). In cases where no boundaries are evident, their boundaries are estimated. Includes duplexes, retirement complexes (except nursing homes, which are coded 07010 Institutional: Medical), row homes, town homes, condominiums, and apartment buildings. High-rise apartment buildings with street level commercial are coded as Multifamily. *College dormitories (which are coded 07020 Institutional: Education) and military barracks (which are coded 08000 Military) are not included in Multifamily. Also not included are mixed-use areas with street-level commercial with between one and three floors of residential above, which are coded 06040 Commercial: Mixed-Use.*	01	Residential	Residential	02000	Residential: Multifamily	255	167	127
01019	Parking - Residential: Multifamily	Parking lots of ten or more spaces associated with 01010 Residential: Multifamily areas.	01	Residential	Residential	02009	Parking: Multifamily	156	156	156
01020	Residential: Mixed-Use	Multifamily residential structures, between five and ten stories in height, with street-level commercial. Includes related curtilage (where residential boundaries are evident). In cases where no boundaries are evident, their boundaries are estimated. *Multifamily buildings with street-level commercial that are four stories or less are coded 06040 Commercial: Mixed-Use. Multifamily residential structures with street-level commercial that are greater than ten stories in height are coded as 01010 Residential: Multifamily.*	01	Residential	Residential	06000	Commercial	230	152	0
01029	Parking - Residential: Mixed-Use	Parking lots of ten or more spaces associated with 01020 Residential: Mixed-Use areas.	01	Residential	Residential	06009	Parking: Commercial	156	156	156

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
01030	Residential: Mobile Home	Collections of small, manufactured, non-permanent housing; includes related curtilage, but not recreational areas or other shared open space.	01	Residential	Residential	02020	Residential: Mobile Home	255	211	127
01039	Parking - Residential: Mobile Home	Parking lots of ten or more spaces associated with 01030 Residential: Mobile Home areas.	01	Residential	Residential	02029	Parking: Mobile Home	156	156	156
03000	Industrial: General	Properties related to the manufacturing, processing, or assembly of goods. Includes industrial parks, oil refineries, oil and gas storage facilities, chemical plants, steel and metal fabrication, shipbuilding, grain elevators, port terminals, manufacturing and assembly facilities (i.e., automobile production, pharmaceutical). Also includes industrial properties where there is no clear use, or is a mix of office space and manufacturing. *Does not include storage and distribution centers, which are coded 03020 Industrial: Warehousing/Distribution/Open Storage.*	03	Industrial	Other Developed	03000	Manufacturing	194	158	215
03009	Parking - Industrial: General	Parking lots of ten or more spaces associated with 03000 Industrial: General areas.	03	Industrial	Other Developed	03009	Parking: Manufacturing	156	156	156
03010	Industrial: Mixed-Use	Areas of mixed commercial and industrial use where the two uses intermix and cannot be mapped separately due to the minimum mapping size requirements. Typically occurs in “flex” developments where the buildings are designed to convert between commercial and light industrial use and a single building contains multiple units. Often found in Business, Commercial, and Industrial parks. It can also occur in older areas where the existing land use can predate modern zoning regulations separating commercial and industrial use.	03	Industrial	Other Developed	06000	Commercial	170	102	205
03019	Parking - Industrial: Mixed-Use	Parking lots of ten or more spaces associated with 03010 Industrial: Mixed-Use areas.	03	Industrial	Other Developed	06009	Parking: Commercial	156	156	156

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
03020	Industrial: Warehousing/ Distribution/ Open Storage	Properties related to warehousing and distribution of goods. Includes small and large warehousing and distribution facilities. Includes auto junkyards, and open storage of truck trailers, cars, materials, and equipment that are not associated with another use. *Does not include metal scrap yards (05040 Utility: Recycling), or public open storage of RVs, "toy" hauler trailers, yacht storage (06070 Commercial: Public Storage). Also not included are truck transfer facilities, (04000 Transportation: Facility), moving and storage companies or public storage facilities (06070 Commercial: Public Storage), or warehousing/distribution located on-site with manufacturing facilities (03000 Industrial: General).*	03	Industrial	Other Developed	06000	Commercial	202	122	245
03029	Parking - Industrial: Warehousing/ Distribution/ Open Storage	Parking lots of ten or more spaces associated with 03020 Industrial: Warehousing/Distribution/Open Storage areas.	03	Industrial	Other Developed	06009	Parking: Commercial	156	156	156
04000	Transportation: Facility	Any transportation-related uses that are neither parking lots nor represented in the subcategories below. Includes rail facilities, rail stations and terminals, roundhouses, highway maintenance yards, rest stops, bus terminals, marinas, and all intermodal facilities (ports, rail freight terminals, trucking terminals).	04	Transportation	Other Developed	04000	Transportation	104	104	104
04009	Parking - Transportation: Facility	Parking lots of ten or more spaces associated with 04000 Transportation: Facility areas.	04	Transportation	Other Developed	04009	Parking: Transportation	156	156	156

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
04010	Transportation: Highway Right-of-Way	The non-roadway portion of highways. This includes landscaping and vacant land that can be clearly associated with the ROW. Also included are vacant, wooded, and under construction land uses that are located between the developed lanes, on/off ramps, and jug handles. Vacant and under construction land uses located outside of, but adjacent to, the major highway lanes are also included if the uses can be clearly linked to the highway transportation corridor. *Otherwise, they are coded either 14000 Undeveloped: General or 14010 Undeveloped: Transitional Land, respectively. Wooded areas located outside of, but adjacent to, the major highway lanes are captured as 12000 Wooded. Drainage basins within the highway ROW are captured as 14020 Undeveloped: Drainage Basin.*	04	Transportation	Other Developed	04000	Transportation	117	117	117
4011	Transportation: Roadway	Roadway consists of transportation corridors such as freeways, toll roads, major highways, thoroughfares, commuter roads, and single- family residential roads. Roads in commercial, industrial, multifamily residential, mobile homes, or government complexes, parks, and other open space land uses, are typically not captured as Roadway but included with the associated land use. Roadway features are captured from curb to curb, and include the through-lanes, on/off-ramps, jug handles, gravel shoulders and “pseudo-lanes” for turning into developments and/or streets off of the main roadway. Parking areas in the street, both head-in and parallel parking, are included in the roadway polygon, excluding head-in parking areas that are physically demarcated from the “main” road by physical barriers such as concrete curbs or other structures. *They do not include parkways, sidewalks, or ROWs.*	04	Transportation	Other Developed	99999	Non-Applicable	204	204	204

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
04020	Transportation: Rail Right-of-Way	Rail right-of-way with three or more sets of railroad tracks. Includes the road bed, rail lines, rail facilities within the ROW, e.g., switching stations, etc., and adjacent vacant land that can clearly be associated with the railroad. Includes abandoned rail lines if the tracks are still present. Existing rail ROW features captured during previous DVRPC land use inventories will be retained in the data, even if they do not meet the current Rail ROW criteria. *Rail ROWs that have been converted to other uses are captured for the new use according to the capture criteria. Train stations located in the rail ROW are captured as 04000 Transportation: Facility.*	04	Transportation	Other Developed	04000	Transportation	130	130	130
04030	Transportation: Airport	Public and private-use airfields and facilities. *Does not include military airbases, which are coded 08000 Military.*	04	Transportation	Other Developed	04000	Transportation	178	178	178
04039	Parking - Transportation: Airport	Parking lots of ten or more spaces associated with 04030 Transportation: Airport areas.	04	Transportation	Other Developed	04000	Transportation	156	156	156
05000	Utility: Right-of-Way	Linear paths that have been cleared for the purposes of above- or below-ground transmission of utilities (electrical, communication, natural gas). Where transmission lines are present, this category should take priority over vacant and agricultural land use categories. *It does not take precedence over other built-up land use, 09000 Recreation: General, or 14010 Undeveloped: Transitional Land.*	05	Utility	Other Developed	05000	Utility	255	190	190
05010	Utility: Landfill	Landfills and supporting facilities. Includes closed landfills, unless converted to another active use (golf course, park).	05	Utility	Other Developed	05000	Utility	177	133	133
05019	Parking - Utility: Landfill	Parking lots of ten or more spaces associated with 05010 Utility: Landfill areas.	05	Utility	Other Developed	05009	Parking: Utility	156	156	156
05020	Utility: Wastewater Treatment	Wastewater treatment plants.	05	Utility	Other Developed	05000	Utility	203	152	152

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
05029	Parking - Utility: Wastewater Treatment	Parking lots of ten or more spaces associated with 05020 Wastewater Treatment areas.	05	Utility	Other Developed	05009	Parking: Utility	156	156	156
05030	Utility: Other Facility	Any utility-based facilities (other than wastewater, landfill or recycling facilities). Includes electric generation plants and substations, natural gas production plants, water towers (and accompanying land), data centers, refuse and garbage plants, and incinerators. Includes areas of solar panels that are being used specifically to contribute to the electrical grid, such as solar farms, where the panels total two acres or more in size. *Neither oil refineries, nor oil or gas storage facilities, which are coded 03000 Industrial: General exist in this subcategory. Solar panels associated with another land use, such as housing, commercial, industrial, etc., coded for the land use, not as Utility.*	05	Utility	Other Developed	05000	Utility	229	171	171
05039	Parking - Utility: Other Facility	Parking lots of ten or more spaces associated with 05030 Utility: Other Facility areas.	05	Utility	Other Developed	05009	Parking: Utility	156	156	156
05040	Utility: Recycling	Facilities associated with recycling activities. Includes public and private recycling facilities for green waste (mulch), electronics, metal, oil, concrete, and land reclamation. Includes facilities located on-site with other land use types, such as green waste located on mining operations. Metal scrap yards are also included, even if the yard is not specifically designated as a recycling facility. *The exception is recycling located on-site with landfills; these are captured as 05010 Utility: Landfill.*	05	Utility	Other Developed	05000	Utility	255	218	218
05049	Parking - Utility: Recycling	Parking lots of ten or more spaces associated with 05040 Utility: Recycling areas.	05	Utility	Other Developed	05009	Parking: Utility	156	156	156

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
06000	Commercial: General	Commercial properties not assigned one of the subcategories below. This category includes smaller retail trade and services as well as smaller office/professional activities. Examples include but are not limited to: grocery stores; department stores; eating and drinking establishments; gasoline service stations; motor vehicle sales; garden supplies; finance, insurance, and real estate services; personal services; business services, repair services, professional services; construction services. Buildings that are adjacent to larger retail centers but are distinct from them fall in this group.	06	Commercial	Other Developed	06000	Commercial	255	0	0
06009	Parking - Commercial: General	Parking lots of ten or more spaces associated with 06000 Commercial: General areas.	06	Commercial	Other Developed	06009	Parking: Commercial	156	156	156
06010	Commercial: Shopping Mall	Large-scale indoor shopping malls; the parking typically surrounds the building. The malls are typically anchored by "name" department stores at one or more locations with the smaller stores located in-between them. *Large-scale outdoor shopping venues, including outlet malls, are captured as 06020 Commercial: Regional and Community Retail Center.*	06	Commercial	Other Developed	06000	Commercial	255	102	204
06019	Parking - Commercial: Shopping Mall	Parking lots of ten or more spaces associated with 06010 Commercial: Shopping Mall areas.	06	Commercial	Other Developed	06009	Parking: Commercial	156	156	156
06020	Commercial: Regional and Community Retail Center	Retail shopping areas where the building contains more than one store and the center shares a common off-street parking area. Parking is usually located in front and to the sides of the building. Includes strip commercial shopping centers, grocery store shopping areas, large-scale outdoor shopping venues, and outdoor outlet malls. *Single retail buildings are captured as either 06000 Commercial: General or 06030 Commercial: Single Large-Site Retail, depending on the type of commercial use.*	06	Commercial	Other Developed	06000	Commercial	246	74	138

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
06029	Parking - Commercial: Regional and Community Retail Center	Parking lots of ten or more spaces associated with 06020 Commercial: Regional and Community Retail Center areas.	06	Commercial	Other Developed	06009	Parking: Commercial	156	156	156
06030	Commercial: Single Large-Site Retail	Large, stand-alone retail shopping ("big-box") establishments, where the building houses a single business. Parking is usually located in front and to the sides of the building. Includes stores that are located within the same shopping center, as long as they are not connected to each other or other buildings. Typical examples of "big box" stores include Costco, Lowes, Home Depot, Walmart, and Target. Can also include department stores, such as Macy's, Bloomingdales, etc., if they are not part of a shopping mall, and large supermarkets that approach the size of a "big-box" store. *Where typical "big box" stores are not stand-alone but connected to other buildings, they are captured as either 06010 Commercial: Shopping Mall or 06020 Commercial: Regional and Community Retail Center depending on the situation.*	06	Commercial	Other Developed	06000	Commercial	224	17	95
06039	Parking - Commercial: Single Large-Site Retail	Parking lots of ten or more spaces associated with 06030 Commercial: Single Large-Site Retail areas.	06	Commercial	Other Developed	06009	Parking: Commercial	156	156	156
06040	Commercial: Mixed-Use	Commercial located in areas where there is a likelihood of one or more residential units included in the parcel on the upper floors of the building. In newer "mixed-use" developments, this category is applied if the residential and commercial components share a single building. In older urban areas characterized by a block of storefronts, all parcels in the block receive this code provided the majority of buildings are two to four stories high and that there is evidence (such as Census housing unit counts) that some of the buildings contain dwelling units in the upper floors. *Buildings taller than four stories that are predominantly multifamily are coded 01010 Multifamily.*	06	Commercial	Other Developed	06000	Commercial	247	127	190

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
06049	Parking - Commercial: Mixed-Use	Parking lots of ten or more spaces associated with 06040 Commercial: Mixed-Use areas.	06	Commercial	Other Developed	06009	Parking: Commercial	156	156	156
06050	Commercial: Office	Office buildings, including large scale stand-alone office buildings as well as office complexes and corporate campuses. *Small- to medium-scale office buildings (such as dentists, insurance, medical practices, etc.) are captured as 06000 Commercial: General.*	06	Commercial	Other Developed	06000	Commercial	255	0	255
06059	Parking - Commercial: Office	Parking lots of ten or more spaces associated with 06050 Commercial: Office areas.	06	Commercial	Other Developed	06009	Parking: Commercial	156	156	156
06060	Commercial: Hotel/Motel	Short-term lodging facilities. *Does not include associated recreational facilities (09000 Recreation: General) or golf courses (09010 Recreation: Golf Course).*	06	Commercial	Other Developed	06000	Commercial	181	51	137
06069	Parking - Commercial: Hotel/Motel	Parking lots of ten or more spaces associated with 06060 Commercial: Hotel/Motel areas.	06	Commercial	Other Developed	06009	Parking: Commercial	156	156	156
06070	Commercial: Public Storage	Properties for long-term commercial storage. Includes public storage facilities, RV and boat storage, and moving/storage companies. *Does not include open storage of boats, RVs, trailers on military land (08000 Military).*	06	Commercial	Other Developed	06000	Commercial	200	65	134
06079	Parking - Commercial: Public Storage	Parking lots of ten or more spaces associated with 06070 Commercial: Public Storage areas.	06	Commercial	Other Developed	06009	Parking: Commercial	156	156	156

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
07000	Institutional: General	Institutional properties not assigned one of the subcategories below. This category includes: government services other than military (executive, legislative, and judicial functions, police, fire, postal services, public libraries); community centers (not including residential community centers (09000 Recreation: General); assisted living facilities; YMCA, YWCA, and Salvation Army service centers; Moose, Elks, VFW, and similar service organizations; other tax-exempt social service organizations that provide specific social services for people; and museums, historical sites, and aquariums.	07	Institutional	Other Developed	07000	Community Services	190	232	255
07009	Parking - Institutional: General	Parking lots of ten or more spaces associated with 07000 Institutional: General areas.	07	Institutional	Other Developed	07009	Parking: Community Services	156	156	156
07010	Institutional: Medical	All medical facilities that provide overnight care, such as hospitals, nursing homes, and in-patient rehabilitation clinics. Includes medical services that do not provide overnight care, if they are located in medical office buildings, on hospital campuses, as "stand-alone" buildings, or in medical clinic settings. Examples of medical services include, but are not limited to, the following: Urgent care facilities, medical office buildings, medical services on hospital campuses, medical faculty group offices, medical clinics, ambulatory care clinics, out-patient surgery facilities/centers, dialysis centers, imaging facilities, and blood labs. *Medical services located in general office buildings are captured as 06050 Commercial: Office. Medical services located in retail buildings are captured in the as appropriate Commercial subcategory.*	07	Institutional	Other Developed	07000	Community Services	178	255	255
07019	Parking - Institutional: Medical	Parking lots of ten or more spaces associated with 07010 Institutional: Medical areas.	07	Institutional	Other Developed	07009	Parking: Community Services	156	156	156
07020	Institutional: Education	Subcategory Description: Public and non-public schools, colleges, and universities. *Does not include recreational fields (09000 Recreation) or medical faculties (07010 Institutional: Medical) associated with the schools.*	07	Institutional	Other Developed	07000	Community Services	115	194	251

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
07029	Parking - Institutional: Education	Parking lots of ten or more spaces associated with 07020 Institutional: Education areas.	07	Institutional	Other Developed	07009	Parking: Community Services	156	156	156
07030	Institutional: Religious	Houses of worship, along with associated structures and property.	07	Institutional	Other Developed	07000	Community Services	129	216	208
07039	Parking - Institutional: Religious	Parking lots of ten or more spaces associated with 07030 Institutional: Religious areas.	07	Institutional	Other Developed	07009	Parking: Community Services	156	156	156
07040	Institutional: Correctional Facility and Detention Center	Prisons and other correctional facilities, including jails and juvenile detention centers. The facilities may have low, medium, or high security.	07	Institutional	Other Developed	07000	Community Services	100	149	237
07049	Parking - Correctional Facility and Detention Center	Parking lots of ten or more spaces associated with 07040 Institutional: Correctional Facility and Detention Center areas.	07	Institutional	Other Developed	07009	Parking: Community Services	156	156	156
07050	Institutional: Cemetery	Cemeteries and mausoleums.	07	Institutional	Other Developed	07000	Community Services	176	224	230
07059	Parking - Institutional: Cemetery	Parking lots of ten or more spaces associated with 07050 Institutional: Cemetery areas.	07	Institutional	Other Developed	07009	Parking: Community Services	156	156	156
08000	Military	Military includes all military installations, such as bases and camps, armories, airbases, naval bases and air stations, and Coast Guard bases. Includes all built-up areas on military land, such as barracks, personnel housing, community services, military schools, etc. The parcel data will be used to define the current military boundary.	08	Military	Other Developed	08000	Military	0	132	168
08009	Parking - Military	Parking lots of ten or more spaces associated with 08000 Military areas	08	Military	Other Developed	08009	Parking: Military	156	156	156

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
09000	Recreation: General	Areas designated for recreational activities (other than golf courses, which are coded 09010 Golf Course). Includes recreational parks and playgrounds (including those associated with schools), picnic areas, campgrounds, fairgrounds, recreational boat launches, swimming pools, theatres, stadiums and arenas, zoos, botanical gardens, amusement parks, and non-military firing ranges.	09	Recreation	Other Developed	09000	Recreation	230	230	0
09009	Parking - Recreation: General	Parking lots of ten or more spaces associated with 09000 Recreation: General areas.	09	Recreation	Other Developed	09009	Parking: Recreation	156	156	156
09010	Recreation: Golf Course	Public and non-public golf courses, country clubs and driving ranges, including associated buildings.	09	Recreation	Other Developed	09000	Recreation	184	184	0
09019	Parking - Recreation: Golf Course	Parking lots of ten or more spaces associated with 09010 Recreation: Golf Course areas.	09	Recreation	Other Developed	09009	Parking: Recreation	156	156	156
10000	Agriculture	Farmland (active and fallow) devoted to crops, pastures, orchards, tree farms, or other agricultural uses. Also included are agricultural bogs (including dry bogs and surrounding work areas), mown fields serving as habitat management areas, nurseries, greenhouses, sod farms, horse farms, and cattle, pig, poultry and dairy farms. The farmstead and associated buildings are included as well. Packing houses adjacent to agricultural fields are included. *Packing houses and grain elevators outside of agricultural areas are captured as 03000 Industrial: General. If large transmission lines clearly continue through an agricultural area, 05000 Utility: Right-of-Way land use takes priority.*	10	Agriculture	Agriculture	10000	Agriculture	215	215	158
10009	Parking - Agriculture	Parking lots of ten or more spaces associated with 10000 Agriculture areas.	10	Agriculture	Agriculture	10009	Parking: Agriculture	156	156	156
11000	Mining	Land devoted to mining and quarrying activities. Includes active sites, as well as inactive sites where there has been no visible attempt at reclamation or re-use.	11	Mining	Other Developed	11000	Mining	168	0	0
11009	Parking - Mining	Parking lots of ten or more spaces associated with 11000 Mining areas.	11	Mining	Other Developed	11009	Parking: Mining	156	156	156

Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
12000	Wooded	Land containing 50 percent or more wooded canopy cover, including both trees and shrubs. Hedgerows (windrows) and wooded landscaping associated with residences are not interpreted as Wooded. An area that may be emerging from former agricultural fields or vacant land that contains 50 percent wooded cover is considered Wooded. Areas where the trees have been thinned due to logging or other anthropogenic activity, or due to environmental causes such as fire, disease, flooding, or wind storm, will be coded as Wooded if the remaining canopy cover is 50 percent or more. *05000 Utility: Right-of-Way land use takes priority.*	12	Wooded	Wooded or Vacant	12000	Wooded	76	230	0
13000	Water	Water areas are rivers, canals, streams, lakes, reservoirs, and ponds that have two definable boundaries. Single line hydrology is not defined. When coexisting with another land use, other than Transportation, the Water land use takes priority. In non-tidal areas, the water will be mapped to the current extent of the water as seen on the baseline imagery. In tidal areas, the water will be mapped to include tidal mud flats that can be exposed during lower tides. Fluctuations in managed water bodies that support cranberry bog operations will not be captured. Water in drainage basins will be mapped as Water if it can be determined that the water is perennial in nature, not intermittent.	13	Water	Water	13000	Water	0	197	255
14000	Undeveloped: General	Open space that is either vacant or cleared or in a natural state, that is not clearly wooded and is not tied to another use. In residential areas, includes undeveloped parcels in mature subdivisions (when not owned by an adjacent landowner), as well as undeveloped parcels in newer subdivisions where general construction activities have been completed or appear suspended. *Does not include vacant developed properties where buildings and infrastructure are intact. 05000 Utility: Right-of-Way land use takes priority.*	14	Undeveloped	Wooded or Vacant	1201	Vacant	165	245	122

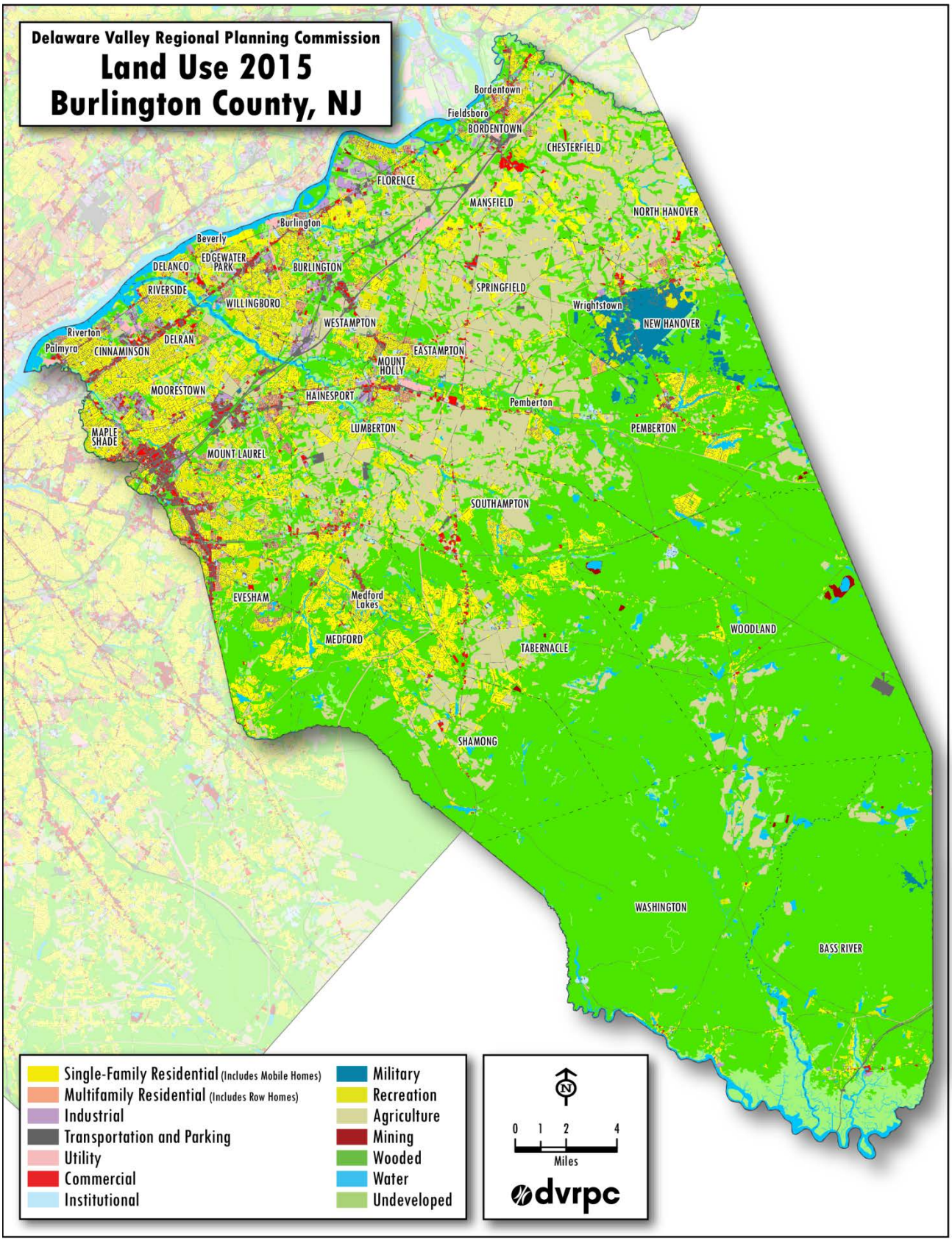
Table A-3: GIS Layer Land Use Subcategory Metadata (continued)

