REVIVING VINE

Improving Multimodal
Connections On Vine Street

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DELAWARE VALLEY
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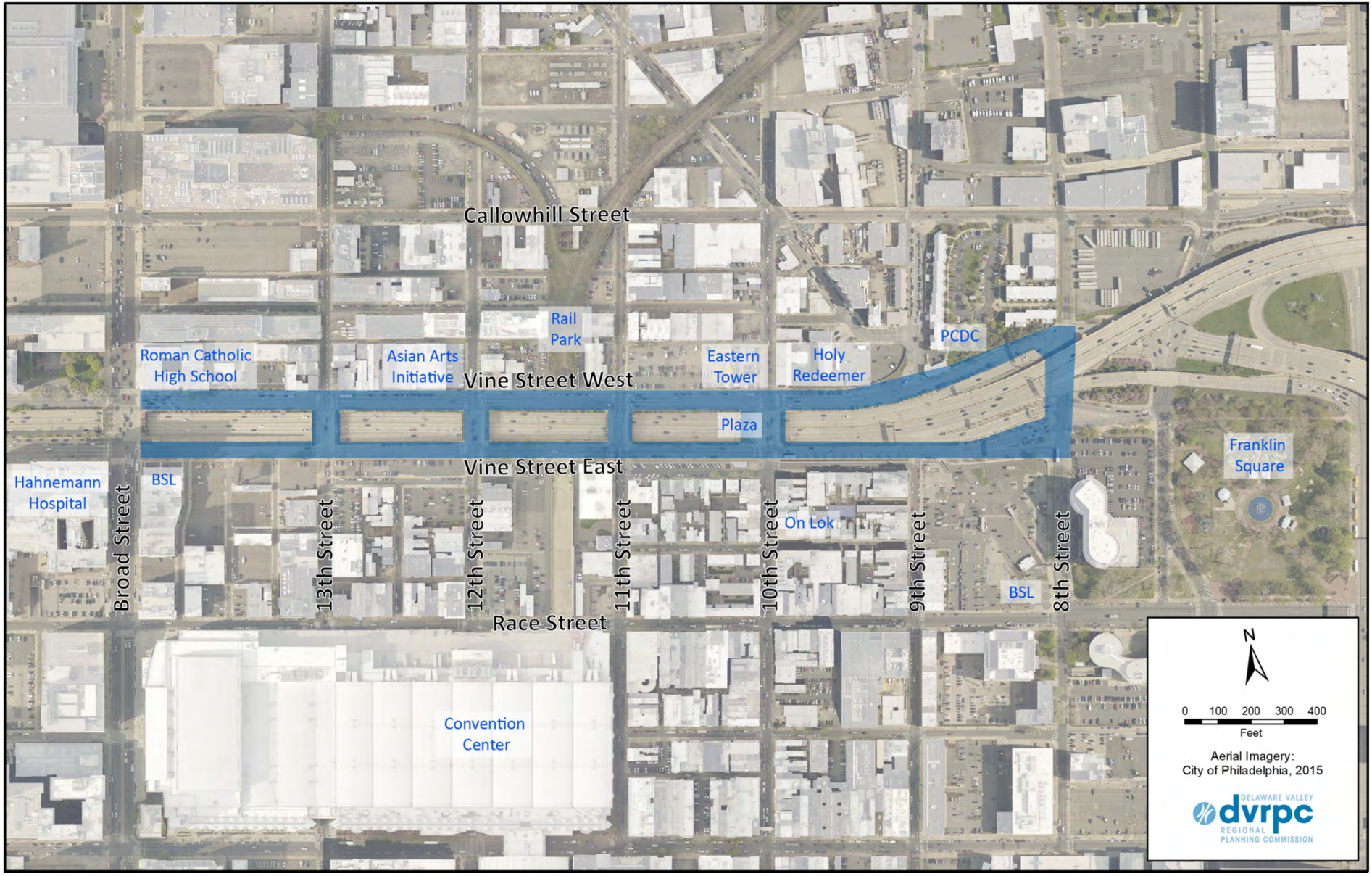
REGIONAL
PLANNING COMMISSION

Project Kickoff Meeting
February 15, 2018



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Project Goals

- Develop **traffic calming** alternatives to the Vine Street local right-of-way, to **mitigate speeding**.
- Develop **concept plans** and evaluate the feasibility of **lane reconfiguration** and other treatments.
- Develop recommendations to facilitate **safe transportation** for all modes and users while supporting a vibrant community.