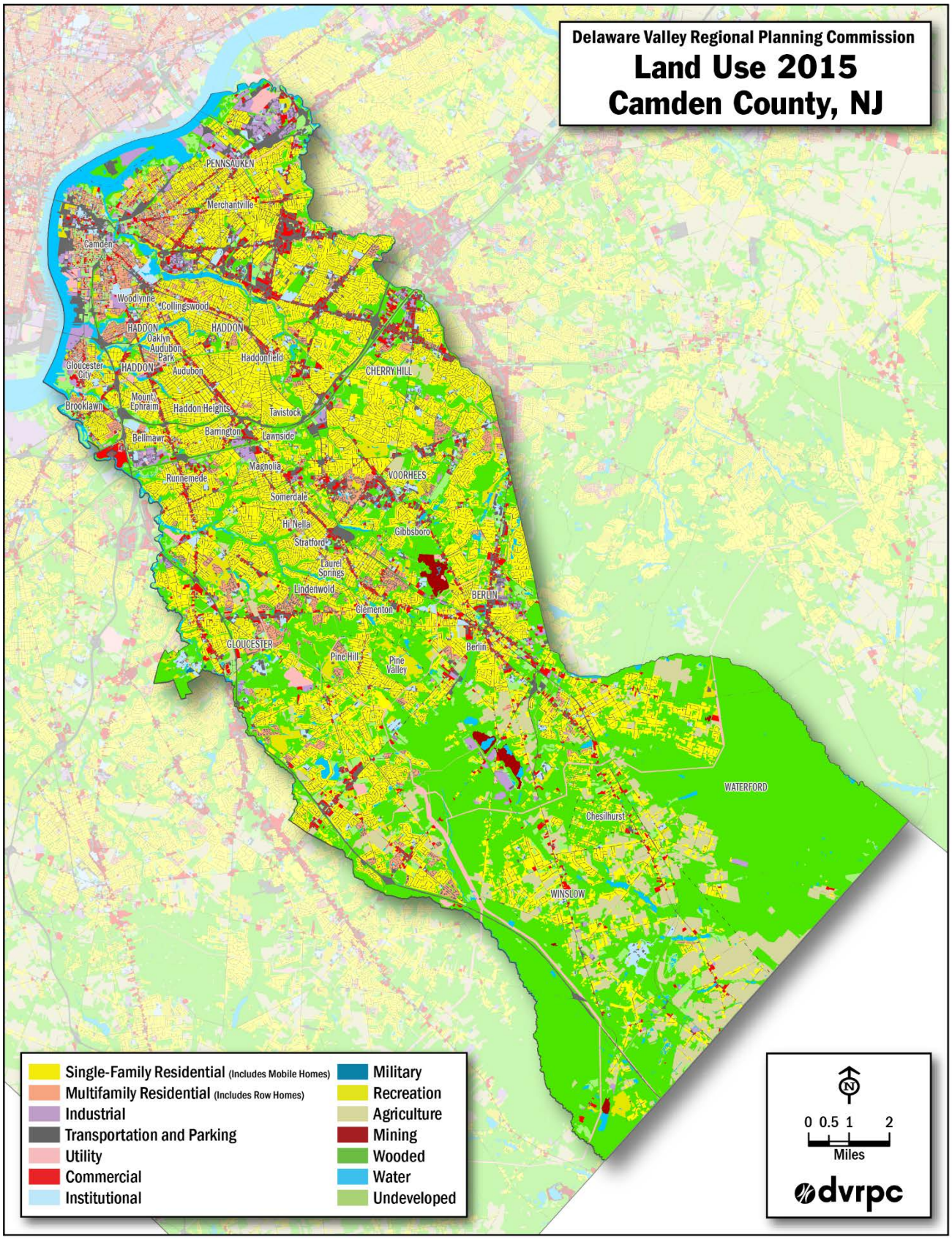
Subcategory		Subcategory Description	Parent Category		Development Status	Former LU Category		Mapping Color		
lu15subn	lu15sub		lu15cat	lu15catn	lu15dev	lufmcat	lufmcatn	R	G	B
14009	Parking - Undeveloped: Undetermined Use	Parking lots for which the associated use is unclear. Includes parking lots that remain after the associated building/land use has been removed. Also includes new and existing parking lots that cannot be correlated to a specific land use. *If the parking lot is no longer viable - the asphalt is broken and crumbled, vegetation has started to grow, portions of the lot have been removed - the area will be coded as 14000 Undeveloped: General.*	14	Undeveloped	Wooded or Vacant	1201	Vacant	156	156	156
14010	Undeveloped: Transitional Land	Areas that are under construction or active demolition. If the area is under construction and the new use can be determined, code the polygon for the new use. Transitional land takes precedence over 05000 Utility: Right-of-Way.	14	Undeveloped	Wooded or Vacant	1201	Vacant	148	220	110
14020	Undeveloped: Drainage Basin	Land that functions as a drainage/storm-water basin. Includes intermittent water in the basin. *Basins with perennial water are coded as 13000 Water.*	14	Undeveloped	Wooded or Vacant	1201	Vacant	131	195	98

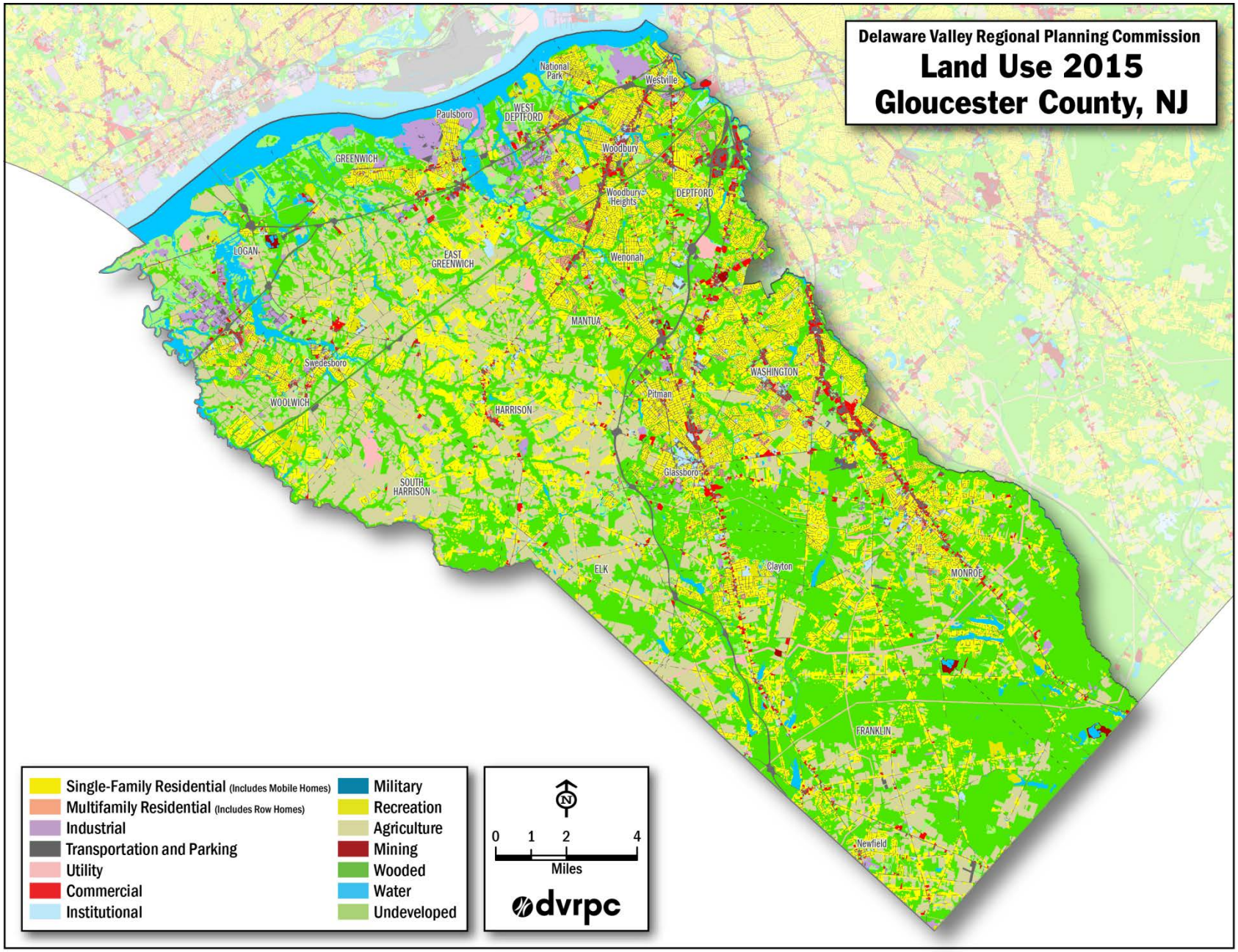
Table A-4: Crosswalk of P1 and P3 Land Use Categories

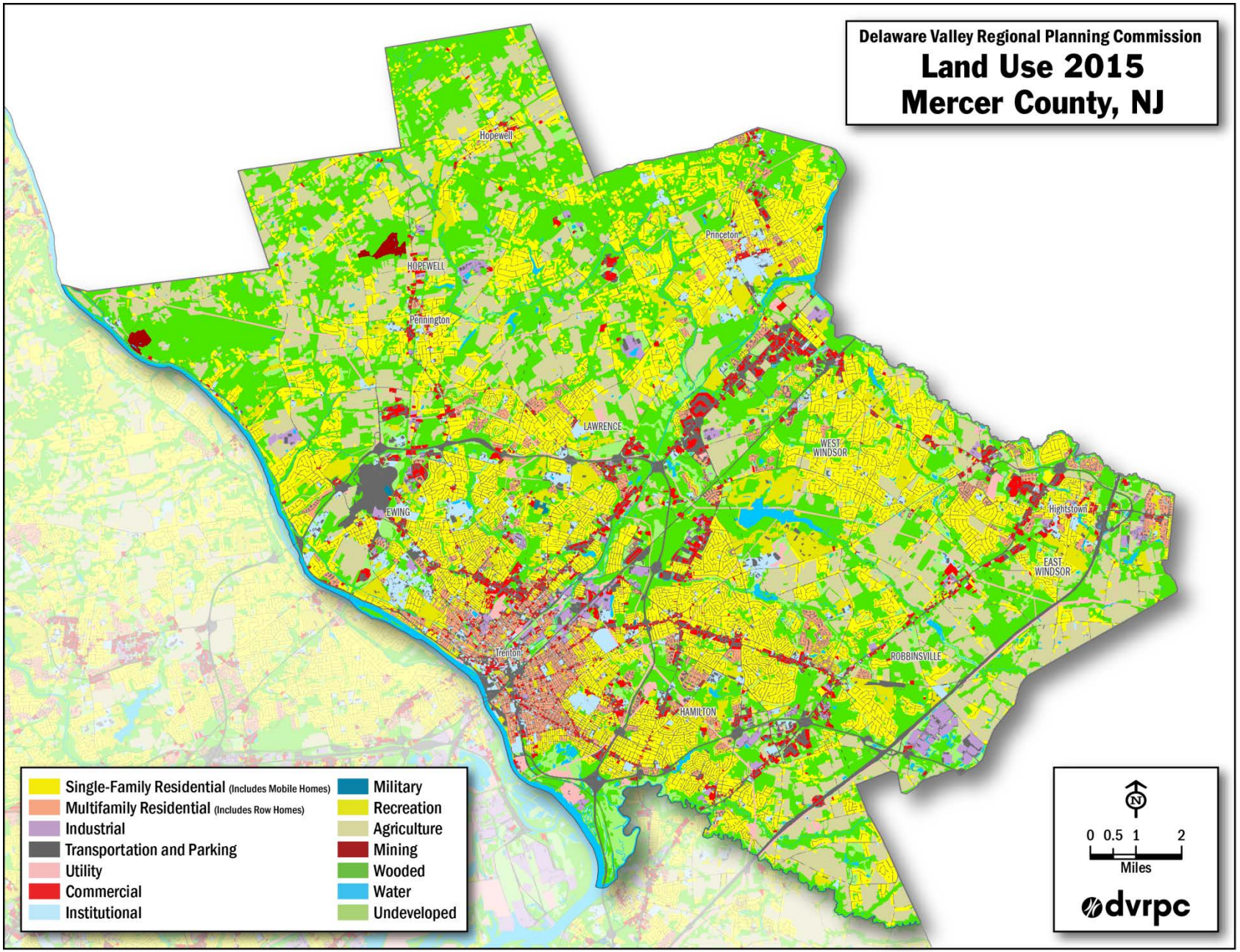
P1 Land Use Categories		P3 Land Use Categories	
Code	**Description**	**Code**	**Description**
01000	Residential: Single-Family Detached	01000	Residential: Single-Family Detached
02000	Residential: Multifamily	01010	Residential: Multifamily
02010	Residential: Row Home		
02009	Parking: Multifamily	01019	Parking - Residential: Multifamily
02019	Parking: Row Home		
02020	Residential: Mobile Home	01030	Residential: Mobile Home
02029	Parking: Mobile Home	01039	Parking - Residential: Mobile Home
03000	Manufacturing: Light Industrial	03000	Industrial: General
03010	Manufacturing: Heavy Industrial		
03009	Parking: Light Industrial	03009	Parking - Industrial: General
03019	Parking: Heavy Industrial		
04000	Transportation	04000	Transportation: Facility
		04010	Transportation: Highway Right-of-Way
		04020	Transportation: Rail Right-of-Way
		04030	Transportation: Airport
04009	Parking: Transportation	04009	Parking - Transportation: Facility
		04039	Parking - Transportation: Airport
05000	Utility	05000	Utility: Right-of-Way
		05010	Utility: Landfill
		05020	Utility: Wastewater Treatment
		05030	Utility: Other Facility
		05040	Utility: Recycling
05009	Parking: Utility	05019	Parking - Utility: Landfill
		05029	Parking - Utility: Wastewater Treatment
		05039	Parking - Utility: Other Facility
		05049	Parking - Utility: Recycling
06000	Commercial	01020	Residential: Mixed-Use
		03010	Industrial: Mixed-Use
		03020	Industrial: Warehousing/Distribution/Open Storage
		06000	Commercial: General
		06010	Commercial: Shopping Mall
		06020	Commercial: Regional and Community Retail Center
		06030	Commercial: Single Large-Site Retail
		06040	Commercial: Mixed-Use
		06050	Commercial: Office
		06060	Commercial: Hotel/Motel
		06070	Commercial: Public Storage

Appendix B: County Land Use Maps, 2015


Delaware Valley Regional Planning Commission
Land Use 2015
Burlington County, NJ
Bordentown
Fieldsboro
BORDENTOWN
CHESTERFIELD
FLORENCE
MANSFIELD
NORTH HANOVER
Burlington
Beverly
EDGEWATER PARK
DELANCO
BURLINGTON
RIVERSIDE
WILLINGBORO
SPRINGFIELD
Wrightstown
NEW HANOVER
WESTAMPTON
Riverton
Palmyra
CINNAMINSON
DELRAN
EASTAMPTON
MOUNT HOLLY
MOORESTOWN
HAINESPORT
Pemberton
LUMBERTON
PEMBERTON
MAPLE SHADE
MOUNT LAUREL
SOUTHAMPTON
EVESHAM
Medford Lakes
MEDFORD
WOODLAND
TABERNACLE
SHAMONG
WASHINGTON
BASS RIVER
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
Industrial
Transportation and Parking
Utility
Commercial
Institutional
Military
Recreation
Agriculture
Mining
Wooded
Water
Undeveloped
N
0 1 2 4
Miles
dvrpc


Delaware Valley Regional Planning Commission
Land Use 2015
Camden County, NJ
PENNSAUKEN
Merchantville
Camden
Woodlynne
Collingswood
HADDON
HADDON
Oaklyn
Audubon
Park
Audubon
Haddonfield
Gloucester City
HADDON
CHERRY HILL
Brooklawn
Mount Ephraim
Haddon Heights
Tavistock
Barrington
Lawnside
Bellmawr
Magnolia
Runnemede
VOORHEES
Somerdale
Hi Nella
Stratford
Gibbsboro
Laurel Springs
Lindenwold
BERLIN
Clementon
GLOUCESTER
Pine Hill
Pine Valley
Berlin
WATERFORD
Chesilhurst
WINSLOW
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
Industrial
Transportation and Parking
Utility
Commercial
Institutional
Military
Recreation
Agriculture
Mining
Wooded
Water
Undeveloped
N
0 0.5 1 2
Miles
dvrpc


Delaware Valley Regional Planning Commission
Land Use 2015
Gloucester County, NJ
National Park
Westville
Paulsboro
WEST DEPTFORD
Woodbury
GREENWICH
Woodbury Heights
DEPTFORD
LOGAN
EAST GREENWICH
Wenonah
MANTUA
Swedesboro
WASHINGTON
Pitman
WOOLWICH
HARRISON
Glassboro
SOUTH HARRISON
ELK
Clayton
MONROE
FRANKLIN
Newfield
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
Industrial
Transportation and Parking
Utility
Commercial
Institutional
Military
Recreation
Agriculture
Mining
Wooded
Water
Undeveloped
N
0 1 2 4
Miles
dvrpc


Delaware Valley Regional Planning Commission
Land Use 2015
Mercer County, NJ
Hopewell
HOPEWELL
Pennington
Princeton
LAWRENCE
WEST WINDSOR
EWING
Hightstown
EAST WINDSOR
Trenton
ROBBINSVILLE
HAMILTON
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
Industrial
Transportation and Parking
Utility
Commercial
Institutional
Military
Recreation
Agriculture
Mining
Wooded
Water
Undeveloped
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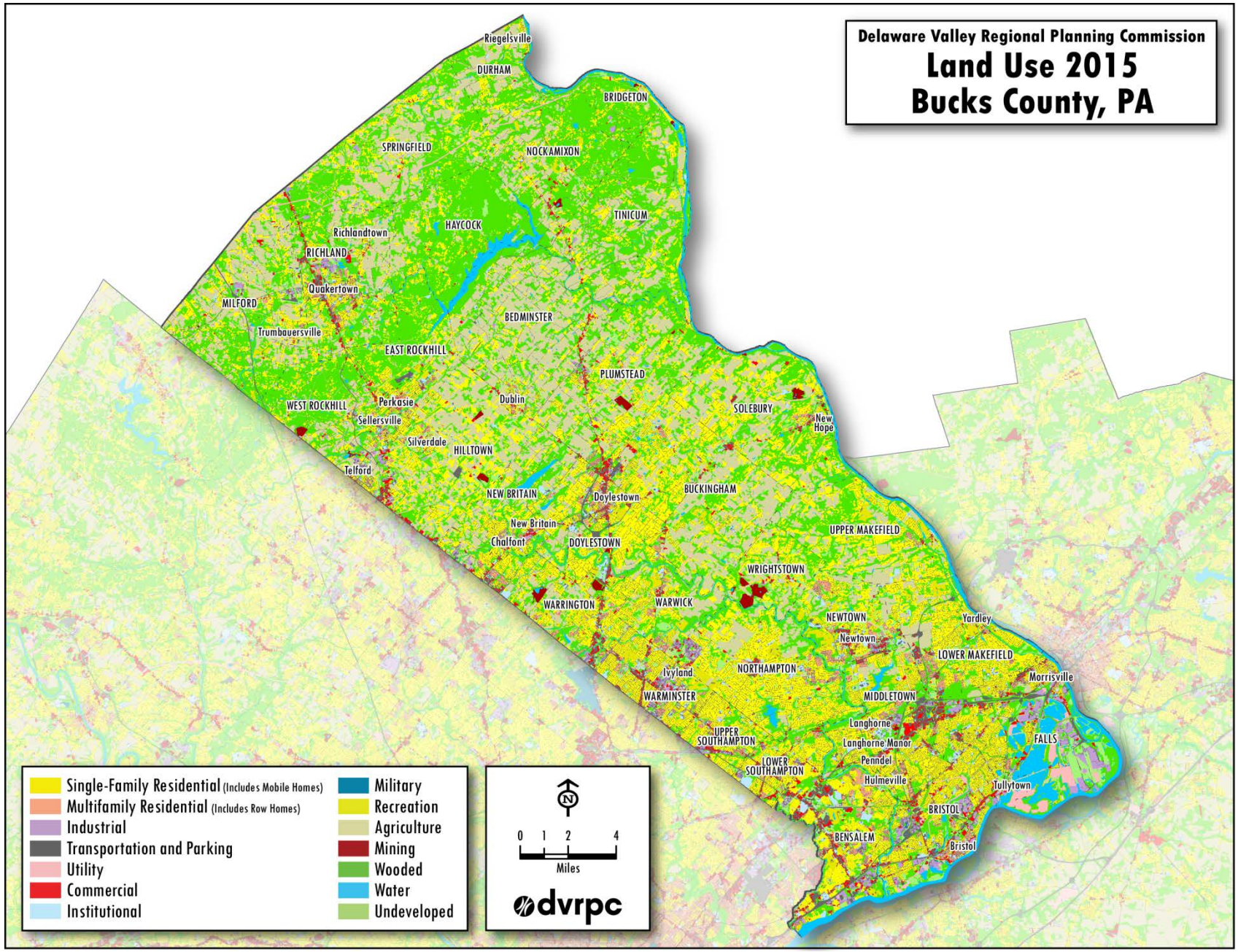
Miles
dvrpc


Delaware Valley Regional Planning Commission
Land Use 2015
Bucks County, PA
Riegelsville
DURHAM
BRIDGETON
SPRINGFIELD
NOCKAMIXON
TINICUM
HAYCOCK
Richlandtown
RICHLAND
Quakertown
MILFORD
BEDMINSTER
Trumbauersville
EAST ROCKHILL
PLUMSTEAD
WEST ROCKHILL
Perkasie
Dublin
SOLEBURY
New Hope
Sellersville
Silverdale
HILLTOWN
Telford
NEW BRITAIN
Doylestown
BUCKINGHAM
New Britain
Chalfont
DOYLESTOWN
UPPER MAKEFIELD
WRIGHTSTOWN
WARRINGTON
WARWICK
NEWTOWN
Yardley
Newtown
LOWER MAKEFIELD
Ivyland
NORTHAMPTON
Morrisville
WARMINSTER
MIDDLETOWN
Langhorne
UPPER SOUTHAMPTON
Langhorne Manor
FALLS
Penndel
LOWER SOUTHAMPTON
Hulmeville
Tullytown
BRISTOL
BENSALEM
Bristol
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
Industrial
Transportation and Parking
Utility
Commercial
Institutional
Military
Recreation
Agriculture
Mining
Wooded
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Undeveloped
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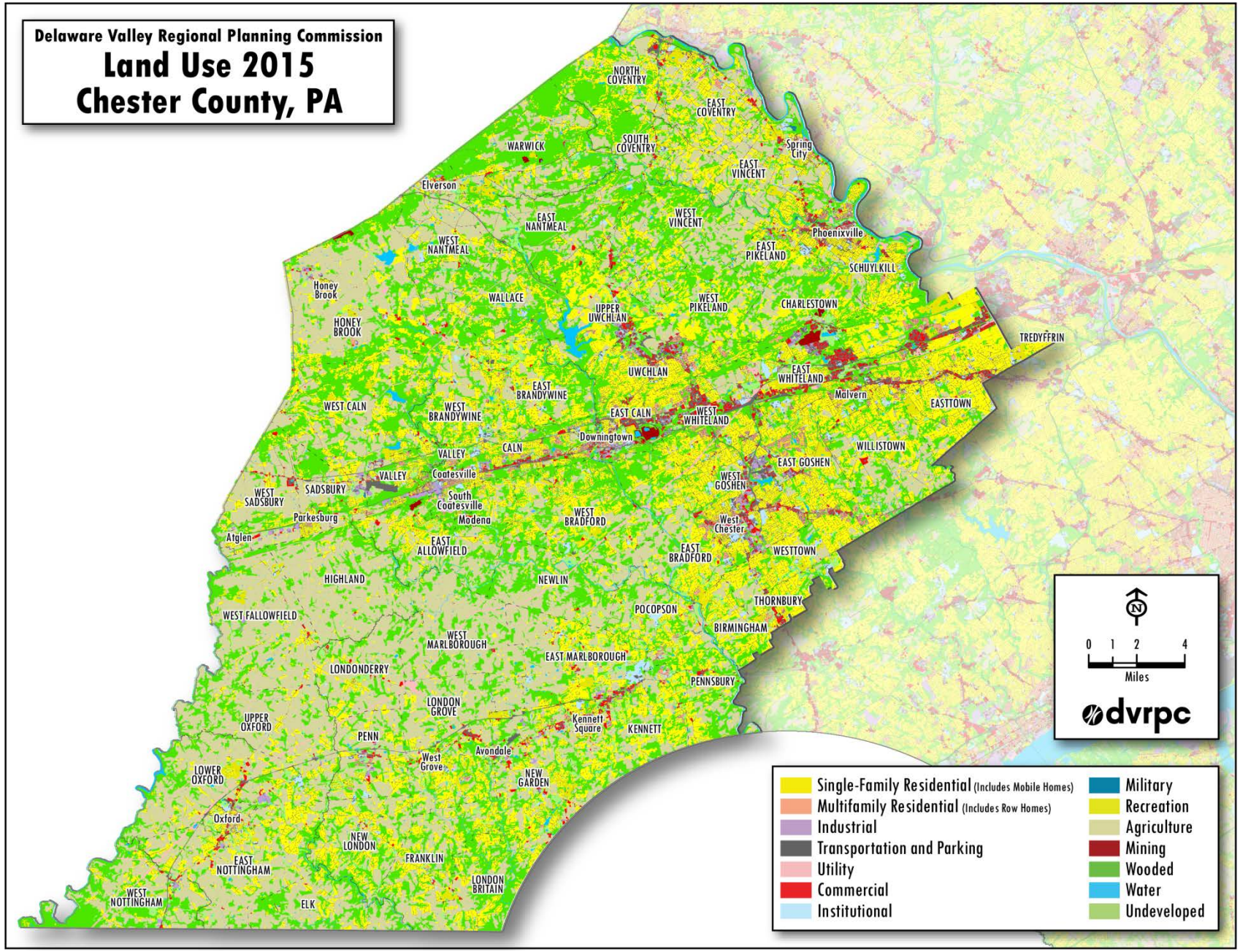
Miles
dvrpc


Delaware Valley Regional Planning Commission
Land Use 2015
Chester County, PA
NORTH COVENTRY
EAST COVENTRY
SOUTH COVENTRY
Spring City
WARWICK
EAST VINCENT
Elverson
WEST VINCENT
EAST NANTMEAL
Phoenixville
WEST NANTMEAL
EAST PIKELAND
SCHUYLKILL
Honey Brook
WALLACE
WEST PIKELAND
CHARLESTOWN
UPPER UWCHLAN
HONEY BROOK
TREDYFFRIN
UWCHLAN
EAST WHITELAND
EAST BRANDYWINE
Malvern
EASTTOWN
WEST CALN
WEST BRANDYWINE
EAST CALN
WEST WHITELAND
Downingtown
CALN
WILLISTOWN
VALLEY
EAST GOSHEN
VALLEY
Coatesville
WEST GOSHEN
WEST SADSBURY
SADSBURY
South Coatesville
Parkesburg
Modena
WEST BRADFORD
West Chester
Atglen
EAST ALLOWFIELD
EAST BRADFORD
WESTTOWN
HIGHLAND
NEWLIN
THORNBURY
POCOPSON
WEST FALLOWFIELD
BIRMINGHAM
WEST MARLBOROUGH
EAST MARLBOROUGH
LONDONDERRY
PENNSBURY
LONDON GROVE
UPPER OXFORD
Kennett Square
KENNETT
PENN
Avondale
West Grove
LOWER OXFORD
NEW GARDEN
Oxford
NEW LONDON
FRANKLIN
EAST NOTTINGHAM
LONDON BRITAIN
WEST NOTTINGHAM
ELK
N
0 1 2 4
Miles
dvrpc
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
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Transportation and Parking
Utility
Commercial
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Recreation
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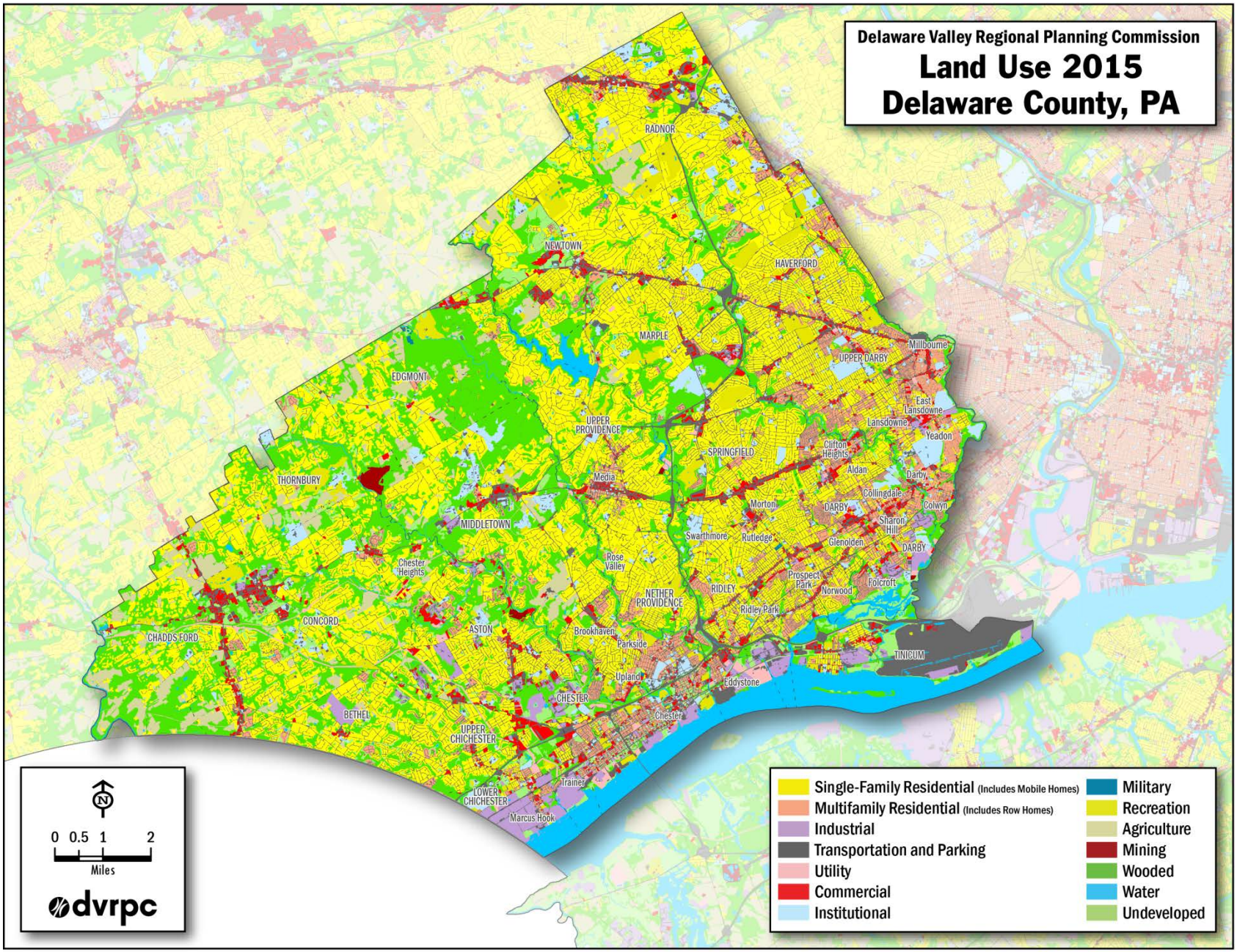
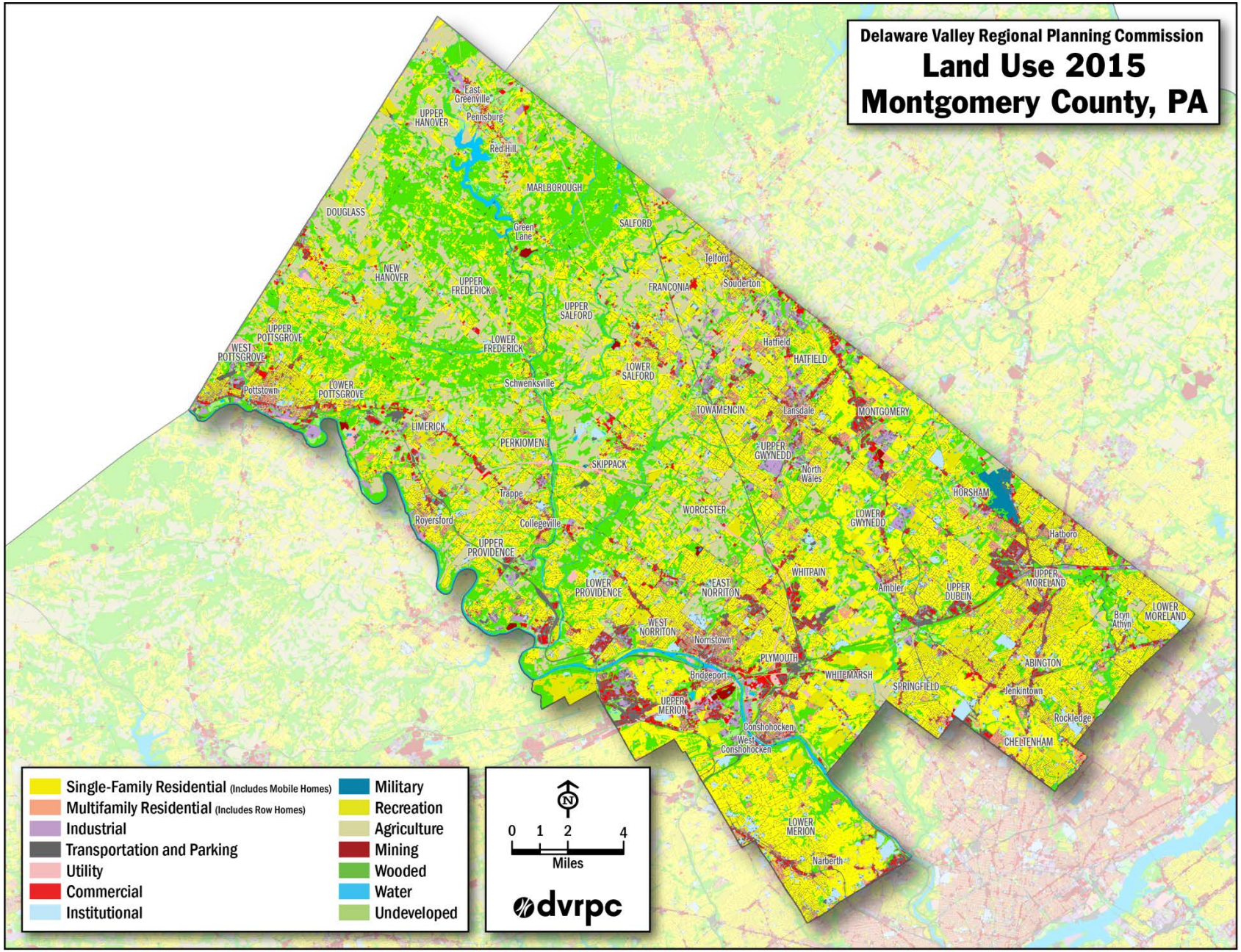
Wooded
Water
Undeveloped


Delaware Valley Regional Planning Commission
Land Use 2015
Delaware County, PA
RADNOR
NEWTOWN
HAVERFORD
MARPLE
Millbourne
UPPER DARBY
EDGMONT
East Lansdowne
Lansdowne
Yeadon
UPPER PROVIDENCE
SPRINGFIELD
Clifton Heights
Aldan
Darby
THORNBURY
Media
Collingdale
Morton
DARBY
Colwyn
Sharon Hill
MIDDLETOWN
Swarthmore
Rutledge
Glenolden
DARBY
Rose Valley
Chester Heights
Prospect Park
Norwood
Folcroft
RIDLEY
NETHER PROVIDENCE
Ridley Park
CONCORD
CHADDS FORD
ASTON
Brookhaven
Parkside
TINICUM
Upland
Eddystone
CHESTER
Chester
BETHEL
UPPER CHICHESTER
Trainer
LOWER CHICHESTER
Marcus Hook
N
0 0.5 1 2
Miles
dvrpc
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
Industrial
Transportation and Parking
Utility
Commercial
Institutional
Military
Recreation
Agriculture
Mining
Wooded
Water
Undeveloped


Delaware Valley Regional Planning Commission
Land Use 2015
Montgomery County, PA
East Greenville
Pennsburg
UPPER HANOVER
Red Hill
MARLBOROUGH
DOUGLASS
Green Lane
SALFORD
Telford
Souderton
NEW HANOVER
UPPER FREDERICK
FRANCONIA
UPPER SALFORD
UPPER POTTSGROVE
WEST POTTSGROVE
LOWER FREDERICK
Hatfield
HATFIELD
LOWER SALFORD
Schwenksville
Pottstown
LOWER POTTSGROVE
TOWAMENCIN
Lansdale
MONTGOMERY
LIMERICK
PERKIOMEN
UPPER GWYNEDD
SKIPPACK
North Wales
Trappe
HORSHAM
WORCESTER
LOWER GWYNEDD
Royersford
Collegeville
Hatboro
UPPER PROVIDENCE
WHITPAIN
UPPER MORELAND
LOWER PROVIDENCE
EAST NORRITON
Ambler
UPPER DUBLIN
LOWER MORELAND
Bryn Athyn
WEST NORRITON
Norristown
PLYMOUTH
ABINGTON
Bridgeport
WHITEMARSH
SPRINGFIELD
Jenkintown
UPPER MERION
Rockledge
Conshohocken
West Conshohocken
CHELTENHAM
LOWER MERION
Narberth
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
Industrial
Transportation and Parking
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Institutional
Military
Recreation
Agriculture
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Undeveloped
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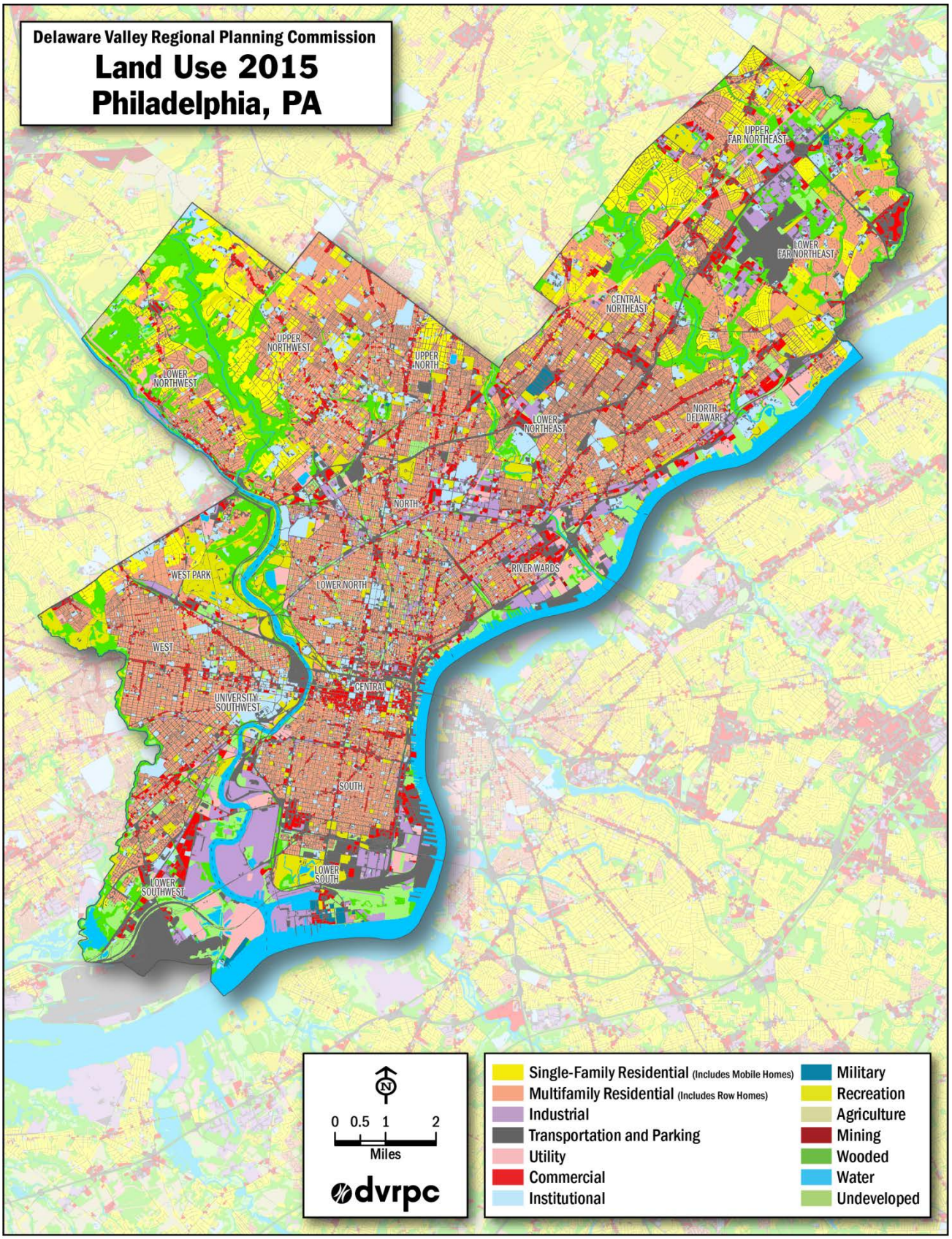
Delaware Valley Regional Planning Commission
Land Use 2015
Philadelphia, PA
UPPER FAR NORTHEAST
LOWER FAR NORTHEAST
CENTRAL NORTHEAST
UPPER NORTHWEST
UPPER NORTH
LOWER NORTHWEST
LOWER NORTHEAST
NORTH DELAWARE
NORTH
RIVER WARDS
WEST PARK
LOWER NORTH
WEST
UNIVERSITY SOUTHWEST
CENTRAL
SOUTH
LOWER SOUTH
LOWER SOUTHWEST
N
0 0.5 1 2
Miles
dvrpc
Single-Family Residential (Includes Mobile Homes)
Multifamily Residential (Includes Row Homes)
Industrial
Transportation and Parking
Utility
Commercial
Institutional
Military
Recreation
Agriculture
Mining
Wooded
Water
Undeveloped

Appendix C: Land Use in Acres, 2015

Appendix C: Land Use in Acres by Municipality, 2015

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
New Jersey														
Burlington County	**524,709**	**62,373**	**3,423**	**18,795**	**3,864**	**5,537**	**3,689**	**5,373**	**8,305**	**76,624**	**471**	**299,862**	**14,625**	**21,768**
Bass River Township	50,112	607	47	303	74	33	27	184	269	781	8	40,317	2,216	5,246
Beverly City	487	200	5	50	7	12	17	0	11	0	0	34	138	13
Bordentown City	618	191	31	79	3	30	52	0	25	0	0	132	30	45
Bordentown Township	5,924	1,127	119	728	209	179	166	15	125	418	0	1,813	453	572
Burlington City	2,424	556	86	290	88	101	103	1	109	2	0	412	480	196
Burlington Township	8,986	2,158	591	1,039	241	279	189	0	228	622	18	2,455	349	817
Chesterfield Township	13,728	1,472	0	323	99	70	115	0	272	7,424	0	3,529	108	316
Cinnaminson Township	5,095	2,122	215	637	160	208	158	0	247	134	0	510	366	338
Delanco Township	2,187	429	112	157	3	72	21	0	142	75	0	309	691	176
Delran Township	4,651	1,620	123	494	89	232	91	0	294	240	0	745	425	298
Eastampton Township	3,721	724	14	183	183	74	49	0	144	820	0	1,341	73	116
Edgewater Park Township	1,974	879	65	219	5	82	111	0	75	188	0	171	109	70
Evesham Township	18,933	4,985	32	1,484	171	517	158	0	827	1,034	0	8,655	308	762
Fieldsboro Borough	222	63	18	18	0	2	2	0	4	0	0	61	48	6
Florence Township	6,555	1,271	326	622	219	80	110	0	176	1,369	1	1,515	327	539
Hainesport Township	4,341	1,122	152	261	22	110	56	0	81	564	0	1,311	180	482
Lumberton Township	8,323	1,911	113	542	101	181	106	4	209	3,045	0	1,552	98	461
Mansfield Township	14,002	2,082	47	797	387	306	79	0	243	6,052	0	3,233	154	622
Maple Shade Township	2,450	1,225	24	484	24	237	42	0	74	2	0	223	30	85
Medford Township	25,458	5,852	33	924	287	262	211	0	698	3,450	0	12,333	649	759
Medford Lakes Borough	811	513	0	79	4	2	11	0	86	0	0	23	89	4
Moorestown Township	9,579	4,044	433	949	60	326	160	11	450	974	0	1,449	204	519
Mount Holly Township	1,835	710	38	265	140	83	101	2	77	9	0	287	57	66
Mount Laurel Township	14,058	4,596	186	2,253	165	687	170	0	538	959	0	3,554	273	677
New Hanover Township	14,434	186	1	382	34	30	11	4,343	572	778	0	7,271	243	583
North Hanover Township	11,196	1,573	16	246	229	128	233	12	219	5,282	0	2,954	132	172
Palmyra Borough	1,672	485	18	186	75	56	23	0	42	0	0	201	502	84
Pemberton Borough	405	142	3	36	1	20	21	0	5	9	0	142	13	13
Pemberton Township	40,147	3,786	10	836	159	166	275	396	363	7,715	31	25,147	824	439
Riverside Township	1,049	462	26	137	9	40	28	0	40	0	0	53	95	159
Riverton Borough	615	279	3	57	3	11	10	0	28	0	0	15	196	13
Shamong Township	28,774	2,313	9	294	19	69	43	0	140	3,269	0	21,884	358	376
Southampton Township	28,429	3,217	52	557	192	312	67	0	75	9,715	0	13,380	342	520

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Springfield Township	18,914	1,566	95	501	172	136	42	67	214	10,928	0	4,522	52	619
Tabernacle Township	31,669	3,023	45	309	31	107	63	0	183	3,625	42	23,484	322	435
Washington Township	66,502	379	27	156	1	16	75	0	103	2,497	39	56,975	2,181	4,053
Westampton Township	7,100	1,115	248	714	55	130	162	0	390	1,941	0	1,944	97	304
Willingboro Township	5,173	2,708	42	622	95	100	177	0	396	11	0	543	268	211
Woodland Township	60,968	620	16	537	33	28	143	0	59	2,671	332	54,828	1,144	557
Wrightstown Borough	1,188	60	2	45	15	23	11	338	72	21	0	555	1	45
Camden County	**145,546**	**43,260**	**2,608**	**15,116**	**2,346**	**4,355**	**3,112**	**23**	**4,772**	**8,492**	**540**	**51,402**	**4,398**	**5,122**
Audubon Borough	953	611	0	180	20	54	20	0	30	0	0	30	7	1
Audubon Park Borough	106	50	0	22	0	0	3	0	8	0	0	4	11	8
Barrington Borough	1,011	569	73	178	4	28	18	0	22	1	0	104	0	14
Bellmawr Borough	1,981	742	132	393	23	161	97	0	57	0	0	187	54	135
Berlin Borough	2,313	963	12	329	27	139	109	0	71	58	0	457	11	137
Berlin Township	2,123	679	138	322	38	148	35	0	59	15	42	481	19	147
Brooklawn Borough	340	98	2	64	4	33	5	0	19	0	0	24	34	57
Camden City	6,692	1,558	337	1,625	194	255	439	0	301	4	0	334	1,057	588
Cherry Hill Township	15,463	7,263	176	2,703	81	898	521	7	748	208	0	2,366	99	393
Chesilhurst Borough	1,105	362	1	77	1	23	7	0	9	0	0	610	1	14
Clementon Borough	1,247	516	0	127	3	52	13	0	28	0	0	443	32	33
Collingswood Borough	1,235	683	3	226	8	49	42	0	116	0	0	17	70	21
Gibbsboro Borough	1,406	356	8	109	21	47	15	0	24	4	64	701	30	27
Gloucester Township	14,894	5,990	123	1,607	323	450	432	10	704	391	0	3,894	341	629
Gloucester City	1,785	520	190	243	62	71	56	0	84	0	0	74	336	149
Haddon Township	1,808	988	12	287	13	80	34	0	118	0	0	165	86	25
Haddonfield Borough	1,817	1,138	0	251	8	45	60	0	72	2	0	203	28	10
Haddon Heights Borough	1,005	631	0	169	1	42	27	0	68	0	0	58	0	9
Hi-Nella Borough	144	45	0	23	1	7	3	0	23	11	0	21	0	10
Laurel Springs Borough	296	199	0	48	6	8	6	0	5	0	0	15	8	1
Lawnside Borough	915	314	29	167	8	44	24	0	13	0	0	295	1	20
Lindenwold Borough	2,522	1,070	6	422	6	85	78	0	90	0	66	624	41	34
Magnolia Borough	626	337	36	97	1	37	15	0	16	0	0	65	0	22
Merchantville Borough	382	278	0	62	1	12	13	0	15	0	0	1	0	0
Mount Ephraim Borough	582	339	1	104	3	30	11	0	15	0	0	41	16	22
Oaklyn Borough	448	267	0	59	4	20	10	0	12	1	0	23	47	5
Pennsauken Township	7,786	2,127	813	1,400	249	329	246	6	355	1	0	702	1,147	411
Pine Hill Borough	2,527	884	5	187	49	32	35	0	232	31	0	968	24	80
Pine Valley Borough	622	29	0	1	2	0	0	0	251	0	0	325	9	5

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Runnemede Borough	1,360	648	31	217	17	77	24	0	53	0	0	205	40	48
Somerdale Borough	888	471	20	150	1	55	19	0	26	0	0	126	0	20
Stratford Borough	1,007	529	0	178	4	53	41	0	30	0	0	145	7	20
Tavistock Borough	176	3	0	7	0	0	0	0	155	0	0	9	2	0
Voorhees Township	7,437	3,190	59	1,058	65	337	205	0	263	118	92	1,540	145	365
Waterford Township	23,146	2,508	60	430	183	169	76	0	131	2,018	10	17,193	112	256
Winslow Township	37,256	6,227	340	1,570	915	476	369	0	542	5,629	266	18,943	578	1,401
Woodlynne Borough	142	78	1	24	0	9	4	0	7	0	0	9	5	5
Gloucester County	**215,020**	**45,005**	**4,454**	**11,258**	**2,984**	**3,582**	**2,094**	**4**	**4,444**	**42,324**	**265**	**76,054**	**10,889**	**11,663**
Clayton Borough	4,643	1,092	56	214	11	64	81	0	106	333	0	2,350	142	194
Deptford Township	11,229	3,344	90	1,389	218	474	281	0	373	550	0	3,603	186	721
East Greenwich Township	9,549	2,295	44	410	155	103	154	0	142	2,976	0	2,451	317	502
Elk Township	12,362	1,465	12	317	26	94	45	0	118	4,911	0	4,989	168	217
Franklin Township	36,055	6,120	71	880	721	272	141	0	438	7,629	64	18,802	412	505
Glassboro Borough	5,990	1,579	52	559	93	250	244	0	184	291	0	2,382	34	322
Greenwich Township	7,480	656	902	272	62	40	24	0	124	627	0	1,942	1,856	975
Harrison Township	12,180	3,474	64	538	88	123	108	0	207	4,179	0	2,797	83	519
Logan Township	16,829	696	1,025	797	243	128	57	0	179	3,413	56	3,649	3,529	3,057
Mantua Township	10,289	2,592	102	602	126	184	101	0	322	2,519	21	3,288	79	353
Monroe Township	30,015	6,076	229	1,114	546	428	203	0	457	3,114	83	16,442	561	762
National Park Borough	928	265	0	68	2	6	9	0	39	0	0	78	311	150
Newfield Borough	1,114	344	56	54	6	17	18	0	10	180	0	364	2	63
Paulsboro Borough	1,703	425	333	149	29	43	25	0	29	11	0	72	437	150
Pitman Borough	1,443	797	50	184	1	39	37	0	89	8	0	188	24	26
South Harrison Township	10,182	1,468	26	168	284	18	10	0	38	4,813	0	3,110	46	201
Swedesboro Borough	496	196	16	67	2	38	27	0	3	15	0	75	29	28
Washington Township	13,778	5,835	37	1,485	42	734	250	0	601	887	41	3,001	149	716
Wenonah Borough	648	345	0	66	0	8	10	0	15	3	0	186	10	5
West Deptford Township	11,411	2,129	1,121	902	281	201	92	0	539	567	0	2,479	1,735	1,365
Westville Borough	871	268	46	125	6	24	12	0	43	0	0	86	236	25
Woodbury City	1,342	627	16	247	11	114	66	4	46	0	0	86	61	64
Woodbury Heights Borough	805	376	7	117	1	59	24	0	27	0	0	167	4	23
Woolwich Township	13,678	2,541	99	534	30	121	75	0	315	5,298	0	3,467	478	720
Mercer County	**146,342**	**38,480**	**2,106**	**13,076**	**2,167**	**3,759**	**3,686**	**46**	**6,007**	**23,674**	**267**	**42,505**	**3,422**	**7,147**
East Windsor Township	10,017	2,341	144	1,044	251	326	70	0	376	2,314	0	2,456	134	561
Ewing Township	9,950	3,517	198	1,738	106	422	686	15	561	471	0	1,500	248	488

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Hamilton Township	25,733	8,033	520	3,434	702	985	755	3	799	2,290	0	5,799	722	1,691
Hightstown Borough	807	416	21	110	11	42	87	0	51	0	0	25	22	22
Hopewell Borough	463	257	0	41	0	33	22	0	6	66	0	27	0	11
Hopewell Township	37,693	6,468	263	955	251	304	223	0	619	10,208	267	16,360	635	1,140
Lawrence Township	14,058	3,899	151	1,378	300	530	298	26	658	1,734	0	4,052	185	847
Pennington Borough	623	360	2	72	2	31	54	0	31	0	0	57	2	12
Princeton	11,776	4,453	0	664	99	122	624	2	761	479	0	3,884	309	379
Robbinsville Township	13,161	2,342	497	978	130	196	120	0	305	3,554	0	3,968	191	880
Trenton City	5,270	1,817	186	1,235	99	261	513	0	335	5	0	151	434	234
West Windsor Township	16,791	4,577	124	1,427	216	507	234	0	1,505	2,553	0	4,226	540	882
Pennsylvania														
Bucks County	**524,709**	**62,373**	**3,423**	**18,795**	**3,864**	**5,537**	**3,689**	**5,373**	**8,305**	**76,624**	**471**	**299,862**	**14,625**	**21,768**
Bedminster Township	20,009	2,565	96	409	58	116	73	0	68	10,517	0	5,066	653	388
Bensalem Township	13,330	4,550	589	2,368	69	783	669	0	841	92	0	2,014	743	612
Bridgeton Township	4,278	701	45	61	57	19	6	0	49	188	14	2,851	217	70
Bristol Borough	1,184	309	66	240	20	131	49	0	100	0	0	64	149	56
Bristol Township	10,974	3,928	857	1,624	352	432	299	13	325	10	0	1,705	767	662
Buckingham Township	21,098	6,736	51	812	241	260	136	0	407	7,498	0	4,187	184	586
Chalfont Borough	1,052	573	21	108	14	37	25	0	60	7	0	131	21	55
Doylestown Borough	1,375	689	18	240	15	101	124	0	68	1	0	102	1	16
Doylestown Township	9,970	4,603	6	806	42	201	258	0	369	1,147	16	1,962	174	386
Dublin Borough	387	201	7	42	1	30	13	0	12	31	0	5	0	45
Durham Township	5,926	904	4	82	66	15	16	0	3	2,236	0	2,390	163	47
East Rockhill Township	8,308	1,814	17	308	70	49	105	0	177	1,009	43	4,434	177	105
Falls Township	17,052	2,487	1,551	1,788	1,254	468	164	0	595	240	0	3,220	3,734	1,551
Haycock Township	13,494	1,442	0	189	3	20	20	0	121	1,518	0	9,090	868	223
Hilltown Township	17,362	5,300	153	742	194	307	125	0	128	6,103	121	3,393	50	746
Hulmeville Borough	257	117	4	20	3	11	3	0	8	32	0	45	11	3
Ivyland Borough	228	110	26	33	0	6	4	0	6	0	0	28	0	15
Langhorne Borough	328	158	0	38	1	24	41	0	25	6	0	32	3	0
Langhorne Manor Borough	404	203	0	44	1	1	51	0	2	0	0	94	3	5
Lower Makefield Township	11,719	5,674	0	1,177	62	126	169	0	419	1,184	0	2,103	313	492
Lower Southampton Township	4,285	2,366	109	518	7	213	202	0	166	17	0	517	31	139
Middletown Township	12,328	4,656	121	1,752	98	530	446	0	728	546	27	2,628	293	503
Milford Township	17,911	3,450	193	653	323	126	102	0	317	6,203	5	5,981	109	449
Morrisville Borough	1,260	557	60	238	21	56	37	0	66	2	0	76	131	16
New Britain Borough	780	403	54	86	2	82	35	0	20	7	0	72	2	17

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
New Britain Township	9,760	2,735	97	442	64	132	130	0	258	2,249	0	2,848	436	369
New Hope Borough	894	292	0	101	12	44	30	0	59	0	8	210	112	26
Newtown Borough	350	219	1	57	4	35	13	0	6	0	0	11	0	4
Newtown Township	7,625	2,602	65	733	106	193	278	0	659	896	0	1,427	63	603
Nockamixon Township	14,371	1,919	3	208	206	137	41	0	271	3,161	47	7,903	280	195
Northampton Township	16,712	8,345	170	1,106	56	142	228	0	840	1,753	0	2,915	308	849
Penndel Borough	273	140	12	56	1	33	5	0	6	0	0	14	0	6
Perkasie Borough	1,622	891	8	180	6	62	49	0	72	38	0	206	16	94
Plumstead Township	17,480	4,061	78	529	229	271	64	0	226	6,055	145	4,942	145	735
Quakertown Borough	1,285	589	38	260	7	103	73	0	103	0	0	65	3	44
Richland Township	13,164	2,411	233	540	183	393	94	0	187	3,566	0	4,928	170	459
Richlandtown Borough	175	109	0	19	2	4	15	0	5	4	0	5	0	12
Riegelsville Borough	692	163	0	25	2	9	23	0	6	259	0	121	69	15
Sellersville Borough	762	391	7	84	1	18	39	4	41	1	0	97	13	66
Silverdale Borough	263	141	1	26	0	17	12	0	18	5	0	21	0	22
Solebury Township	17,433	5,099	1	448	204	139	88	0	142	4,759	121	5,507	475	450
Springfield Township	19,606	3,256	103	293	707	98	54	0	65	6,060	0	8,533	92	345
Telford Borough	339	152	46	55	1	5	18	0	8	0	0	34	0	20
Tinicum Township	19,826	2,893	40	352	25	54	82	0	210	5,515	17	9,544	875	219
Trumbauersville Borough	277	135	5	25	1	7	12	0	8	74	0	6	0	4
Tullytown Borough	1,322	143	75	137	295	61	22	0	40	2	0	114	376	57
Upper Makefield Township	13,895	4,821	0	363	16	28	110	0	353	3,213	0	4,095	408	488
Upper Southampton Township	4,238	2,430	104	477	16	161	78	0	129	65	0	663	7	108
Warminster Township	6,511	3,280	259	969	64	274	251	0	543	49	0	423	25	374
Warrington Township	8,824	3,504	88	704	69	257	172	0	360	1,234	237	1,593	96	510
Warwick Township	7,112	2,333	74	433	104	125	111	0	363	1,142	0	1,928	95	404
West Rockhill Township	10,484	1,882	160	381	255	151	126	0	107	1,744	117	5,243	120	198
Wrightstown Township	6,246	1,882	12	159	34	96	29	0	76	1,457	398	1,768	64	271
Yardley Borough	645	278	3	68	9	26	9	0	117	0	0	54	64	17
Chester County	**485,464**	**124,703**	**3,192**	**20,074**	**5,168**	**7,042**	**5,654**	**45**	**10,336**	**157,693**	**722**	**132,029**	**5,084**	**13,722**
Atglen Borough	567	181	11	45	6	9	11	0	4	167	0	115	1	17
Avondale Borough	314	91	8	34	4	15	5	0	9	23	19	67	7	32
Birmingham Township	4,174	1,766	0	129	20	56	25	0	184	813	0	880	76	225
Caln Township	5,698	1,900	130	589	62	213	210	0	273	260	0	1,750	25	286
Charlestown Township	8,011	2,200	47	322	16	62	50	0	83	1,776	76	3,195	34	150
Coatesville City	1,183	445	87	192	9	44	61	0	34	2	0	244	11	54
Downingtown Borough	1,417	429	89	250	4	80	86	0	165	59	0	172	21	62

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
East Bradford Township	9,683	3,223	6	309	176	59	82	0	231	2,331	0	2,819	107	340
East Brandywine Township	7,145	2,919	15	246	10	47	56	0	250	1,043	0	2,117	67	375
East Caln Township	2,357	587	61	306	21	165	43	0	173	21	192	613	74	101
East Coventry Township	6,912	2,440	64	189	143	67	80	0	33	2,384	0	1,275	131	106
East Fallowfield Township	10,005	2,298	3	194	141	37	50	0	83	3,516	62	3,286	69	266
East Goshen Township	6,497	3,557	86	525	26	121	86	0	474	354	0	978	53	237
East Marlborough Township	9,942	2,562	48	352	30	136	353	0	227	4,106	0	1,741	72	315
East Nantmeal Township	10,474	1,123	0	153	116	31	93	0	217	3,416	0	4,991	94	240
East Nottingham Township	12,868	2,856	37	306	148	92	33	0	85	7,079	0	1,826	59	347
East Pikeland Township	5,683	1,930	27	261	96	173	46	9	81	1,403	0	1,451	91	115
Easttown Township	5,281	3,262	0	312	6	78	111	0	243	325	0	878	21	45
East Vincent Township	8,733	2,371	32	238	63	82	169	26	332	3,321	0	1,723	155	221
East Whiteland Township	7,036	1,705	175	973	211	622	292	0	370	346	204	1,516	80	542
Elk Township	6,449	808	0	77	2	5	3	0	14	3,313	0	2,121	56	50
Elverson Borough	641	198	21	45	11	22	29	0	25	103	0	134	8	45
Franklin Township	8,394	2,180	0	172	50	12	17	0	157	3,186	0	2,398	50	172
Highland Township	10,996	522	7	123	138	4	20	0	37	7,952	0	2,089	30	74
Honey Brook Borough	305	168	2	31	1	14	12	0	5	52	0	0	0	20
Honey Brook Township	16,132	2,097	104	277	127	79	49	0	231	8,690	82	3,864	237	295
Kennett Township	9,902	3,418	31	334	32	141	87	0	110	2,500	0	2,548	75	626
Kennett Square Borough	693	346	10	119	7	48	37	0	47	16	0	29	0	34
London Britain Township	6,273	1,693	0	114	12	17	4	0	39	1,589	0	2,660	58	87
Londonderry Township	7,284	902	0	110	72	46	23	0	10	4,443	0	1,443	25	210
London Grove Township	11,036	2,321	1	368	184	141	75	0	254	4,851	0	2,453	78	310
Lower Oxford Township	11,740	1,323	94	278	249	108	129	0	247	6,604	0	2,202	229	277
Malvern Borough	821	280	8	90	1	59	52	0	75	13	0	223	4	16
Modena Borough	229	74	7	10	1	14	1	0	2	6	0	106	6	2
New Garden Township	10,407	2,883	155	506	32	276	96	0	420	3,204	0	2,240	114	481
Newlin Township	7,750	690	0	80	173	11	25	0	23	3,585	0	2,868	112	183
New London Township	7,513	2,317	0	174	34	13	50	0	70	2,680	0	1,906	48	221
North Coventry Township	8,693	2,592	1	398	57	117	82	0	262	1,684	0	3,173	158	169
Oxford Borough	1,254	424	25	137	28	59	53	0	24	258	0	119	1	126
Parkesburg Borough	810	403	25	93	19	24	13	0	22	68	13	104	1	25
Penn Township	6,162	1,448	62	237	105	77	90	0	28	2,737	0	1,053	38	287
Pennsbury Township	6,423	1,963	0	171	16	51	81	0	54	1,541	0	2,203	76	267
Phoenixville Borough	2,376	926	25	324	61	145	106	0	123	9	0	423	118	116
Pocopson Township	5,330	1,410	19	131	65	20	139	0	41	1,771	0	1,333	75	326

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Sadsbury Township	3,956	841	85	195	71	65	41	9	25	1,405	0	1,013	10	196
Schuylkill Township	5,695	2,391	43	271	103	104	170	0	301	582	0	1,384	236	110
South Coatesville Borough	1,124	133	150	48	95	13	33	0	9	72	0	485	11	75
South Coventry Township	4,873	962	2	120	53	60	55	0	56	1,355	0	2,073	37	100
Spring City Borough	528	234	20	59	8	35	4	0	6	40	0	83	32	7
Thornbury Township	2,485	1,162	0	117	2	30	52	0	180	196	0	531	16	199
Tredyffrin Township	12,699	6,085	37	1,494	193	695	262	0	907	231	0	2,460	48	287
Upper Oxford Township	10,697	1,129	19	183	141	16	11	0	4	7,089	0	1,976	43	86
Upper Uwchlan Township	7,497	2,583	65	456	91	158	62	0	114	976	0	2,056	522	414
Uwchlan Township	6,684	3,016	119	803	7	281	113	0	186	538	0	1,369	35	217
Valley Township	3,819	1,061	206	495	43	63	55	0	53	362	0	1,287	13	181
Wallace Township	7,758	1,944	0	171	155	20	81	0	36	1,505	0	3,481	108	257
Warwick Township	12,084	1,390	6	154	8	34	36	0	270	3,133	46	6,751	79	177
West Bradford Township	11,872	3,540	7	369	294	63	126	0	376	2,574	0	4,006	64	453
West Brandywine Township	8,537	2,692	9	254	114	63	140	0	105	2,202	0	2,678	60	220
West Caln Township	14,023	3,537	59	286	118	62	56	0	246	4,124	0	5,089	189	257
West Chester Borough	1,181	595	23	232	4	85	108	1	79	1	0	16	0	37
West Fallowfield Township	11,660	821	54	174	125	28	37	0	193	7,976	0	2,107	59	86
West Goshen Township	7,668	3,643	423	1,039	75	375	336	0	281	161	0	1,087	83	165
West Grove Borough	416	260	2	42	1	20	12	0	12	5	0	41	0	21
West Marlborough Township	10,915	328	0	111	166	16	17	0	8	7,983	0	2,157	62	67
West Nantmeal Township	8,643	1,176	10	176	56	23	59	0	48	4,145	0	2,632	119	199
West Nottingham Township	9,003	970	75	167	194	48	26	0	81	3,166	0	3,938	102	236
West Pikeland Township	6,371	1,953	0	155	9	22	22	0	65	1,489	0	2,493	40	123
West Sadsbury Township	6,817	870	108	193	42	131	19	0	5	4,027	0	1,338	24	60
Westtown Township	5,526	2,852	0	302	7	62	125	0	226	800	0	880	32	240
West Vincent Township	11,402	2,381	0	214	34	66	28	0	43	3,987	9	4,232	108	300
West Whiteland Township	8,270	2,891	144	1,042	165	606	136	0	264	650	19	1,994	32	327
Willistown Township	11,668	4,032	3	428	9	106	217	0	286	3,319	0	3,063	75	130
Delaware County	**122,223**	**51,375**	**2,987**	**13,922**	**1,236**	**3,664**	**4,916**	**33**	**5,488**	**4,775**	**217**	**24,105**	**5,552**	**3,953**
Aldan Borough	383	275	0	58	0	18	4	0	13	0	0	13	1	1
Aston Township	3,744	1,670	134	401	84	199	151	0	89	54	39	797	41	85
Bethel Township	3,454	1,792	175	212	40	46	22	0	54	82	0	885	9	137
Brookhaven Borough	1,086	616	1	168	26	47	31	0	42	0	0	135	9	11
Chadds Ford Township	5,576	1,577	0	248	66	138	45	0	44	1,117	0	2,106	83	152
Chester City	4,019	847	230	721	97	183	254	0	291	0	0	181	949	266
Chester Township	911	161	150	137	39	46	45	0	30	0	9	204	10	80

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Chester Heights Borough	1,425	463	4	85	25	51	16	0	23	175	0	550	12	21
Clifton Heights Borough	405	188	10	77	1	57	8	0	24	0	0	28	6	6
Collingdale Borough	555	264	6	86	0	50	92	0	25	0	0	29	0	3
Colwyn Borough	166	55	14	29	1	7	2	0	14	0	0	35	7	2
Concord Township	8,739	3,598	52	647	177	286	258	0	320	596	0	2,307	49	449
Darby Borough	540	197	5	96	3	34	103	0	14	0	0	54	10	24
Darby Township	905	271	150	121	23	55	116	0	43	0	6	72	22	26
East Lansdowne Borough	132	99	0	19	0	7	6	0	1	0	0	0	0	0
Eddystone Borough	1,085	60	120	177	134	43	12	0	4	0	0	49	430	56
Edgmont Township	6,227	1,604	10	218	13	70	52	22	241	728	0	3,100	51	118
Folcroft Borough	905	208	97	102	2	44	35	0	19	0	0	96	155	147
Glenolden Borough	619	335	2	112	7	40	19	0	45	0	0	52	2	5
Haverford Township	6,352	3,907	0	779	18	149	252	0	656	2	0	515	8	66
Lansdowne Borough	755	502	2	119	1	30	20	0	28	0	0	47	4	2
Lower Chichester Township	692	105	124	94	34	24	128	0	23	0	0	102	3	55
Marcus Hook Borough	1,060	53	484	79	4	11	8	0	15	0	0	29	356	21
Marple Township	6,767	3,215	33	787	33	152	390	0	264	58	2	1,513	226	94
Media Borough	487	236	0	121	2	62	27	0	12	0	0	20	2	5
Middletown Township	8,602	3,184	53	578	68	117	552	0	183	576	52	2,993	63	183
Millbourne Borough	45	11	0	11	0	6	0	0	0	0	0	6	2	9
Morton Borough	230	139	4	47	0	19	6	0	3	0	0	10	0	2
Nether Providence Township	3,024	1,869	0	328	12	30	79	0	195	2	8	463	31	7
Newtown Township	6,441	2,979	1	516	5	177	137	0	449	284	0	1,279	66	548
Norwood Borough	522	302	0	71	1	14	11	0	34	0	0	45	36	8
Parkside Borough	132	92	0	21	1	4	4	0	2	0	0	7	0	1
Prospect Park Borough	480	287	0	91	0	36	16	0	29	0	0	13	7	1
Radnor Township	8,823	4,894	14	928	47	208	591	0	657	436	0	896	24	128
Ridley Township	3,455	1,714	192	645	15	152	86	7	138	2	0	217	196	91
Ridley Park Borough	691	394	0	135	1	25	27	0	44	0	0	57	4	4
Rose Valley Borough	472	335	0	23	1	1	8	0	6	0	0	84	10	4
Rutledge Borough	91	78	0	11	0	0	1	0	1	0	0	0	0	0
Sharon Hill Borough	489	204	65	100	7	28	15	0	24	0	0	39	5	2
Springfield Township	4,055	2,198	6	566	40	194	139	0	387	0	0	476	22	27
Swarthmore Borough	896	516	0	91	0	7	117	0	61	0	0	89	6	9
Thornbury Township	5,912	2,369	0	195	24	21	127	0	290	632	101	1,867	53	233
Tinicum Township	5,589	220	261	1,879	18	99	20	0	60	0	0	354	2,149	529
Trainer Borough	888	95	267	95	23	36	3	0	19	0	0	75	225	50

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Upland Borough	403	146	0	64	0	32	47	4	50	0	0	45	6	9
Upper Chichester Township	4,272	1,784	241	491	95	274	103	0	91	27	0	941	13	212
Upper Darby Township	4,999	2,657	36	923	43	275	395	0	248	2	0	359	28	33
Upper Providence Township	3,699	2,242	1	278	5	37	85	0	149	2	0	730	150	20
Yeadon Borough	1,024	368	43	142	0	23	251	0	34	0	0	141	11	11
Montgomery County	**397,485**	**111,592**	**5,731**	**23,608**	**5,653**	**7,219**	**5,428**	**17**	**10,358**	**81,895**	**1,316**	**117,408**	**13,109**	**14,151**
Abington Township	9,910	5,749	22	1,208	22	287	632	0	545	177	0	1,119	30	119
Ambler Borough	545	297	11	102	2	44	23	0	14	0	0	27	0	25
Bridgeport Borough	452	132	46	103	10	53	10	0	23	0	0	29	30	16
Bryn Athyn Borough	1,246	265	0	58	1	23	141	0	47	205	0	434	20	52
Cheltenham Township	5,778	3,175	8	847	21	199	566	0	459	2	4	377	31	89
Collegeville Borough	1,028	501	4	128	1	53	80	0	45	30	0	138	21	27
Conshohocken Borough	653	295	35	154	5	50	15	0	33	0	0	30	22	14
Douglass Township	9,863	2,495	104	378	70	148	51	0	157	4,116	0	2,099	49	196
East Greenville Borough	322	164	17	46	1	10	19	0	32	4	0	12	0	17
East Norriton Township	3,891	1,931	39	481	25	179	147	0	88	307	33	510	16	135
Franconia Township	8,871	3,000	209	536	206	164	194	0	416	2,835	0	882	56	373
Green Lane Borough	210	76	6	22	1	13	2	0	6	7	0	61	6	10
Hatboro Borough	906	535	42	147	4	60	37	0	32	0	0	30	8	11
Hatfield Borough	406	234	12	58	4	24	9	0	12	7	0	24	1	21
Hatfield Township	6,357	2,415	540	668	169	385	100	0	196	646	0	869	22	347
Horsham Township	11,073	3,771	165	1,092	140	562	332	817	1,038	798	0	1,905	66	387
Jenkintown Borough	372	237	0	76	0	31	14	0	10	0	0	4	0	0
Lansdale Borough	1,917	913	134	393	27	104	101	0	98	5	0	66	1	75
Limerick Township	14,564	3,481	208	1,001	367	490	200	0	867	3,019	0	3,824	205	902
Lower Frederick Township	5,216	1,340	8	156	6	69	34	0	91	986	0	2,316	88	122
Lower Gwynedd Township	5,950	3,044	277	463	12	92	199	0	374	177	0	1,120	35	157
Lower Merion Township	15,276	9,320	17	1,590	63	244	1,073	0	741	0	0	1,876	207	145
Lower Moreland Township	4,652	2,414	84	424	27	99	190	0	442	198	0	541	29	204
Lower Pottsgrove Township	5,118	1,934	141	396	45	148	73	0	217	350	46	1,507	86	175
Lower Providence Township	9,877	4,010	100	747	179	315	253	0	341	668	0	2,644	228	392
Lower Salford Township	9,305	3,984	125	557	70	177	111	0	455	1,885	40	1,306	86	509
Marlborough Township	8,123	1,564	11	171	117	51	34	0	437	1,038	76	4,205	216	203
Montgomery Township	6,804	3,211	328	980	89	393	84	0	283	74	77	888	19	378
Narberth Borough	315	222	0	58	0	15	5	0	10	0	0	4	0	1
New Hanover Township	13,837	3,332	13	384	40	71	85	0	699	3,255	0	5,644	93	221
Norristown Borough	2,319	914	23	461	57	187	192	0	119	37	0	203	77	49

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
North Wales Borough	373	247	12	64	3	19	12	0	14	0	0	0	0	2
Pennsburg Borough	504	230	0	75	1	60	54	0	22	13	0	23	3	23
Perkiomen Township	3,147	1,264	50	211	88	46	74	0	124	382	0	703	60	145
Plymouth Township	5,427	1,938	228	1,027	280	591	146	4	269	151	0	476	72	245
Pottstown Borough	3,168	1,118	260	656	57	206	172	0	221	0	0	306	73	99
Red Hill Borough	429	203	20	65	0	20	28	0	18	26	0	16	0	33
Rockledge Borough	222	133	0	36	0	16	25	0	7	0	0	4	0	1
Royersford Borough	515	267	47	83	4	22	19	0	18	0	0	25	18	12
Salford Township	6,108	1,497	0	179	130	23	17	0	79	1,137	0	2,830	76	140
Schwenksville Borough	269	134	0	28	7	6	21	0	8	9	0	45	7	4
Skippack Township	8,924	2,337	33	435	209	153	263	10	232	2,015	0	2,548	133	556
Souderton Borough	716	424	6	130	1	45	39	0	40	1	0	18	0	12
Springfield Township	4,314	2,409	32	461	32	107	194	0	557	156	0	276	16	74
Telford Borough	309	189	10	51	5	18	13	0	12	0	0	4	0	7
Towamencin Township	6,192	2,838	119	638	115	117	174	0	273	674	0	967	45	232
Trappe Borough	1,328	555	21	105	29	48	40	0	37	296	0	141	2	54
Upper Dublin Township	8,500	4,451	73	1,034	50	314	313	0	701	89	0	1,254	40	181
Upper Frederick Township	6,450	1,282	0	130	25	19	43	0	108	2,102	0	2,523	130	88
Upper Gwynedd Township	5,199	2,327	426	525	181	135	90	0	156	337	0	769	10	243
Upper Hanover Township	13,554	2,637	242	377	209	164	102	0	323	4,077	0	3,818	792	813
Upper Merion Township	11,116	3,048	579	1,893	294	828	262	0	1,237	16	139	2,060	290	470
Upper Moreland Township	5,106	2,470	162	752	62	290	117	0	412	109	0	614	23	95
Upper Pottsgrove Township	3,202	1,181	8	171	4	70	41	0	62	474	0	1,087	8	96
Upper Providence Township	11,612	3,751	327	1,189	227	322	185	0	460	1,445	43	2,445	324	894
Upper Salford Township	5,753	1,609	15	154	25	36	48	0	119	1,750	0	1,807	87	103
West Conshohocken Borough	564	91	53	149	22	33	3	0	8	0	0	137	26	42
West Norriton Township	3,911	1,671	91	432	80	124	224	0	357	262	0	404	170	96
West Pottsgrove Township	1,519	401	75	185	244	55	21	0	14	27	0	341	36	120
Whitemarsh Township	9,419	3,186	89	710	251	185	372	0	1,294	883	226	1,814	157	252
Whitpain Township	8,226	3,902	37	947	172	334	208	0	721	436	0	1,097	48	324
Worcester Township	10,404	3,852	65	466	307	102	168	0	400	2,597	0	2,061	42	344
Philadelphia County	**91,001**	**29,985**	**5,316**	**20,028**	**2,062**	**4,930**	**5,683**	**209**	**5,318**	**198**	**3**	**7,949**	**5,178**	**4,142**
North	5,486	1,695	554	1,397	131	452	597	0	279	4	0	108	24	245
Lower Southwest	6,392	744	566	1,764	542	358	185	42	109	16	0	490	757	819
Central	4,116	1,092	50	1,111	51	541	357	4	250	5	0	42	478	135
North Delaware	6,192	1,867	294	1,172	222	354	478	0	394	4	0	119	889	399
Lower South	5,609	116	1,510	1,267	144	123	31	73	340	1	0	190	1,255	559

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
West Park	4,410	969	52	837	101	106	275	0	1,023	6	0	754	193	94
Lower North	3,724	1,399	136	796	76	196	338	0	301	6	0	166	89	221
Lower Northwest	6,401	1,993	63	760	178	189	241	3	305	81	0	2,222	210	156
River Wards	4,821	1,001	555	1,150	280	317	138	0	64	1	3	129	763	420
University - Southwest	2,962	943	52	773	50	143	518	0	187	4	0	86	102	104
West	2,977	1,732	20	667	6	169	178	0	86	5	0	48	4	62
South	3,989	1,588	184	1,165	31	332	164	0	136	2	0	9	272	106
Upper Far Northeast	6,623	2,935	419	1,139	120	366	338	16	412	2	0	668	14	194
Lower Northeast	3,774	1,540	211	927	18	259	345	68	220	0	0	111	8	67
Upper North	5,116	2,551	52	1,267	27	242	490	3	254	2	0	130	22	76
Lower Far Northeast	7,117	2,232	553	1,956	9	369	246	0	475	10	0	972	17	278
Upper Northwest	6,076	3,399	24	918	8	205	553	0	289	17	0	555	12	96
Central Northeast	5,216	2,189	21	962	68	209	211	0	194	32	0	1,150	69	111

Source: DVRPC. All parking uses have been included in the transportation category (regardless of the use with which they are associated).

Appendix D: Land Use by Percent, 2015

Appendix D: Percentage of Land Use in Each Land Use Category, by Municipality, 2015

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
New Jersey														
Burlington County	**524,714**	**11.9%**	**0.7%**	**3.6%**	**0.7%**	**1.1%**	**0.7%**	**1.0%**	**1.6%**	**14.6%**	**0.1%**	**57.1%**	**2.8%**	**4.1%**
Bass River Township	50,113	1.2%	0.1%	0.6%	0.1%	0.1%	0.1%	0.4%	0.5%	1.6%	0.0%	80.5%	4.4%	10.5%
Beverly City	487	41.1%	1.0%	10.3%	1.4%	2.5%	3.5%	0.0%	2.3%	0.0%	0.0%	7.0%	28.3%	2.7%
Bordentown City	618	30.9%	5.0%	12.8%	0.5%	4.9%	8.4%	0.0%	4.0%	0.0%	0.0%	21.4%	4.9%	7.3%
Bordentown Township	5,924	19.0%	2.0%	12.3%	3.5%	3.0%	2.8%	0.3%	2.1%	7.1%	0.0%	30.6%	7.6%	9.7%
Burlington City	2,424	22.9%	3.5%	12.0%	3.6%	4.2%	4.2%	0.0%	4.5%	0.1%	0.0%	17.0%	19.8%	8.1%
Burlington Township	8,987	24.0%	6.6%	11.6%	2.7%	3.1%	2.1%	0.0%	2.5%	6.9%	0.2%	27.3%	3.9%	9.1%
Chesterfield Township	13,728	10.7%	0.0%	2.4%	0.7%	0.5%	0.8%	0.0%	2.0%	54.1%	0.0%	25.7%	0.8%	2.3%
Cinnaminson Township	5,094	41.6%	4.2%	12.5%	3.1%	4.1%	3.1%	0.0%	4.8%	2.6%	0.0%	10.0%	7.2%	6.6%
Delanco Township	2,187	19.6%	5.1%	7.2%	0.1%	3.3%	1.0%	0.0%	6.5%	3.4%	0.0%	14.1%	31.6%	8.0%
Delran Township	4,651	34.8%	2.6%	10.6%	1.9%	5.0%	2.0%	0.0%	6.3%	5.2%	0.0%	16.0%	9.1%	6.4%
Eastampton Township	3,722	19.5%	0.4%	4.9%	4.9%	2.0%	1.3%	0.0%	3.9%	22.0%	0.0%	36.0%	2.0%	3.1%
Edgewater Park Township	1,974	44.5%	3.3%	11.1%	0.3%	4.2%	5.6%	0.0%	3.8%	9.5%	0.0%	8.7%	5.5%	3.5%
Evesham Township	18,932	26.3%	0.2%	7.8%	0.9%	2.7%	0.8%	0.0%	4.4%	5.5%	0.0%	45.7%	1.6%	4.0%
Fieldsboro Borough	224	28.4%	8.1%	8.1%	0.0%	0.9%	0.9%	0.0%	1.8%	0.0%	0.0%	27.5%	21.6%	2.7%
Florence Township	6,556	19.4%	5.0%	9.5%	3.3%	1.2%	1.7%	0.0%	2.7%	20.9%	0.0%	23.1%	5.0%	8.2%
Hainesport Township	4,342	25.8%	3.5%	6.0%	0.5%	2.5%	1.3%	0.0%	1.9%	13.0%	0.0%	30.2%	4.1%	11.1%
Lumberton Township	8,322	23.0%	1.4%	6.5%	1.2%	2.2%	1.3%	0.0%	2.5%	36.6%	0.0%	18.6%	1.2%	5.5%
Mansfield Township	14,003	14.9%	0.3%	5.7%	2.8%	2.2%	0.6%	0.0%	1.7%	43.2%	0.0%	23.1%	1.1%	4.4%
Maple Shade Township	2,449	50.0%	1.0%	19.8%	1.0%	9.7%	1.7%	0.0%	3.0%	0.1%	0.0%	9.1%	1.2%	3.5%
Medford Township	25,459	23.0%	0.1%	3.6%	1.1%	1.0%	0.8%	0.0%	2.7%	13.6%	0.0%	48.4%	2.5%	3.0%
Medford Lakes Borough	813	63.3%	0.0%	9.7%	0.5%	0.2%	1.4%	0.0%	10.6%	0.0%	0.0%	2.8%	11.0%	0.5%
Moorestown Township	9,578	42.2%	4.5%	9.9%	0.6%	3.4%	1.7%	0.1%	4.7%	10.2%	0.0%	15.1%	2.1%	5.4%
Mount Holly Township	1,836	38.7%	2.1%	14.4%	7.6%	4.5%	5.5%	0.1%	4.2%	0.5%	0.0%	15.6%	3.1%	3.6%
Mount Laurel Township	14,058	32.7%	1.3%	16.0%	1.2%	4.9%	1.2%	0.0%	3.8%	6.8%	0.0%	25.3%	1.9%	4.8%
New Hanover Township	14,434	1.3%	0.0%	2.6%	0.2%	0.2%	0.1%	30.1%	4.0%	5.4%	0.0%	50.4%	1.7%	4.0%
North Hanover Township	11,196	14.0%	0.1%	2.2%	2.0%	1.1%	2.1%	0.1%	2.0%	47.2%	0.0%	26.4%	1.2%	1.5%
Palmyra Borough	1,673	29.0%	1.1%	11.1%	4.5%	3.3%	1.4%	0.0%	2.5%	0.0%	0.0%	12.0%	30.0%	5.0%
Pemberton Borough	404	35.1%	0.7%	8.9%	0.2%	4.9%	5.2%	0.0%	1.2%	2.2%	0.0%	35.1%	3.2%	3.2%
Pemberton Township	40,148	9.4%	0.0%	2.1%	0.4%	0.4%	0.7%	1.0%	0.9%	19.2%	0.1%	62.6%	2.1%	1.1%
Riverside Township	1,049	44.0%	2.5%	13.1%	0.9%	3.8%	2.7%	0.0%	3.8%	0.0%	0.0%	5.1%	9.1%	15.2%
Riverton Borough	614	45.4%	0.5%	9.3%	0.5%	1.8%	1.6%	0.0%	4.6%	0.0%	0.0%	2.4%	31.9%	2.1%
Shamong Township	28,774	8.0%	0.0%	1.0%	0.1%	0.2%	0.1%	0.0%	0.5%	11.4%	0.0%	76.1%	1.2%	1.3%
Southampton Township	28,428	11.3%	0.2%	2.0%	0.7%	1.1%	0.2%	0.0%	0.3%	34.2%	0.0%	47.1%	1.2%	1.8%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Springfield Township	18,913	8.3%	0.5%	2.6%	0.9%	0.7%	0.2%	0.4%	1.1%	57.8%	0.0%	23.9%	0.3%	3.3%
Tabernacle Township	31,669	9.5%	0.1%	1.0%	0.1%	0.3%	0.2%	0.0%	0.6%	11.4%	0.1%	74.2%	1.0%	1.4%
Washington Township	66,502	0.6%	0.0%	0.2%	0.0%	0.0%	0.1%	0.0%	0.2%	3.8%	0.1%	85.7%	3.3%	6.1%
Westampton Township	7,100	15.7%	3.5%	10.1%	0.8%	1.8%	2.3%	0.0%	5.5%	27.3%	0.0%	27.4%	1.4%	4.3%
Willingboro Township	5,173	52.3%	0.8%	12.0%	1.8%	1.9%	3.4%	0.0%	7.7%	0.2%	0.0%	10.5%	5.2%	4.1%
Woodland Township	60,968	1.0%	0.0%	0.9%	0.1%	0.0%	0.2%	0.0%	0.1%	4.4%	0.5%	89.9%	1.9%	0.9%
Wrightstown Borough	1,188	5.1%	0.2%	3.8%	1.3%	1.9%	0.9%	28.5%	6.1%	1.8%	0.0%	46.7%	0.1%	3.8%
Camden County	**145,546**	**29.7%**	**1.8%**	**10.4%**	**1.6%**	**3.0%**	**2.1%**	**0.0%**	**3.3%**	**5.8%**	**0.4%**	**35.3%**	**3.0%**	**3.5%**
Audubon Borough	954	64.1%	0.0%	18.9%	2.1%	5.7%	2.1%	0.0%	3.1%	0.0%	0.0%	3.1%	0.7%	0.1%
Audubon Park Borough	106	47.2%	0.0%	20.8%	0.0%	0.0%	2.8%	0.0%	7.5%	0.0%	0.0%	3.8%	10.4%	7.5%
Barrington Borough	1,011	56.3%	7.2%	17.6%	0.4%	2.8%	1.8%	0.0%	2.2%	0.1%	0.0%	10.3%	0.0%	1.4%
Bellmawr Borough	1,981	37.5%	6.7%	19.8%	1.2%	8.1%	4.9%	0.0%	2.9%	0.0%	0.0%	9.4%	2.7%	6.8%
Berlin Borough	2,313	41.6%	0.5%	14.2%	1.2%	6.0%	4.7%	0.0%	3.1%	2.5%	0.0%	19.8%	0.5%	5.9%
Berlin Township	2,123	32.0%	6.5%	15.2%	1.8%	7.0%	1.6%	0.0%	2.8%	0.7%	2.0%	22.7%	0.9%	6.9%
Brooklawn Borough	340	28.8%	0.6%	18.8%	1.2%	9.7%	1.5%	0.0%	5.6%	0.0%	0.0%	7.1%	10.0%	16.8%
Camden City	6,693	23.3%	5.0%	24.3%	2.9%	3.8%	6.6%	0.0%	4.5%	0.1%	0.0%	5.0%	15.8%	8.8%
Cherry Hill Township	15,464	47.0%	1.1%	17.5%	0.5%	5.8%	3.4%	0.0%	4.8%	1.3%	0.0%	15.3%	0.6%	2.5%
Chesilhurst Borough	1,105	32.8%	0.1%	7.0%	0.1%	2.1%	0.6%	0.0%	0.8%	0.0%	0.0%	55.2%	0.1%	1.3%
Clementon Borough	1,248	41.4%	0.0%	10.2%	0.2%	4.2%	1.0%	0.0%	2.2%	0.0%	0.0%	35.5%	2.6%	2.6%
Collingswood Borough	1,236	55.3%	0.2%	18.3%	0.6%	4.0%	3.4%	0.0%	9.4%	0.0%	0.0%	1.4%	5.7%	1.7%
Gibbsboro Borough	1,408	25.3%	0.6%	7.8%	1.5%	3.3%	1.1%	0.0%	1.7%	0.3%	4.6%	49.9%	2.1%	1.9%
Gloucester Township	14,894	40.2%	0.8%	10.8%	2.2%	3.0%	2.9%	0.1%	4.7%	2.6%	0.0%	26.1%	2.3%	4.2%
Gloucester City	1,783	29.1%	10.6%	13.6%	3.5%	4.0%	3.1%	0.0%	4.7%	0.0%	0.0%	4.1%	18.8%	8.3%
Haddon Township	1,805	54.6%	0.7%	15.9%	0.7%	4.4%	1.9%	0.0%	6.5%	0.0%	0.0%	9.1%	4.8%	1.4%
Haddonfield Borough	1,817	62.6%	0.0%	13.8%	0.4%	2.5%	3.3%	0.0%	4.0%	0.1%	0.0%	11.2%	1.5%	0.6%
Haddon Heights Borough	1,006	62.8%	0.0%	16.8%	0.1%	4.2%	2.7%	0.0%	6.8%	0.0%	0.0%	5.8%	0.0%	0.9%
Hi-Nella Borough	144	31.3%	0.0%	16.0%	0.7%	4.9%	2.1%	0.0%	16.0%	7.6%	0.0%	14.6%	0.0%	6.9%
Laurel Springs Borough	298	67.2%	0.0%	16.2%	2.0%	2.7%	2.0%	0.0%	1.7%	0.0%	0.0%	5.1%	2.7%	0.3%
Lawnside Borough	914	34.3%	3.2%	18.3%	0.9%	4.8%	2.6%	0.0%	1.4%	0.0%	0.0%	32.2%	0.1%	2.2%
Lindenwold Borough	2,523	42.4%	0.2%	16.7%	0.2%	3.4%	3.1%	0.0%	3.6%	0.0%	2.6%	24.7%	1.6%	1.3%
Magnolia Borough	626	53.8%	5.8%	15.5%	0.2%	5.9%	2.4%	0.0%	2.6%	0.0%	0.0%	10.4%	0.0%	3.5%
Merchantville Borough	381	72.8%	0.0%	16.2%	0.3%	3.1%	3.4%	0.0%	3.9%	0.0%	0.0%	0.3%	0.0%	0.0%
Mount Ephraim Borough	582	58.2%	0.2%	17.9%	0.5%	5.2%	1.9%	0.0%	2.6%	0.0%	0.0%	7.0%	2.7%	3.8%
Oaklyn Borough	448	59.6%	0.0%	13.2%	0.9%	4.5%	2.2%	0.0%	2.7%	0.2%	0.0%	5.1%	10.5%	1.1%
Pennsauken Township	7,786	27.3%	10.4%	18.0%	3.2%	4.2%	3.2%	0.1%	4.6%	0.0%	0.0%	9.0%	14.7%	5.3%
Pine Hill Borough	2,527	35.0%	0.2%	7.4%	1.9%	1.3%	1.4%	0.0%	9.2%	1.2%	0.0%	38.3%	0.9%	3.2%
Pine Valley Borough	623	4.7%	0.0%	0.2%	0.3%	0.0%	0.0%	0.0%	40.4%	0.0%	0.0%	52.3%	1.4%	0.8%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Runnemede Borough	1,358	47.6%	2.3%	16.0%	1.3%	5.7%	1.8%	0.0%	3.9%	0.0%	0.0%	15.1%	2.9%	3.5%
Somerdale Borough	889	53.0%	2.3%	16.9%	0.1%	6.2%	2.1%	0.0%	2.9%	0.0%	0.0%	14.2%	0.0%	2.3%
Stratford Borough	1,006	52.5%	0.0%	17.7%	0.4%	5.3%	4.1%	0.0%	3.0%	0.0%	0.0%	14.4%	0.7%	2.0%
Tavistock Borough	175	1.7%	0.0%	4.0%	0.0%	0.0%	0.0%	0.0%	88.1%	0.0%	0.0%	5.1%	1.1%	0.0%
Voorhees Township	7,436	42.9%	0.8%	14.2%	0.9%	4.5%	2.8%	0.0%	3.5%	1.6%	1.2%	20.7%	1.9%	4.9%
Waterford Township	23,146	10.8%	0.3%	1.9%	0.8%	0.7%	0.3%	0.0%	0.6%	8.7%	0.0%	74.3%	0.5%	1.1%
Winslow Township	37,255	16.7%	0.9%	4.2%	2.5%	1.3%	1.0%	0.0%	1.5%	15.1%	0.7%	50.8%	1.6%	3.8%
Woodlynne Borough	142	54.9%	0.7%	16.9%	0.0%	6.3%	2.8%	0.0%	4.9%	0.0%	0.0%	6.3%	3.5%	3.5%
Gloucester County	**215,014**	**20.9%**	**2.1%**	**5.2%**	**1.4%**	**1.7%**	**1.0%**	**0.0%**	**2.1%**	**19.7%**	**0.1%**	**35.4%**	**5.1%**	**5.4%**
Clayton Borough	4,642	23.5%	1.2%	4.6%	0.2%	1.4%	1.7%	0.0%	2.3%	7.2%	0.0%	50.6%	3.1%	4.2%
Deptford Township	11,228	29.8%	0.8%	12.4%	1.9%	4.2%	2.5%	0.0%	3.3%	4.9%	0.0%	32.1%	1.7%	6.4%
East Greenwich Township	9,548	24.0%	0.5%	4.3%	1.6%	1.1%	1.6%	0.0%	1.5%	31.2%	0.0%	25.7%	3.3%	5.3%
Elk Township	12,363	11.9%	0.1%	2.6%	0.2%	0.8%	0.4%	0.0%	1.0%	39.7%	0.0%	40.4%	1.4%	1.8%
Franklin Township	36,053	17.0%	0.2%	2.4%	2.0%	0.8%	0.4%	0.0%	1.2%	21.2%	0.2%	52.1%	1.1%	1.4%
Glassboro Borough	5,989	26.4%	0.9%	9.3%	1.6%	4.2%	4.1%	0.0%	3.1%	4.9%	0.0%	39.8%	0.6%	5.4%
Greenwich Township	7,478	8.8%	12.1%	3.6%	0.8%	0.5%	0.3%	0.0%	1.7%	8.4%	0.0%	26.0%	24.8%	13.0%
Harrison Township	12,180	28.5%	0.5%	4.4%	0.7%	1.0%	0.9%	0.0%	1.7%	34.3%	0.0%	23.0%	0.7%	4.3%
Logan Township	16,828	4.1%	6.1%	4.7%	1.4%	0.8%	0.3%	0.0%	1.1%	20.3%	0.3%	21.7%	21.0%	18.2%
Mantua Township	10,291	25.2%	1.0%	5.9%	1.2%	1.8%	1.0%	0.0%	3.1%	24.5%	0.2%	32.0%	0.8%	3.4%
Monroe Township	30,015	20.2%	0.8%	3.7%	1.8%	1.4%	0.7%	0.0%	1.5%	10.4%	0.3%	54.8%	1.9%	2.5%
National Park Borough	928	28.6%	0.0%	7.3%	0.2%	0.6%	1.0%	0.0%	4.2%	0.0%	0.0%	8.4%	33.5%	16.2%
Newfield Borough	1,114	30.9%	5.0%	4.8%	0.5%	1.5%	1.6%	0.0%	0.9%	16.2%	0.0%	32.7%	0.2%	5.7%
Paulsboro Borough	1,703	25.0%	19.6%	8.7%	1.7%	2.5%	1.5%	0.0%	1.7%	0.6%	0.0%	4.2%	25.7%	8.8%
Pitman Borough	1,443	55.2%	3.5%	12.8%	0.1%	2.7%	2.6%	0.0%	6.2%	0.6%	0.0%	13.0%	1.7%	1.8%
South Harrison Township	10,183	14.4%	0.3%	1.6%	2.8%	0.2%	0.1%	0.0%	0.4%	47.3%	0.0%	30.5%	0.5%	2.0%
Swedesboro Borough	496	39.5%	3.2%	13.5%	0.4%	7.7%	5.4%	0.0%	0.6%	3.0%	0.0%	15.1%	5.8%	5.6%
Washington Township	13,778	42.4%	0.3%	10.8%	0.3%	5.3%	1.8%	0.0%	4.4%	6.4%	0.3%	21.8%	1.1%	5.2%
Wenonah Borough	647	53.2%	0.0%	10.2%	0.0%	1.2%	1.5%	0.0%	2.3%	0.5%	0.0%	28.7%	1.5%	0.8%
West Deptford Township	11,412	18.7%	9.8%	7.9%	2.5%	1.8%	0.8%	0.0%	4.7%	5.0%	0.0%	21.7%	15.2%	12.0%
Westville Borough	871	30.8%	5.3%	14.4%	0.7%	2.8%	1.4%	0.0%	4.9%	0.0%	0.0%	9.9%	27.1%	2.9%
Woodbury City	1,341	46.7%	1.2%	18.4%	0.8%	8.5%	4.9%	0.3%	3.4%	0.0%	0.0%	6.4%	4.5%	4.8%
Woodbury Heights Borough	804	46.7%	0.9%	14.5%	0.1%	7.3%	3.0%	0.0%	3.4%	0.0%	0.0%	20.7%	0.5%	2.9%
Woolwich Township	13,679	18.6%	0.7%	3.9%	0.2%	0.9%	0.5%	0.0%	2.3%	38.7%	0.0%	25.3%	3.5%	5.3%
Mercer County	**146,344**	**26.3%**	**1.4%**	**8.9%**	**1.5%**	**2.6%**	**2.5%**	**0.0%**	**4.1%**	**16.2%**	**0.2%**	**29.0%**	**2.3%**	**4.9%**
East Windsor Township	10,018	23.4%	1.4%	10.4%	2.5%	3.3%	0.7%	0.0%	3.8%	23.1%	0.0%	24.5%	1.3%	5.6%
Ewing Township	9,951	35.3%	2.0%	17.5%	1.1%	4.2%	6.9%	0.2%	5.6%	4.7%	0.0%	15.1%	2.5%	4.9%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Hamilton Township	25,733	31.2%	2.0%	13.3%	2.7%	3.8%	2.9%	0.0%	3.1%	8.9%	0.0%	22.5%	2.8%	6.6%
Hightstown Borough	807	51.5%	2.6%	13.6%	1.4%	5.2%	10.8%	0.0%	6.3%	0.0%	0.0%	3.1%	2.7%	2.7%
Hopewell Borough	463	55.5%	0.0%	8.9%	0.0%	7.1%	4.8%	0.0%	1.3%	14.3%	0.0%	5.8%	0.0%	2.4%
Hopewell Township	37,693	17.2%	0.7%	2.5%	0.7%	0.8%	0.6%	0.0%	1.6%	27.1%	0.7%	43.4%	1.7%	3.0%
Lawrence Township	14,060	27.7%	1.1%	9.8%	2.1%	3.8%	2.1%	0.2%	4.7%	12.3%	0.0%	28.8%	1.3%	6.0%
Pennington Borough	623	57.8%	0.3%	11.6%	0.3%	5.0%	8.7%	0.0%	5.0%	0.0%	0.0%	9.1%	0.3%	1.9%
Princeton	11,776	37.8%	0.0%	5.6%	0.8%	1.0%	5.3%	0.0%	6.5%	4.1%	0.0%	33.0%	2.6%	3.2%
Robbinsville Township	13,160	17.8%	3.8%	7.4%	1.0%	1.5%	0.9%	0.0%	2.3%	27.0%	0.0%	30.1%	1.5%	6.7%
Trenton City	5,269	34.5%	3.5%	23.4%	1.9%	5.0%	9.7%	0.0%	6.4%	0.1%	0.0%	2.9%	8.2%	4.4%
West Windsor Township	16,791	27.3%	0.7%	8.5%	1.3%	3.0%	1.4%	0.0%	9.0%	15.2%	0.0%	25.2%	3.2%	5.3%
Pennsylvania														
Bucks County	**524,714**	**11.9%**	**0.7%**	**3.6%**	**0.7%**	**1.1%**	**0.7%**	**1.0%**	**1.6%**	**14.6%**	**0.1%**	**57.1%**	**2.8%**	**4.1%**
Bedminster Township	20,009	12.8%	0.5%	2.0%	0.3%	0.6%	0.4%	0.0%	0.3%	52.6%	0.0%	25.3%	3.3%	1.9%
Bensalem Township	13,331	34.1%	4.4%	17.8%	0.5%	5.9%	5.0%	0.0%	6.3%	0.7%	0.0%	15.1%	5.6%	4.6%
Bridgeton Township	4,277	16.4%	1.1%	1.4%	1.3%	0.4%	0.1%	0.0%	1.1%	4.4%	0.3%	66.6%	5.1%	1.6%
Bristol Borough	1,185	26.1%	5.6%	20.3%	1.7%	11.1%	4.1%	0.0%	8.4%	0.0%	0.0%	5.4%	12.6%	4.7%
Bristol Township	10,973	35.8%	7.8%	14.8%	3.2%	3.9%	2.7%	0.1%	3.0%	0.1%	0.0%	15.5%	7.0%	6.0%
Buckingham Township	21,099	31.9%	0.2%	3.8%	1.1%	1.2%	0.6%	0.0%	1.9%	35.5%	0.0%	19.8%	0.9%	2.8%
Chalfont Borough	1,055	54.5%	2.0%	10.3%	1.3%	3.5%	2.4%	0.0%	5.7%	0.7%	0.0%	12.5%	2.0%	5.2%
Doylestown Borough	1,376	50.1%	1.3%	17.5%	1.1%	7.3%	9.0%	0.0%	4.9%	0.1%	0.0%	7.4%	0.1%	1.2%
Doylestown Township	9,972	46.2%	0.1%	8.1%	0.4%	2.0%	2.6%	0.0%	3.7%	11.5%	0.2%	19.7%	1.7%	3.9%
Dublin Borough	389	51.9%	1.8%	10.9%	0.3%	7.8%	3.4%	0.0%	3.1%	8.0%	0.0%	1.3%	0.0%	11.6%
Durham Township	5,926	15.3%	0.1%	1.4%	1.1%	0.3%	0.3%	0.0%	0.1%	37.7%	0.0%	40.3%	2.8%	0.8%
East Rockhill Township	8,308	21.8%	0.2%	3.7%	0.8%	0.6%	1.3%	0.0%	2.1%	12.1%	0.5%	53.4%	2.1%	1.3%
Falls Township	17,053	14.6%	9.1%	10.5%	7.4%	2.7%	1.0%	0.0%	3.5%	1.4%	0.0%	18.9%	21.9%	9.1%
Haycock Township	13,493	10.7%	0.0%	1.4%	0.0%	0.1%	0.1%	0.0%	0.9%	11.2%	0.0%	67.4%	6.4%	1.7%
Hilltown Township	17,363	30.5%	0.9%	4.3%	1.1%	1.8%	0.7%	0.0%	0.7%	35.2%	0.7%	19.5%	0.3%	4.3%
Hulmeville Borough	258	45.5%	1.6%	7.8%	1.2%	4.3%	1.2%	0.0%	3.1%	12.5%	0.0%	17.5%	4.3%	1.2%
Ivyland Borough	227	48.2%	11.4%	14.5%	0.0%	2.6%	1.8%	0.0%	2.6%	0.0%	0.0%	12.3%	0.0%	6.6%
Langhorne Borough	330	48.2%	0.0%	11.6%	0.3%	7.3%	12.5%	0.0%	7.6%	1.8%	0.0%	9.8%	0.9%	0.0%
Langhorne Manor Borough	403	50.2%	0.0%	10.9%	0.2%	0.2%	12.6%	0.0%	0.5%	0.0%	0.0%	23.3%	0.7%	1.2%
Lower Makefield Township	11,717	48.4%	0.0%	10.0%	0.5%	1.1%	1.4%	0.0%	3.6%	10.1%	0.0%	17.9%	2.7%	4.2%
Lower Southampton Township	4,285	55.2%	2.5%	12.1%	0.2%	5.0%	4.7%	0.0%	3.9%	0.4%	0.0%	12.1%	0.7%	3.2%
Middletown Township	12,327	37.8%	1.0%	14.2%	0.8%	4.3%	3.6%	0.0%	5.9%	4.4%	0.2%	21.3%	2.4%	4.1%
Milford Township	17,909	19.3%	1.1%	3.6%	1.8%	0.7%	0.6%	0.0%	1.8%	34.6%	0.0%	33.4%	0.6%	2.5%
Morrisville Borough	1,259	44.2%	4.8%	18.9%	1.7%	4.4%	2.9%	0.0%	5.2%	0.2%	0.0%	6.0%	10.4%	1.3%
New Britain Borough	780	51.7%	6.9%	11.0%	0.3%	10.5%	4.5%	0.0%	2.6%	0.9%	0.0%	9.2%	0.3%	2.2%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
New Britain Township	9,761	28.0%	1.0%	4.5%	0.7%	1.4%	1.3%	0.0%	2.6%	23.0%	0.0%	29.2%	4.5%	3.8%
New Hope Borough	894	32.7%	0.0%	11.3%	1.3%	4.9%	3.4%	0.0%	6.6%	0.0%	0.9%	23.5%	12.5%	2.9%
Newtown Borough	352	62.6%	0.3%	16.3%	1.1%	10.0%	3.7%	0.0%	1.7%	0.0%	0.0%	3.1%	0.0%	1.1%
Newtown Township	7,625	34.1%	0.9%	9.6%	1.4%	2.5%	3.6%	0.0%	8.6%	11.8%	0.0%	18.7%	0.8%	7.9%
Nockamixon Township	14,371	13.4%	0.0%	1.4%	1.4%	1.0%	0.3%	0.0%	1.9%	22.0%	0.3%	55.0%	1.9%	1.4%
Northampton Township	16,712	49.9%	1.0%	6.6%	0.3%	0.8%	1.4%	0.0%	5.0%	10.5%	0.0%	17.4%	1.8%	5.1%
Penndel Borough	273	51.3%	4.4%	20.5%	0.4%	12.1%	1.8%	0.0%	2.2%	0.0%	0.0%	5.1%	0.0%	2.2%
Perkasie Borough	1,623	54.9%	0.5%	11.1%	0.4%	3.8%	3.0%	0.0%	4.4%	2.3%	0.0%	12.7%	1.0%	5.8%
Plumstead Township	17,481	23.2%	0.4%	3.0%	1.3%	1.6%	0.4%	0.0%	1.3%	34.6%	0.8%	28.3%	0.8%	4.2%
Quakertown Borough	1,284	45.8%	3.0%	20.2%	0.5%	8.0%	5.7%	0.0%	8.0%	0.0%	0.0%	5.1%	0.2%	3.4%
Richland Township	13,164	18.3%	1.8%	4.1%	1.4%	3.0%	0.7%	0.0%	1.4%	27.1%	0.0%	37.4%	1.3%	3.5%
Richlandtown Borough	175	62.3%	0.0%	10.9%	1.1%	2.3%	8.6%	0.0%	2.9%	2.3%	0.0%	2.9%	0.0%	6.9%
Riegelsville Borough	693	23.6%	0.0%	3.6%	0.3%	1.3%	3.3%	0.0%	0.9%	37.4%	0.0%	17.5%	10.0%	2.2%
Sellersville Borough	763	51.3%	0.9%	11.0%	0.1%	2.4%	5.1%	0.5%	5.4%	0.1%	0.0%	12.7%	1.7%	8.7%
Silverdale Borough	264	53.6%	0.4%	9.9%	0.0%	6.5%	4.6%	0.0%	6.8%	1.9%	0.0%	8.0%	0.0%	8.4%
Solebury Township	17,434	29.2%	0.0%	2.6%	1.2%	0.8%	0.5%	0.0%	0.8%	27.3%	0.7%	31.6%	2.7%	2.6%
Springfield Township	19,607	16.6%	0.5%	1.5%	3.6%	0.5%	0.3%	0.0%	0.3%	30.9%	0.0%	43.5%	0.5%	1.8%
Telford Borough	338	44.8%	13.6%	16.2%	0.3%	1.5%	5.3%	0.0%	2.4%	0.0%	0.0%	10.0%	0.0%	5.9%
Tinicum Township	19,827	14.6%	0.2%	1.8%	0.1%	0.3%	0.4%	0.0%	1.1%	27.8%	0.1%	48.1%	4.4%	1.1%
Trumbauersville Borough	277	48.7%	1.8%	9.0%	0.4%	2.5%	4.3%	0.0%	2.9%	26.7%	0.0%	2.2%	0.0%	1.4%
Tullytown Borough	1,323	10.8%	5.7%	10.4%	22.3%	4.6%	1.7%	0.0%	3.0%	0.2%	0.0%	8.6%	28.4%	4.3%
Upper Makefield Township	13,896	34.7%	0.0%	2.6%	0.1%	0.2%	0.8%	0.0%	2.5%	23.1%	0.0%	29.5%	2.9%	3.5%
Upper Southampton Township	4,238	57.3%	2.5%	11.3%	0.4%	3.8%	1.8%	0.0%	3.0%	1.5%	0.0%	15.6%	0.2%	2.5%
Warminster Township	6,513	50.4%	4.0%	14.9%	1.0%	4.2%	3.9%	0.0%	8.3%	0.8%	0.0%	6.5%	0.4%	5.7%
Warrington Township	8,823	39.7%	1.0%	8.0%	0.8%	2.9%	1.9%	0.0%	4.1%	14.0%	2.7%	18.1%	1.1%	5.8%
Warwick Township	7,111	32.8%	1.0%	6.1%	1.5%	1.8%	1.6%	0.0%	5.1%	16.1%	0.0%	27.1%	1.3%	5.7%
West Rockhill Township	10,483	18.0%	1.5%	3.6%	2.4%	1.4%	1.2%	0.0%	1.0%	16.6%	1.1%	50.0%	1.1%	1.9%
Wrightstown Township	6,247	30.1%	0.2%	2.5%	0.5%	1.5%	0.5%	0.0%	1.2%	23.3%	6.4%	28.3%	1.0%	4.3%
Yardley Borough	645	43.1%	0.5%	10.5%	1.4%	4.0%	1.4%	0.0%	18.1%	0.0%	0.0%	8.4%	9.9%	2.6%
Chester County	**485,484**	**25.7%**	**0.7%**	**4.1%**	**1.1%**	**1.5%**	**1.2%**	**0.0%**	**2.1%**	**32.5%**	**0.1%**	**27.2%**	**1.0%**	**2.8%**
Atglen Borough	567	31.9%	1.9%	7.9%	1.1%	1.6%	1.9%	0.0%	0.7%	29.5%	0.0%	20.3%	0.2%	3.0%
Avondale Borough	314	29.0%	2.5%	10.8%	1.3%	4.8%	1.6%	0.0%	2.9%	7.3%	6.1%	21.3%	2.2%	10.2%
Birmingham Township	4,172	42.3%	0.0%	3.1%	0.5%	1.3%	0.6%	0.0%	4.4%	19.5%	0.0%	21.1%	1.8%	5.4%
Caln Township	5,698	33.3%	2.3%	10.3%	1.1%	3.7%	3.7%	0.0%	4.8%	4.6%	0.0%	30.7%	0.4%	5.0%
Charlestown Township	8,011	27.5%	0.6%	4.0%	0.2%	0.8%	0.6%	0.0%	1.0%	22.2%	0.9%	39.9%	0.4%	1.9%
Coatesville City	1,184	37.6%	7.4%	16.2%	0.8%	3.7%	5.2%	0.0%	2.9%	0.2%	0.0%	20.6%	0.9%	4.6%
Downingtown Borough	1,418	30.3%	6.3%	17.6%	0.3%	5.6%	6.1%	0.0%	11.6%	4.2%	0.0%	12.1%	1.5%	4.4%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
East Bradford Township	9,684	33.3%	0.1%	3.2%	1.8%	0.6%	0.8%	0.0%	2.4%	24.1%	0.0%	29.1%	1.1%	3.5%
East Brandywine Township	7,145	40.9%	0.2%	3.4%	0.1%	0.7%	0.8%	0.0%	3.5%	14.6%	0.0%	29.6%	0.9%	5.2%
East Caln Township	2,358	24.9%	2.6%	13.0%	0.9%	7.0%	1.8%	0.0%	7.3%	0.9%	8.1%	26.0%	3.1%	4.3%
East Coventry Township	6,912	35.3%	0.9%	2.7%	2.1%	1.0%	1.2%	0.0%	0.5%	34.5%	0.0%	18.4%	1.9%	1.5%
East Fallowfield Township	10,006	23.0%	0.0%	1.9%	1.4%	0.4%	0.5%	0.0%	0.8%	35.1%	0.6%	32.8%	0.7%	2.7%
East Goshen Township	6,496	54.7%	1.3%	8.1%	0.4%	1.9%	1.3%	0.0%	7.3%	5.4%	0.0%	15.1%	0.8%	3.6%
East Marlborough Township	9,943	25.8%	0.5%	3.5%	0.3%	1.4%	3.6%	0.0%	2.3%	41.3%	0.0%	17.5%	0.7%	3.2%
East Nantmeal Township	10,476	10.7%	0.0%	1.5%	1.1%	0.3%	0.9%	0.0%	2.1%	32.6%	0.0%	47.7%	0.9%	2.3%
East Nottingham Township	12,868	22.2%	0.3%	2.4%	1.2%	0.7%	0.3%	0.0%	0.7%	55.0%	0.0%	14.2%	0.5%	2.7%
East Pikeland Township	5,685	34.0%	0.5%	4.6%	1.7%	3.0%	0.8%	0.2%	1.4%	24.7%	0.0%	25.5%	1.6%	2.0%
Easttown Township	5,282	61.8%	0.0%	5.9%	0.1%	1.5%	2.1%	0.0%	4.6%	6.2%	0.0%	16.6%	0.4%	0.9%
East Vincent Township	8,733	27.1%	0.4%	2.7%	0.7%	0.9%	1.9%	0.3%	3.8%	38.0%	0.0%	19.7%	1.8%	2.5%
East Whiteland Township	7,035	24.2%	2.5%	13.8%	3.0%	8.8%	4.2%	0.0%	5.3%	4.9%	2.9%	21.5%	1.1%	7.7%
Elk Township	6,449	12.5%	0.0%	1.2%	0.0%	0.1%	0.0%	0.0%	0.2%	51.4%	0.0%	32.9%	0.9%	0.8%
Elverson Borough	642	30.9%	3.3%	7.0%	1.7%	3.4%	4.5%	0.0%	3.9%	16.1%	0.0%	20.9%	1.2%	7.0%
Franklin Township	8,394	26.0%	0.0%	2.0%	0.6%	0.1%	0.2%	0.0%	1.9%	38.0%	0.0%	28.6%	0.6%	2.0%
Highland Township	10,995	4.7%	0.1%	1.1%	1.3%	0.0%	0.2%	0.0%	0.3%	72.3%	0.0%	19.0%	0.3%	0.7%
Honey Brook Borough	305	55.1%	0.7%	10.2%	0.3%	4.6%	3.9%	0.0%	1.6%	17.0%	0.0%	0.0%	0.0%	6.6%
Honey Brook Township	16,133	13.0%	0.6%	1.7%	0.8%	0.5%	0.3%	0.0%	1.4%	53.9%	0.5%	24.0%	1.5%	1.8%
Kennett Township	9,902	34.5%	0.3%	3.4%	0.3%	1.4%	0.9%	0.0%	1.1%	25.2%	0.0%	25.7%	0.8%	6.3%
Kennett Square Borough	693	49.9%	1.4%	17.2%	1.0%	6.9%	5.3%	0.0%	6.8%	2.3%	0.0%	4.2%	0.0%	4.9%
London Britain Township	6,274	27.0%	0.0%	1.8%	0.2%	0.3%	0.1%	0.0%	0.6%	25.3%	0.0%	42.4%	0.9%	1.4%
Londonderry Township	7,286	12.4%	0.0%	1.5%	1.0%	0.6%	0.3%	0.0%	0.1%	61.0%	0.0%	19.8%	0.3%	2.9%
London Grove Township	11,035	21.0%	0.0%	3.3%	1.7%	1.3%	0.7%	0.0%	2.3%	44.0%	0.0%	22.2%	0.7%	2.8%
Lower Oxford Township	11,742	11.3%	0.8%	2.4%	2.1%	0.9%	1.1%	0.0%	2.1%	56.3%	0.0%	18.8%	2.0%	2.4%
Malvern Borough	822	34.1%	1.0%	11.0%	0.1%	7.2%	6.3%	0.0%	9.1%	1.6%	0.0%	27.2%	0.5%	1.9%
Modena Borough	229	32.3%	3.1%	4.4%	0.4%	6.1%	0.4%	0.0%	0.9%	2.6%	0.0%	46.3%	2.6%	0.9%
New Garden Township	10,408	27.7%	1.5%	4.9%	0.3%	2.7%	0.9%	0.0%	4.0%	30.8%	0.0%	21.5%	1.1%	4.6%
Newlin Township	7,750	8.9%	0.0%	1.0%	2.2%	0.1%	0.3%	0.0%	0.3%	46.3%	0.0%	37.0%	1.4%	2.4%
New London Township	7,512	30.8%	0.0%	2.3%	0.5%	0.2%	0.7%	0.0%	0.9%	35.7%	0.0%	25.4%	0.6%	2.9%
North Coventry Township	8,693	29.8%	0.0%	4.6%	0.7%	1.3%	0.9%	0.0%	3.0%	19.4%	0.0%	36.5%	1.8%	1.9%
Oxford Borough	1,254	33.8%	2.0%	10.9%	2.2%	4.7%	4.2%	0.0%	1.9%	20.6%	0.0%	9.5%	0.1%	10.0%
Parkesburg Borough	811	49.8%	3.1%	11.5%	2.3%	3.0%	1.6%	0.0%	2.7%	8.4%	1.6%	12.8%	0.1%	3.1%
Penn Township	6,162	23.5%	1.0%	3.8%	1.7%	1.2%	1.5%	0.0%	0.5%	44.4%	0.0%	17.1%	0.6%	4.7%
Pennsbury Township	6,423	30.6%	0.0%	2.7%	0.2%	0.8%	1.3%	0.0%	0.8%	24.0%	0.0%	34.3%	1.2%	4.2%
Phoenixville Borough	2,376	39.0%	1.1%	13.6%	2.6%	6.1%	4.5%	0.0%	5.2%	0.4%	0.0%	17.8%	5.0%	4.9%
Pocopson Township	5,329	26.5%	0.4%	2.5%	1.2%	0.4%	2.6%	0.0%	0.8%	33.2%	0.0%	25.0%	1.4%	6.1%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Sadsbury Township	3,959	21.3%	2.1%	4.9%	1.8%	1.6%	1.0%	0.2%	0.6%	35.5%	0.0%	25.6%	0.3%	5.0%
Schuylkill Township	5,694	42.0%	0.8%	4.8%	1.8%	1.8%	3.0%	0.0%	5.3%	10.2%	0.0%	24.3%	4.1%	1.9%
South Coatesville Borough	1,125	11.8%	13.3%	4.3%	8.5%	1.2%	2.9%	0.0%	0.8%	6.4%	0.0%	43.1%	1.0%	6.7%
South Coventry Township	4,872	19.7%	0.0%	2.5%	1.1%	1.2%	1.1%	0.0%	1.1%	27.8%	0.0%	42.5%	0.8%	2.1%
Spring City Borough	528	44.3%	3.8%	11.2%	1.5%	6.6%	0.8%	0.0%	1.1%	7.6%	0.0%	15.7%	6.1%	1.3%
Thornbury Township	2,486	46.8%	0.0%	4.7%	0.1%	1.2%	2.1%	0.0%	7.2%	7.9%	0.0%	21.4%	0.6%	8.0%
Tredyffrin Township	12,700	47.9%	0.3%	11.8%	1.5%	5.5%	2.1%	0.0%	7.1%	1.8%	0.0%	19.4%	0.4%	2.3%
Upper Oxford Township	10,698	10.6%	0.2%	1.7%	1.3%	0.1%	0.1%	0.0%	0.0%	66.3%	0.0%	18.5%	0.4%	0.8%
Upper Uwchlan Township	7,496	34.5%	0.9%	6.1%	1.2%	2.1%	0.8%	0.0%	1.5%	13.0%	0.0%	27.4%	7.0%	5.5%
Uwchlan Township	6,685	45.1%	1.8%	12.0%	0.1%	4.2%	1.7%	0.0%	2.8%	8.0%	0.0%	20.5%	0.5%	3.2%
Valley Township	3,818	27.8%	5.4%	13.0%	1.1%	1.6%	1.4%	0.0%	1.4%	9.5%	0.0%	33.7%	0.3%	4.7%
Wallace Township	7,758	25.1%	0.0%	2.2%	2.0%	0.3%	1.0%	0.0%	0.5%	19.4%	0.0%	44.9%	1.4%	3.3%
Warwick Township	12,085	11.5%	0.0%	1.3%	0.1%	0.3%	0.3%	0.0%	2.2%	25.9%	0.4%	55.9%	0.7%	1.5%
West Bradford Township	11,871	29.8%	0.1%	3.1%	2.5%	0.5%	1.1%	0.0%	3.2%	21.7%	0.0%	33.7%	0.5%	3.8%
West Brandywine Township	8,537	31.5%	0.1%	3.0%	1.3%	0.7%	1.6%	0.0%	1.2%	25.8%	0.0%	31.4%	0.7%	2.6%
West Caln Township	14,024	25.2%	0.4%	2.0%	0.8%	0.4%	0.4%	0.0%	1.8%	29.4%	0.0%	36.3%	1.3%	1.8%
West Chester Borough	1,182	50.4%	1.9%	19.6%	0.3%	7.2%	9.1%	0.1%	6.7%	0.1%	0.0%	1.4%	0.0%	3.1%
West Fallowfield Township	11,661	7.0%	0.5%	1.5%	1.1%	0.2%	0.3%	0.0%	1.7%	68.4%	0.0%	18.1%	0.5%	0.7%
West Goshen Township	7,669	47.5%	5.5%	13.5%	1.0%	4.9%	4.4%	0.0%	3.7%	2.1%	0.0%	14.2%	1.1%	2.2%
West Grove Borough	415	62.5%	0.5%	10.1%	0.2%	4.8%	2.9%	0.0%	2.9%	1.2%	0.0%	9.9%	0.0%	5.0%
West Marlborough Township	10,913	3.0%	0.0%	1.0%	1.5%	0.1%	0.2%	0.0%	0.1%	73.1%	0.0%	19.8%	0.6%	0.6%
West Nantmeal Township	8,644	13.6%	0.1%	2.0%	0.6%	0.3%	0.7%	0.0%	0.6%	48.0%	0.0%	30.5%	1.4%	2.3%
West Nottingham Township	9,004	10.8%	0.8%	1.9%	2.2%	0.5%	0.3%	0.0%	0.9%	35.2%	0.0%	43.7%	1.1%	2.6%
West Pikeland Township	6,372	30.7%	0.0%	2.4%	0.1%	0.3%	0.3%	0.0%	1.0%	23.4%	0.0%	39.1%	0.6%	1.9%
West Sadsbury Township	6,817	12.8%	1.6%	2.8%	0.6%	1.9%	0.3%	0.0%	0.1%	59.1%	0.0%	19.6%	0.4%	0.9%
Westtown Township	5,527	51.6%	0.0%	5.5%	0.1%	1.1%	2.3%	0.0%	4.1%	14.5%	0.0%	15.9%	0.6%	4.3%
West Vincent Township	11,401	20.9%	0.0%	1.9%	0.3%	0.6%	0.2%	0.0%	0.4%	35.0%	0.1%	37.1%	0.9%	2.6%
West Whiteland Township	8,269	35.0%	1.7%	12.6%	2.0%	7.3%	1.6%	0.0%	3.2%	7.9%	0.2%	24.1%	0.4%	4.0%
Willistown Township	11,668	34.6%	0.0%	3.7%	0.1%	0.9%	1.9%	0.0%	2.5%	28.4%	0.0%	26.3%	0.6%	1.1%
Delaware County	**122,236**	**42.0%**	**2.4%**	**11.4%**	**1.0%**	**3.0%**	**4.0%**	**0.0%**	**4.5%**	**3.9%**	**0.2%**	**19.7%**	**4.5%**	**3.2%**
Aldan Borough	383	71.8%	0.0%	15.1%	0.0%	4.7%	1.0%	0.0%	3.4%	0.0%	0.0%	3.4%	0.3%	0.3%
Aston Township	3,747	44.6%	3.6%	10.7%	2.2%	5.3%	4.0%	0.0%	2.4%	1.4%	1.0%	21.3%	1.1%	2.3%
Bethel Township	3,452	51.9%	5.1%	6.1%	1.2%	1.3%	0.6%	0.0%	1.6%	2.4%	0.0%	25.6%	0.3%	4.0%
Brookhaven Borough	1,088	56.7%	0.1%	15.5%	2.4%	4.3%	2.9%	0.0%	3.9%	0.0%	0.0%	12.4%	0.8%	1.0%
Chadds Ford Township	5,576	28.3%	0.0%	4.4%	1.2%	2.5%	0.8%	0.0%	0.8%	20.0%	0.0%	37.8%	1.5%	2.7%
Chester City	4,019	21.1%	5.7%	17.9%	2.4%	4.6%	6.3%	0.0%	7.2%	0.0%	0.0%	4.5%	23.6%	6.6%
Chester Township	912	17.7%	16.5%	15.0%	4.3%	5.0%	4.9%	0.0%	3.3%	0.0%	1.0%	22.4%	1.1%	8.8%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Chester Heights Borough	1,424	32.5%	0.3%	6.0%	1.8%	3.6%	1.1%	0.0%	1.6%	12.3%	0.0%	38.6%	0.8%	1.5%
Clifton Heights Borough	404	46.4%	2.5%	19.0%	0.2%	14.1%	2.0%	0.0%	5.9%	0.0%	0.0%	6.9%	1.5%	1.5%
Collingdale Borough	554	47.6%	1.1%	15.5%	0.0%	9.0%	16.6%	0.0%	4.5%	0.0%	0.0%	5.2%	0.0%	0.5%
Colwyn Borough	168	33.1%	8.4%	17.5%	0.6%	4.2%	1.2%	0.0%	8.4%	0.0%	0.0%	21.1%	4.2%	1.2%
Concord Township	8,738	41.2%	0.6%	7.4%	2.0%	3.3%	3.0%	0.0%	3.7%	6.8%	0.0%	26.4%	0.6%	5.1%
Darby Borough	541	36.5%	0.9%	17.8%	0.6%	6.3%	19.1%	0.0%	2.6%	0.0%	0.0%	10.0%	1.9%	4.4%
Darby Township	905	29.9%	16.6%	13.4%	2.5%	6.1%	12.8%	0.0%	4.8%	0.0%	0.7%	8.0%	2.4%	2.9%
East Lansdowne Borough	130	75.0%	0.0%	14.4%	0.0%	5.3%	4.5%	0.0%	0.8%	0.0%	0.0%	0.0%	0.0%	0.0%
Eddystone Borough	1,086	5.5%	11.1%	16.3%	12.4%	4.0%	1.1%	0.0%	0.4%	0.0%	0.0%	4.5%	39.6%	5.2%
Edgmont Township	6,226	25.8%	0.2%	3.5%	0.2%	1.1%	0.8%	0.4%	3.9%	11.7%	0.0%	49.8%	0.8%	1.9%
Folcroft Borough	906	23.0%	10.7%	11.3%	0.2%	4.9%	3.9%	0.0%	2.1%	0.0%	0.0%	10.6%	17.1%	16.2%
Glenolden Borough	620	54.1%	0.3%	18.1%	1.1%	6.5%	3.1%	0.0%	7.3%	0.0%	0.0%	8.4%	0.3%	0.8%
Haverford Township	6,353	61.5%	0.0%	12.3%	0.3%	2.3%	4.0%	0.0%	10.3%	0.0%	0.0%	8.1%	0.1%	1.0%
Lansdowne Borough	754	66.5%	0.3%	15.8%	0.1%	4.0%	2.6%	0.0%	3.7%	0.0%	0.0%	6.2%	0.5%	0.3%
Lower Chichester Township	693	15.2%	17.9%	13.6%	4.9%	3.5%	18.5%	0.0%	3.3%	0.0%	0.0%	14.7%	0.4%	7.9%
Marcus Hook Borough	1,060	5.0%	45.7%	7.5%	0.4%	1.0%	0.8%	0.0%	1.4%	0.0%	0.0%	2.7%	33.6%	2.0%
Marple Township	6,767	47.5%	0.5%	11.6%	0.5%	2.2%	5.8%	0.0%	3.9%	0.9%	0.0%	22.4%	3.3%	1.4%
Media Borough	489	48.5%	0.0%	24.8%	0.4%	12.7%	5.5%	0.0%	2.5%	0.0%	0.0%	4.1%	0.4%	1.0%
Middletown Township	8,602	37.0%	0.6%	6.7%	0.8%	1.4%	6.4%	0.0%	2.1%	6.7%	0.6%	34.8%	0.7%	2.1%
Millbourne Borough	46	24.4%	0.0%	24.4%	0.0%	13.3%	0.0%	0.0%	0.0%	0.0%	0.0%	13.3%	4.4%	20.0%
Morton Borough	230	60.4%	1.7%	20.4%	0.0%	8.3%	2.6%	0.0%	1.3%	0.0%	0.0%	4.3%	0.0%	0.9%
Nether Providence Township	3,026	61.8%	0.0%	10.8%	0.4%	1.0%	2.6%	0.0%	6.4%	0.1%	0.3%	15.3%	1.0%	0.2%
Newtown Township	6,441	46.3%	0.0%	8.0%	0.1%	2.7%	2.1%	0.0%	7.0%	4.4%	0.0%	19.9%	1.0%	8.5%
Norwood Borough	523	57.9%	0.0%	13.6%	0.2%	2.7%	2.1%	0.0%	6.5%	0.0%	0.0%	8.6%	6.9%	1.5%
Parkside Borough	132	69.7%	0.0%	15.9%	0.8%	3.0%	3.0%	0.0%	1.5%	0.0%	0.0%	5.3%	0.0%	0.8%
Prospect Park Borough	480	59.8%	0.0%	19.0%	0.0%	7.5%	3.3%	0.0%	6.0%	0.0%	0.0%	2.7%	1.5%	0.2%
Radnor Township	8,824	55.5%	0.2%	10.5%	0.5%	2.4%	6.7%	0.0%	7.4%	4.9%	0.0%	10.2%	0.3%	1.5%
Ridley Township	3,454	49.6%	5.6%	18.7%	0.4%	4.4%	2.5%	0.2%	4.0%	0.1%	0.0%	6.3%	5.7%	2.6%
Ridley Park Borough	691	57.0%	0.0%	19.5%	0.1%	3.6%	3.9%	0.0%	6.4%	0.0%	0.0%	8.2%	0.6%	0.6%
Rose Valley Borough	472	71.0%	0.0%	4.9%	0.2%	0.2%	1.7%	0.0%	1.3%	0.0%	0.0%	17.8%	2.1%	0.8%
Rutledge Borough	91	85.7%	0.0%	12.1%	0.0%	0.0%	1.1%	0.0%	1.1%	0.0%	0.0%	0.0%	0.0%	0.0%
Sharon Hill Borough	490	41.7%	13.3%	20.4%	1.4%	5.7%	3.1%	0.0%	4.9%	0.0%	0.0%	8.0%	1.0%	0.4%
Springfield Township	4,056	54.2%	0.1%	14.0%	1.0%	4.8%	3.4%	0.0%	9.5%	0.0%	0.0%	11.7%	0.5%	0.7%
Swarthmore Borough	894	57.6%	0.0%	10.2%	0.0%	0.8%	13.1%	0.0%	6.8%	0.0%	0.0%	9.9%	0.7%	1.0%
Thornbury Township	5,911	40.1%	0.0%	3.3%	0.4%	0.4%	2.1%	0.0%	4.9%	10.7%	1.7%	31.6%	0.9%	3.9%
Tinicum Township	5,590	3.9%	4.7%	33.6%	0.3%	1.8%	0.4%	0.0%	1.1%	0.0%	0.0%	6.3%	38.5%	9.5%
Trainer Borough	889	10.7%	30.1%	10.7%	2.6%	4.1%	0.3%	0.0%	2.1%	0.0%	0.0%	8.4%	25.3%	5.6%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
Upland Borough	403	36.2%	0.0%	15.9%	0.0%	7.9%	11.7%	1.0%	12.4%	0.0%	0.0%	11.2%	1.5%	2.2%
Upper Chichester Township	4,273	41.8%	5.6%	11.5%	2.2%	6.4%	2.4%	0.0%	2.1%	0.6%	0.0%	22.0%	0.3%	5.0%
Upper Darby Township	5,000	53.2%	0.7%	18.5%	0.9%	5.5%	7.9%	0.0%	5.0%	0.0%	0.0%	7.2%	0.6%	0.7%
Upper Providence Township	3,699	60.6%	0.0%	7.5%	0.1%	1.0%	2.3%	0.0%	4.0%	0.1%	0.0%	19.7%	4.1%	0.5%
Yeadon Borough	1,024	35.9%	4.2%	13.9%	0.0%	2.2%	24.5%	0.0%	3.3%	0.0%	0.0%	13.8%	1.1%	1.1%
Montgomery County	**397,501**	**28.1%**	**1.4%**	**5.9%**	**1.4%**	**1.8%**	**1.4%**	**0.0%**	**2.6%**	**20.6%**	**0.3%**	**29.5%**	**3.3%**	**3.6%**
Abington Township	9,909	58.0%	0.2%	12.2%	0.2%	2.9%	6.4%	0.0%	5.5%	1.8%	0.0%	11.3%	0.3%	1.2%
Ambler Borough	545	54.5%	2.0%	18.7%	0.4%	8.1%	4.2%	0.0%	2.6%	0.0%	0.0%	5.0%	0.0%	4.6%
Bridgeport Borough	451	29.2%	10.2%	22.8%	2.2%	11.7%	2.2%	0.0%	5.1%	0.0%	0.0%	6.4%	6.6%	3.5%
Bryn Athyn Borough	1,246	21.3%	0.0%	4.7%	0.1%	1.8%	11.3%	0.0%	3.8%	16.5%	0.0%	34.8%	1.6%	4.2%
Cheltenham Township	5,778	54.9%	0.1%	14.7%	0.4%	3.4%	9.8%	0.0%	7.9%	0.0%	0.1%	6.5%	0.5%	1.5%
Collegeville Borough	1,027	48.7%	0.4%	12.5%	0.1%	5.2%	7.8%	0.0%	4.4%	2.9%	0.0%	13.4%	2.0%	2.6%
Conshohocken Borough	652	45.2%	5.4%	23.6%	0.8%	7.7%	2.3%	0.0%	5.1%	0.0%	0.0%	4.6%	3.4%	2.1%
Douglass Township	9,865	25.3%	1.1%	3.8%	0.7%	1.5%	0.5%	0.0%	1.6%	41.7%	0.0%	21.3%	0.5%	2.0%
East Greenville Borough	321	50.9%	5.3%	14.3%	0.3%	3.1%	5.9%	0.0%	9.9%	1.2%	0.0%	3.7%	0.0%	5.3%
East Norriton Township	3,890	49.6%	1.0%	12.4%	0.6%	4.6%	3.8%	0.0%	2.3%	7.9%	0.8%	13.1%	0.4%	3.5%
Franconia Township	8,870	33.8%	2.4%	6.0%	2.3%	1.8%	2.2%	0.0%	4.7%	32.0%	0.0%	9.9%	0.6%	4.2%
Green Lane Borough	209	36.2%	2.9%	10.5%	0.5%	6.2%	1.0%	0.0%	2.9%	3.3%	0.0%	29.0%	2.9%	4.8%
Hatboro Borough	906	59.1%	4.6%	16.2%	0.4%	6.6%	4.1%	0.0%	3.5%	0.0%	0.0%	3.3%	0.9%	1.2%
Hatfield Borough	407	57.6%	3.0%	14.3%	1.0%	5.9%	2.2%	0.0%	3.0%	1.7%	0.0%	5.9%	0.2%	5.2%
Hatfield Township	6,357	38.0%	8.5%	10.5%	2.7%	6.1%	1.6%	0.0%	3.1%	10.2%	0.0%	13.7%	0.3%	5.5%
Horsham Township	11,074	34.1%	1.5%	9.9%	1.3%	5.1%	3.0%	7.4%	9.4%	7.2%	0.0%	17.2%	0.6%	3.5%
Jenkintown Borough	371	63.7%	0.0%	20.4%	0.0%	8.3%	3.8%	0.0%	2.7%	0.0%	0.0%	1.1%	0.0%	0.0%
Lansdale Borough	1,917	47.6%	7.0%	20.5%	1.4%	5.4%	5.3%	0.0%	5.1%	0.3%	0.0%	3.4%	0.1%	3.9%
Limerick Township	14,564	23.9%	1.4%	6.9%	2.5%	3.4%	1.4%	0.0%	6.0%	20.7%	0.0%	26.3%	1.4%	6.2%
Lower Frederick Township	5,217	25.7%	0.2%	3.0%	0.1%	1.3%	0.7%	0.0%	1.7%	18.9%	0.0%	44.4%	1.7%	2.3%
Lower Gwynedd Township	5,950	51.2%	4.7%	7.8%	0.2%	1.5%	3.3%	0.0%	6.3%	3.0%	0.0%	18.8%	0.6%	2.6%
Lower Merion Township	15,275	61.0%	0.1%	10.4%	0.4%	1.6%	7.0%	0.0%	4.9%	0.0%	0.0%	12.3%	1.4%	0.9%
Lower Moreland Township	4,653	51.9%	1.8%	9.1%	0.6%	2.1%	4.1%	0.0%	9.5%	4.3%	0.0%	11.6%	0.6%	4.4%
Lower Pottsgrove Township	5,118	37.8%	2.8%	7.7%	0.9%	2.9%	1.4%	0.0%	4.2%	6.8%	0.9%	29.4%	1.7%	3.4%
Lower Providence Township	9,879	40.6%	1.0%	7.6%	1.8%	3.2%	2.6%	0.0%	3.5%	6.8%	0.0%	26.8%	2.3%	4.0%
Lower Salford Township	9,304	42.8%	1.3%	6.0%	0.8%	1.9%	1.2%	0.0%	4.9%	20.3%	0.4%	14.0%	0.9%	5.5%
Marlborough Township	8,122	19.3%	0.1%	2.1%	1.4%	0.6%	0.4%	0.0%	5.4%	12.8%	0.9%	51.8%	2.7%	2.5%
Montgomery Township	6,805	47.2%	4.8%	14.4%	1.3%	5.8%	1.2%	0.0%	4.2%	1.1%	1.1%	13.1%	0.3%	5.6%
Narberth Borough	316	70.5%	0.0%	18.4%	0.0%	4.8%	1.6%	0.0%	3.2%	0.0%	0.0%	1.3%	0.0%	0.3%
New Hanover Township	13,837	24.1%	0.1%	2.8%	0.3%	0.5%	0.6%	0.0%	5.1%	23.5%	0.0%	40.8%	0.7%	1.6%
Norristown Borough	2,319	39.4%	1.0%	19.9%	2.5%	8.1%	8.3%	0.0%	5.1%	1.6%	0.0%	8.8%	3.3%	2.1%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
North Wales Borough	373	66.2%	3.2%	17.2%	0.8%	5.1%	3.2%	0.0%	3.8%	0.0%	0.0%	0.0%	0.0%	0.5%
Pennsburg Borough	504	45.6%	0.0%	14.9%	0.2%	11.9%	10.7%	0.0%	4.4%	2.6%	0.0%	4.6%	0.6%	4.6%
Perkiomen Township	3,148	40.2%	1.6%	6.7%	2.8%	1.5%	2.4%	0.0%	3.9%	12.1%	0.0%	22.3%	1.9%	4.6%
Plymouth Township	5,426	35.7%	4.2%	18.9%	5.2%	10.9%	2.7%	0.1%	5.0%	2.8%	0.0%	8.8%	1.3%	4.5%
Pottstown Borough	3,167	35.3%	8.2%	20.7%	1.8%	6.5%	5.4%	0.0%	7.0%	0.0%	0.0%	9.7%	2.3%	3.1%
Red Hill Borough	429	47.3%	4.7%	15.2%	0.0%	4.7%	6.5%	0.0%	4.2%	6.1%	0.0%	3.7%	0.0%	7.7%
Rockledge Borough	220	59.9%	0.0%	16.2%	0.0%	7.2%	11.3%	0.0%	3.2%	0.0%	0.0%	1.8%	0.0%	0.5%
Royersford Borough	516	51.8%	9.1%	16.1%	0.8%	4.3%	3.7%	0.0%	3.5%	0.0%	0.0%	4.9%	3.5%	2.3%
Salford Township	6,109	24.5%	0.0%	2.9%	2.1%	0.4%	0.3%	0.0%	1.3%	18.6%	0.0%	46.3%	1.2%	2.3%
Schwenksville Borough	268	49.8%	0.0%	10.4%	2.6%	2.2%	7.8%	0.0%	3.0%	3.3%	0.0%	16.7%	2.6%	1.5%
Skippack Township	8,924	26.2%	0.4%	4.9%	2.3%	1.7%	2.9%	0.1%	2.6%	22.6%	0.0%	28.6%	1.5%	6.2%
Souderton Borough	715	59.2%	0.8%	18.2%	0.1%	6.3%	5.4%	0.0%	5.6%	0.1%	0.0%	2.5%	0.0%	1.7%
Springfield Township	4,313	55.8%	0.7%	10.7%	0.7%	2.5%	4.5%	0.0%	12.9%	3.6%	0.0%	6.4%	0.4%	1.7%
Telford Borough	311	61.2%	3.2%	16.5%	1.6%	5.8%	4.2%	0.0%	3.9%	0.0%	0.0%	1.3%	0.0%	2.3%
Towamencin Township	6,193	45.8%	1.9%	10.3%	1.9%	1.9%	2.8%	0.0%	4.4%	10.9%	0.0%	15.6%	0.7%	3.7%
Trappe Borough	1,329	41.8%	1.6%	7.9%	2.2%	3.6%	3.0%	0.0%	2.8%	22.3%	0.0%	10.6%	0.2%	4.1%
Upper Dublin Township	8,501	52.4%	0.9%	12.2%	0.6%	3.7%	3.7%	0.0%	8.2%	1.0%	0.0%	14.8%	0.5%	2.1%
Upper Frederick Township	6,450	19.9%	0.0%	2.0%	0.4%	0.3%	0.7%	0.0%	1.7%	32.6%	0.0%	39.1%	2.0%	1.4%
Upper Gwynedd Township	5,198	44.8%	8.2%	10.1%	3.5%	2.6%	1.7%	0.0%	3.0%	6.5%	0.0%	14.8%	0.2%	4.7%
Upper Hanover Township	13,555	19.5%	1.8%	2.8%	1.5%	1.2%	0.8%	0.0%	2.4%	30.1%	0.0%	28.2%	5.8%	6.0%
Upper Merion Township	11,115	27.4%	5.2%	17.0%	2.6%	7.4%	2.4%	0.0%	11.1%	0.1%	1.3%	18.5%	2.6%	4.2%
Upper Moreland Township	5,105	48.4%	3.2%	14.7%	1.2%	5.7%	2.3%	0.0%	8.1%	2.1%	0.0%	12.0%	0.5%	1.9%
Upper Pottsgrove Township	3,203	36.9%	0.2%	5.3%	0.1%	2.2%	1.3%	0.0%	1.9%	14.8%	0.0%	33.9%	0.2%	3.0%
Upper Providence Township	11,612	32.3%	2.8%	10.2%	2.0%	2.8%	1.6%	0.0%	4.0%	12.4%	0.4%	21.1%	2.8%	7.7%
Upper Salford Township	5,751	28.0%	0.3%	2.7%	0.4%	0.6%	0.8%	0.0%	2.1%	30.4%	0.0%	31.4%	1.5%	1.8%
West Conshohocken Borough	563	16.1%	9.4%	26.4%	3.9%	5.9%	0.5%	0.0%	1.4%	0.0%	0.0%	24.3%	4.6%	7.4%
West Norriton Township	3,910	42.7%	2.3%	11.0%	2.0%	3.2%	5.7%	0.0%	9.1%	6.7%	0.0%	10.3%	4.3%	2.5%
West Pottsgrove Township	1,519	26.4%	4.9%	12.2%	16.1%	3.6%	1.4%	0.0%	0.9%	1.8%	0.0%	22.4%	2.4%	7.9%
Whitemarsh Township	9,420	33.8%	0.9%	7.5%	2.7%	2.0%	3.9%	0.0%	13.7%	9.4%	2.4%	19.3%	1.7%	2.7%
Whitpain Township	8,226	47.4%	0.4%	11.5%	2.1%	4.1%	2.5%	0.0%	8.8%	5.3%	0.0%	13.3%	0.6%	3.9%
Worcester Township	10,406	37.0%	0.6%	4.5%	3.0%	1.0%	1.6%	0.0%	3.8%	25.0%	0.0%	19.8%	0.4%	3.3%
Philadelphia County	**90,996**	**33.0%**	**5.8%**	**22.0%**	**2.3%**	**5.4%**	**6.2%**	**0.2%**	**5.8%**	**0.2%**	**0.0%**	**8.7%**	**5.7%**	**4.6%**
North	5,487	30.9%	10.1%	25.5%	2.4%	8.2%	10.9%	0.0%	5.1%	0.1%	0.0%	2.0%	0.4%	4.5%
Lower Southwest	6,392	11.6%	8.9%	27.6%	8.5%	5.6%	2.9%	0.7%	1.7%	0.3%	0.0%	7.7%	11.8%	12.8%
Central	4,116	26.5%	1.2%	27.0%	1.2%	13.1%	8.7%	0.1%	6.1%	0.1%	0.0%	1.0%	11.6%	3.3%
North Delaware	6,191	30.2%	4.7%	18.9%	3.6%	5.7%	7.7%	0.0%	6.4%	0.1%	0.0%	1.9%	14.4%	6.4%
Lower South	5,609	2.1%	26.9%	22.6%	2.6%	2.2%	0.6%	1.3%	6.1%	0.0%	0.0%	3.4%	22.4%	10.0%

Municipality	Total Acres	Residential	Industrial	Transport-ation	Utility	Com-mercial	Institut-ional	Military	Recreation	Agriculture	Mining	Wooded	Water	Undeve-loped
West Park	4,411	22.0%	1.2%	19.0%	2.3%	2.4%	6.2%	0.0%	23.2%	0.1%	0.0%	17.1%	4.4%	2.1%
Lower North	3,725	37.6%	3.7%	21.4%	2.0%	5.3%	9.1%	0.0%	8.1%	0.2%	0.0%	4.5%	2.4%	5.9%
Lower Northwest	6,399	31.1%	1.0%	11.9%	2.8%	3.0%	3.8%	0.0%	4.8%	1.3%	0.0%	34.7%	3.3%	2.4%
River Wards	4,818	20.8%	11.5%	23.9%	5.8%	6.6%	2.9%	0.0%	1.3%	0.0%	0.1%	2.7%	15.8%	8.7%
University - Southwest	2,961	31.8%	1.8%	26.1%	1.7%	4.8%	17.5%	0.0%	6.3%	0.1%	0.0%	2.9%	3.4%	3.5%
West	2,977	58.2%	0.7%	22.4%	0.2%	5.7%	6.0%	0.0%	2.9%	0.2%	0.0%	1.6%	0.1%	2.1%
South	3,988	39.8%	4.6%	29.2%	0.8%	8.3%	4.1%	0.0%	3.4%	0.1%	0.0%	0.2%	6.8%	2.7%
Upper Far Northeast	6,622	44.3%	6.3%	17.2%	1.8%	5.5%	5.1%	0.2%	6.2%	0.0%	0.0%	10.1%	0.2%	2.9%
Lower Northeast	3,774	40.8%	5.6%	24.6%	0.5%	6.9%	9.1%	1.8%	5.8%	0.0%	0.0%	2.9%	0.2%	1.8%
Upper North	5,116	49.9%	1.0%	24.8%	0.5%	4.7%	9.6%	0.1%	5.0%	0.0%	0.0%	2.5%	0.4%	1.5%
Lower Far Northeast	7,118	31.4%	7.8%	27.5%	0.1%	5.2%	3.5%	0.0%	6.7%	0.1%	0.0%	13.7%	0.2%	3.9%
Upper Northwest	6,076	55.9%	0.4%	15.1%	0.1%	3.4%	9.1%	0.0%	4.8%	0.3%	0.0%	9.1%	0.2%	1.6%
Central Northeast	5,216	42.0%	0.4%	18.4%	1.3%	4.0%	4.0%	0.0%	3.7%	0.6%	0.0%	22.0%	1.3%	2.1%

Source: DVRPC. All parking uses have been included in the transportation category (regardless of the use with which they are associated).

Appendix E: Residential Density, 2015

Appendix D: Residential Density, 2015

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
New Jersey			
Burlington County	**62,371**	**178,178**	**2.86**
Bass River Township	607	598	0.98
Beverly City	200	1,138	5.70
Bordentown City	191	1,968	10.30
Bordentown Township	1,127	4,793	4.25
Burlington City	556	4,679	8.41
Burlington Township	2,158	8,406	3.89
Chesterfield Township	1,472	1,927	1.31
Cinnaminson Township	2,122	6,097	2.87
Delanco Township	429	1,978	4.61
Delran Township	1,620	6,436	3.97
Eastampton Township	724	2,136	2.95
Edgewater Park Township	879	3,610	4.11
Evesham Township	4,985	18,859	3.78
Fieldsboro Borough	63	262	4.15
Florence Township	1,271	5,392	4.24
Hainesport Township	1,122	2,323	2.07
Lumberton Township	1,911	4,842	2.53
Mansfield Township	2,082	3,692	1.77
Maple Shade Township	1,225	8,917	7.28
Medford Township	5,852	8,912	1.52
Medford Lakes Borough	513	1,528	2.98
Moorestown Township	4,044	7,731	1.91
Mount Holly Township	710	4,027	5.67
Mount Laurel Township	4,596	18,386	4.00
New Hanover Township	186	709	3.82
North Hanover Township	1,573	2,829	1.80
Palmyra Borough	485	3,372	6.95
Pemberton Borough	142	643	4.54
Pemberton Township	3,786	10,816	2.86
Riverside Township	462	3,307	7.17
Riverton Borough	279	1,084	3.89
Shamong Township	2,313	2,215	0.96
Southampton Township	3,217	4,953	1.54
Springfield Township	1,566	1,174	0.75
Tabernacle Township	3,023	2,513	0.83
Washington Township	379	306	0.81
Westampton Township	1,115	3,324	2.98
Willingboro Township	2,708	11,431	4.22
Woodland Township	620	504	0.81
Wrightstown Borough	60	361	6.06

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
Camden County	**43,261**	**205,883**	**4.76**
Audubon Borough	611	3,671	6.00
Audubon Park Borough	50	492	9.92
Barrington Borough	569	2,902	5.10
Bellmawr Borough	742	4,615	6.22
Berlin Borough	963	2,824	2.93
Berlin Township	679	2,209	3.25
Brooklawn Borough	98	792	8.11
Camden City	1,558	30,618	19.65
Cherry Hill Township	7,263	27,871	3.84
Chesilhurst Borough	362	628	1.73
Clementon Borough	516	2,049	3.97
Collingswood Borough	683	6,807	9.97
Gibbsboro Borough	356	816	2.29
Gloucester Township	5,990	25,284	4.22
Gloucester City	520	4,518	8.69
Haddon Township	988	6,327	6.40
Haddonfield Borough	1,138	4,360	3.83
Haddon Heights Borough	631	3,118	4.94
Hi-Nella Borough	45	394	8.83
Laurel Springs Borough	199	761	3.82
Lawnside Borough	314	1,280	4.08
Lindenwold Borough	1,070	8,065	7.54
Magnolia Borough	337	1,740	5.16
Merchantville Borough	278	1,615	5.82
Mount Ephraim Borough	339	1,995	5.88
Oaklyn Borough	267	1,879	7.03
Pennsauken Township	2,127	13,354	6.28
Pine Hill Borough	884	4,663	5.27
Pine Valley Borough	29	24	0.82
Runnemede Borough	648	3,344	5.16
Somerdale Borough	471	2,374	5.04
Stratford Borough	529	2,855	5.40
Tavistock Borough	3	3	0.89
Voorhees Township	3,190	12,019	3.77
Waterford Township	2,508	3,781	1.51
Winslow Township	6,227	14,927	2.40
Woodlynne Borough	78	909	11.67
Gloucester County	**45,005**	**112,516**	**2.50**
Clayton Borough	1,092	3,274	3.00
Deptford Township	3,344	12,292	3.68
East Greenwich Township	2,295	3,455	1.51
Elk Township	1,465	1,547	1.06

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
Franklin Township	6,120	6,175	1.01
Glassboro Borough	1,579	7,104	4.50
Greenwich Township	656	2,097	3.20
Harrison Township	3,474	4,429	1.27
Logan Township	696	2,117	3.04
Mantua Township	2,592	5,830	2.25
Monroe Township	6,076	14,493	2.39
National Park Borough	265	1,149	4.34
Newfield Borough	344	633	1.84
Paulsboro Borough	425	2,762	6.50
Pitman Borough	797	3,648	4.58
South Harrison Township	1,468	1,121	0.76
Swedesboro Borough	196	1,048	5.35
Washington Township	5,835	17,852	3.06
Wenonah Borough	345	835	2.42
West Deptford Township	2,129	9,100	4.27
Westville Borough	268	1,809	6.76
Woodbury City	627	4,477	7.14
Woodbury Heights Borough	376	1,113	2.96
Woolwich Township	2,541	4,156	1.64
Mercer County	**38,481**	**144,385**	**3.75**
East Windsor Township	2,341	10,509	4.49
Ewing Township	3,517	14,070	4.00
Hamilton Township	8,033	34,842	4.34
Hightstown Borough	416	2,200	5.29
Hopewell Borough	257	788	3.07
Hopewell Township	6,468	6,947	1.07
Lawrence Township	3,899	12,954	3.32
Pennington Borough	360	1,033	2.87
Princeton	4,453	10,901	2.45
Robbinsville Township	2,342	5,179	2.21
Trenton City	1,817	34,629	19.06
West Windsor Township	4,577	10,333	2.26
Pennsylvania			
Bucks County	**111,593**	**248,873**	**2.23**
Bedminster Township	2,565	2,864	1.12
Bensalem Township	4,550	25,369	5.58
Bridgeton Township	701	606	0.86
Bristol Borough	309	4,061	13.13
Bristol Township	3,928	20,925	5.33
Buckingham Township	6,736	7,515	1.12
Chalfont Borough	573	1,662	2.90
Doylestown Borough	689	4,101	5.95

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
Doylestown Township	4,603	6,152	1.34
Dublin Borough	201	943	4.68
Durham Township	904	508	0.56
East Rockhill Township	1,814	2,016	1.11
Falls Township	2,487	13,561	5.45
Haycock Township	1,442	909	0.63
Hilltown Township	5,300	5,815	1.10
Hulmeville Borough	117	351	2.99
Ivyland Borough	110	304	2.77
Langhorne Borough	158	602	3.81
Langhorne Manor Borough	203	323	1.59
Lower Makefield Township	5,674	12,486	2.20
Lower Southampton Township	2,366	7,380	3.12
Middletown Township	4,656	17,331	3.72
Milford Township	3,450	3,784	1.10
Morrisville Borough	557	3,893	6.99
New Britain Borough	403	1,036	2.57
New Britain Township	2,735	4,329	1.58
New Hope Borough	292	1,428	4.89
Newtown Borough	219	996	4.55
Newtown Township	2,602	7,741	2.98
Nockamixon Township	1,919	1,604	0.84
Northampton Township	8,345	14,437	1.73
Penndel Borough	140	1,143	8.18
Perkasie Borough	891	3,474	3.90
Plumstead Township	4,061	5,292	1.30
Quakertown Borough	589	3,795	6.44
Richland Township	2,411	5,263	2.18
Richlandtown Borough	109	509	4.68
Riegelsville Borough	163	386	2.37
Sellersville Borough	391	1,757	4.49
Silverdale Borough	141	286	2.02
Solebury Township	5,099	4,004	0.79
Springfield Township	3,256	2,133	0.66
Telford Borough	152	1,041	6.85
Tinicum Township	2,893	2,085	0.72
Trumbauersville Borough	135	416	3.09
Tullytown Borough	143	766	5.35
Upper Makefield Township	4,821	3,065	0.64
Upper Southampton Township	2,430	6,113	2.52
Warminster Township	3,280	13,528	4.12
Warrington Township	3,504	8,699	2.48
Warwick Township	2,333	5,414	2.32
West Rockhill Township	1,882	2,382	1.27
Wrightstown Township	1,882	1,114	0.59

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
Yardley Borough	278	1,176	4.23
Chester County	**124,702**	**197,919**	**1.59**
Atglen Borough	181	518	2.86
Avondale Borough	91	434	4.79
Birmingham Township	1,766	1,503	0.85
Caln Township	1,900	5,731	3.02
Charlestown Township	2,200	1,911	0.87
Coatesville City	445	5,152	11.59
Downingtown Borough	429	3,469	8.10
East Bradford Township	3,223	3,767	1.17
East Brandywine Township	2,919	2,944	1.01
East Caln Township	587	2,368	4.03
East Coventry Township	2,440	2,488	1.02
East Fallowfield Township	2,298	2,846	1.24
East Goshen Township	3,557	8,610	2.42
East Marlborough Township	2,562	2,901	1.13
East Nantmeal Township	1,123	668	0.59
East Nottingham Township	2,856	2,888	1.01
East Pikeland Township	1,930	3,230	1.67
Easttown Township	3,262	4,209	1.29
East Vincent Township	2,371	2,398	1.01
East Whiteland Township	1,705	3,889	2.28
Elk Township	808	656	0.81
Elverson Borough	198	752	3.80
Franklin Township	2,180	1,623	0.74
Highland Township	522	501	0.96
Honey Brook Borough	168	757	4.50
Honey Brook Township	2,097	2,939	1.40
Kennett Township	3,418	3,332	0.97
Kennett Square Borough	346	2,157	6.23
London Britain Township	1,693	1,169	0.69
Londonderry Township	902	884	0.98
London Grove Township	2,321	2,631	1.13
Lower Oxford Township	1,323	1,098	0.83
Malvern Borough	280	1,640	5.85
Modena Borough	74	244	3.31
New Garden Township	2,883	4,094	1.42
Newlin Township	690	507	0.73
New London Township	2,317	1,978	0.85
North Coventry Township	2,592	3,386	1.31
Oxford Borough	424	2,148	5.07
Parkesburg Borough	403	1,481	3.67
Penn Township	1,448	2,281	1.58

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
Pennsbury Township	1,963	1,448	0.74
Phoenixville Borough	926	7,700	8.32
Pocopson Township	1,410	1,202	0.85
Sadsbury Township	841	1,551	1.84
Schuylkill Township	2,391	3,239	1.35
South Coatesville Borough	133	642	4.82
South Coventry Township	962	988	1.03
Spring City Borough	234	1,518	6.48
Thornbury Township	1,162	1,230	1.06
Tredyffrin Township	6,085	12,280	2.02
Upper Oxford Township	1,129	860	0.76
Upper Uwchlan Township	2,583	3,757	1.45
Uwchlan Township	3,016	7,026	2.33
Valley Township	1,061	2,963	2.79
Wallace Township	1,944	1,183	0.61
Warwick Township	1,390	1,171	0.84
West Bradford Township	3,540	4,434	1.25
West Brandywine Township	2,692	2,972	1.10
West Caln Township	3,537	3,479	0.98
West Chester Borough	595	7,303	12.28
West Fallowfield Township	821	949	1.16
West Goshen Township	3,643	8,921	2.45
West Grove Borough	260	914	3.51
West Marlborough Township	328	409	1.25
West Nantmeal Township	1,176	838	0.71
West Nottingham Township	970	980	1.01
West Pikeland Township	1,953	1,554	0.80
West Sadsbury Township	870	830	0.95
Westtown Township	2,852	3,962	1.39
West Vincent Township	2,381	1,749	0.73
West Whiteland Township	2,891	7,138	2.47
Willistown Township	4,032	4,547	1.13
Delaware County	**51,378**	**223,769**	**4.36**
Aldan Borough	275	1,907	6.94
Aston Township	1,670	6,508	3.90
Bethel Township	1,792	3,212	1.79
Brookhaven Borough	616	3,761	6.10
Chadds Ford Township	1,577	1,489	0.94
Chester City	847	14,636	17.27
Chester Township	161	1,710	10.60
Chester Heights Borough	463	1,080	2.34
Clifton Heights Borough	188	2,870	15.26
Collingdale Borough	264	3,785	14.34
Colwyn Borough	55	1,004	18.17

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
Concord Township	3,598	6,450	1.79
Darby Borough	197	3,874	19.62
Darby Township	271	4,016	14.83
East Lansdowne Borough	99	1,029	10.39
Eddystone Borough	60	946	15.65
Edgmont Township	1,604	1,838	1.15
Folcroft Borough	208	2,639	12.67
Glenolden Borough	335	3,148	9.40
Haverford Township	3,907	18,338	4.69
Lansdowne Borough	502	4,920	9.80
Lower Chichester Township	105	1,288	12.23
Marcus Hook Borough	53	953	18.10
Marple Township	3,215	8,765	2.73
Media Borough	236	2,831	11.98
Middletown Township	3,184	6,632	2.08
Millbourne Borough	11	420	37.49
Morton Borough	139	1,180	8.46
Nether Providence Township	1,869	5,203	2.78
Newtown Township	2,979	5,280	1.77
Norwood Borough	302	2,225	7.36
Parkside Borough	92	860	9.40
Prospect Park Borough	287	2,877	10.03
Radnor Township	4,894	10,368	2.12
Ridley Township	1,714	12,807	7.47
Ridley Park Borough	394	2,983	7.57
Rose Valley Borough	335	386	1.15
Rutledge Borough	78	288	3.69
Sharon Hill Borough	204	2,339	11.45
Springfield Township	2,198	8,621	3.92
Swarthmore Borough	516	1,933	3.74
Thornbury Township	2,369	2,346	0.99
Tinicum Township	220	1,648	7.49
Trainer Borough	95	622	6.54
Upland Borough	146	1,373	9.38
Upper Chichester Township	1,784	7,249	4.06
Upper Darby Township	2,657	34,182	12.86
Upper Providence Township	2,242	4,209	1.88
Yeadon Borough	368	4,741	12.90
Montgomery County	**116,598**	**331,100**	**2.84**
Abington Township	5,749	22,650	3.94
Ambler Borough	297	2,719	9.17
Bridgeport Borough	132	2,249	16.98
Bryn Athyn Borough	265	433	1.63
Cheltenham Township	3,175	15,530	4.89

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
Collegeville Borough	501	1,373	2.74
Conshohocken Borough	295	4,359	14.78
Douglass Township	2,495	4,038	1.62
East Greenville Borough	164	1,239	7.55
East Norriton Township	1,931	6,354	3.29
Franconia Township	3,000	4,969	1.66
Green Lane Borough	76	210	2.77
Hatboro Borough	535	3,047	5.70
Hatfield Borough	234	1,267	5.41
Hatfield Township	2,415	7,087	2.93
Horsham Township	3,771	10,054	2.67
Jenkintown Borough	237	1,796	7.57
Lansdale Borough	913	6,983	7.65
Limerick Township	3,481	7,369	2.12
Lower Frederick Township	1,340	1,914	1.43
Lower Gwynedd Township	3,044	4,764	1.57
Lower Merion Township	9,320	23,952	2.57
Lower Moreland Township	2,414	4,620	1.91
Lower Pottsgrove Township	1,934	4,976	2.57
Lower Providence Township	4,010	9,088	2.27
Lower Salford Township	3,984	6,010	1.51
Marlborough Township	1,564	1,332	0.85
Montgomery Township	3,211	9,644	3.00
Narberth Borough	222	1,978	8.91
New Hanover Township	3,332	4,561	1.37
Norristown Borough	914	14,619	16.00
North Wales Borough	247	1,381	5.58
Pennsburg Borough	230	1,456	6.33
Perkiomen Township	1,264	3,248	2.57
Plymouth Township	1,938	7,140	3.68
Pottstown Borough	1,118	10,441	9.34
Red Hill Borough	203	1,089	5.37
Rockledge Borough	133	1,133	8.50
Royersford Borough	267	2,307	8.63
Salford Township	1,497	1,108	0.74
Schwenksville Borough	134	680	5.08
Skippack Township	2,337	4,616	1.98
Souderton Borough	424	2,776	6.55
Springfield Township	2,409	7,622	3.16
Telford Borough	189	967	5.10
Towamencin Township	2,838	7,880	2.78
Trappe Borough	555	1,365	2.46
Upper Dublin Township	4,451	9,786	2.20
Upper Frederick Township	1,282	1,548	1.21
Upper Gwynedd Township	2,327	6,543	2.81

Municipality	Residential Acres	Housing Unit Estimate	Housing Units per Residential Acre
Upper Hanover Township	2,637	2,841	1.08
Upper Merion Township	3,048	13,037	4.28
Upper Moreland Township	2,470	10,474	4.24
Upper Pottsgrove Township	1,181	1,981	1.68
Upper Providence Township	3,751	8,231	2.19
Upper Salford Township	1,609	1,161	0.72
West Conshohocken Borough	91	651	7.17
West Norriton Township	1,671	7,872	4.71
West Pottsgrove Township	401	1,623	4.05
Whitemarsh Township	3,186	7,238	2.27
Whitpain Township	3,902	7,768	1.99
Worcester Township	3,852	3,953	1.03
Philadelphia County	**29,985**	**679,876**	**22.67**
North	1,695	56,611	33.40
Lower Southwest	744	17,825	23.96
Central	1,092	73,179	67.01
North Delaware	1,867	37,912	20.31
Lower South	116	2,480	21.38
West Park	969	21,475	22.16
Lower North	1,399	43,037	30.76
Lower Northwest	1,993	24,487	12.29
River Wards	1,001	28,768	28.74
University - Southwest	943	30,516	32.36
West	1,732	51,935	29.99
South	1,588	60,217	37.92
Upper Far Northeast	2,935	27,421	9.34
Lower Northeast	1,540	38,846	25.22
Upper North	2,551	61,344	24.05
Lower Far Northeast	2,232	28,318	12.69
Upper Northwest	3,399	41,435	12.19
Central Northeast	2,189	31,902	14.57

Source: DVRPC, American Community Survey 2013-2017. Residential parking uses have been excluded. Philadelphia Planning Districts ACS estimates derived from census tracts and do not always conform with district geography.

Land Use in the Delaware Valley, 2015

Enhanced Land Use Data

Publication Number: ADR026

Date Published: April 2020

Geographic Area Covered:

DVRPC's nine-county region, including Burlington, Camden, Gloucester, and Mercer counties in New Jersey and Bucks, Chester, Delaware, Montgomery, and Philadelphia counties in Pennsylvania.

Key Words:

land use, land use categories, aerial photography, residential density, mixed-use, roadway, commercial, industrial, institutional, developed land, agricultural land, undeveloped land, wooded land.

Abstract:

This analytical data report summarizes regional, county, and municipal-level 2015 enhanced land use data. In the City of Philadelphia, information is provided for each of the City's 18 planning districts. The enhanced land use data is a new Geographic Information Systems (GIS) product, improving upon the preliminary 2015 land use file described in ADR024. It includes more subcategories of uses than previous land use product releases and a comprehensive delineation of roadways throughout the Greater Philadelphia region. Key differences between prior products and insights gained from new land use subcategories are described.

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