USDOT Every Place Counts (2016)

Word Cloud of current conditions

Word Cloud of the vision for the future

U.S. DOT | Every Place Counts Design Challenge Summary Report

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Chinatown Neighborhood Plan (2017)

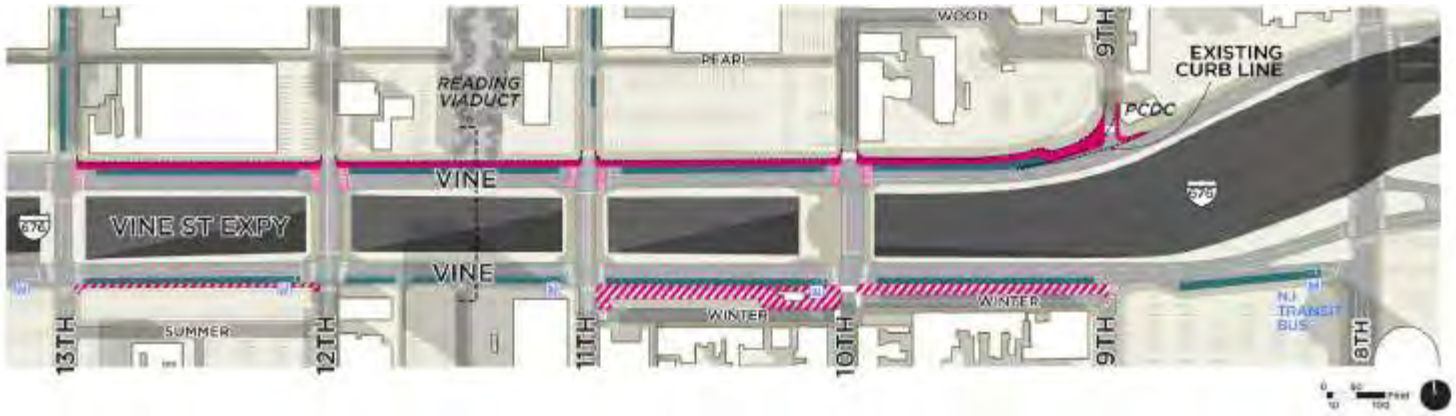
CONNECTIVITY

"2.1 Bridge the community across Vine Street and the expressway

2.2 Make it safer and easier to walk and bike

2.3 Improve connections to transit

2.4 Create an inviting and beautiful public realm"



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Chinatown Neighborhood Plan (2017)

OPEN SPACE

"3.1 Create more public space and programming for community use

3.2 Improve access to existing and new spaces"

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Chinatown Connections (2017)

"1-Make crossing the street along Race and Vine Streets safer for the 1000's of seniors and children who cross every single day.

2-Create two to three safe routes to parks and public spaces.

3-Provide support to local organizations to regularly activate public spaces in and around Chinatown."

Mapping Activities

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Vision Statement

- Reviving Vine will increase neighborhood connections by enhancing multimodal, inclusive mobility options in the Vine Street corridor. By improving safety and rebalancing roadway uses, the project will empower residents and visitors to reclaim Vine Street as public space for all users.

Scope of Work: Key Tasks

1. Collect and Analyze Data
2. Model Existing Conditions and No Build Scenario
3. Develop Improvement Alternatives
4. Analyze Improvement Alternatives
5. Public Engagement
6. Report

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Task 1: Collect and Analyze Data

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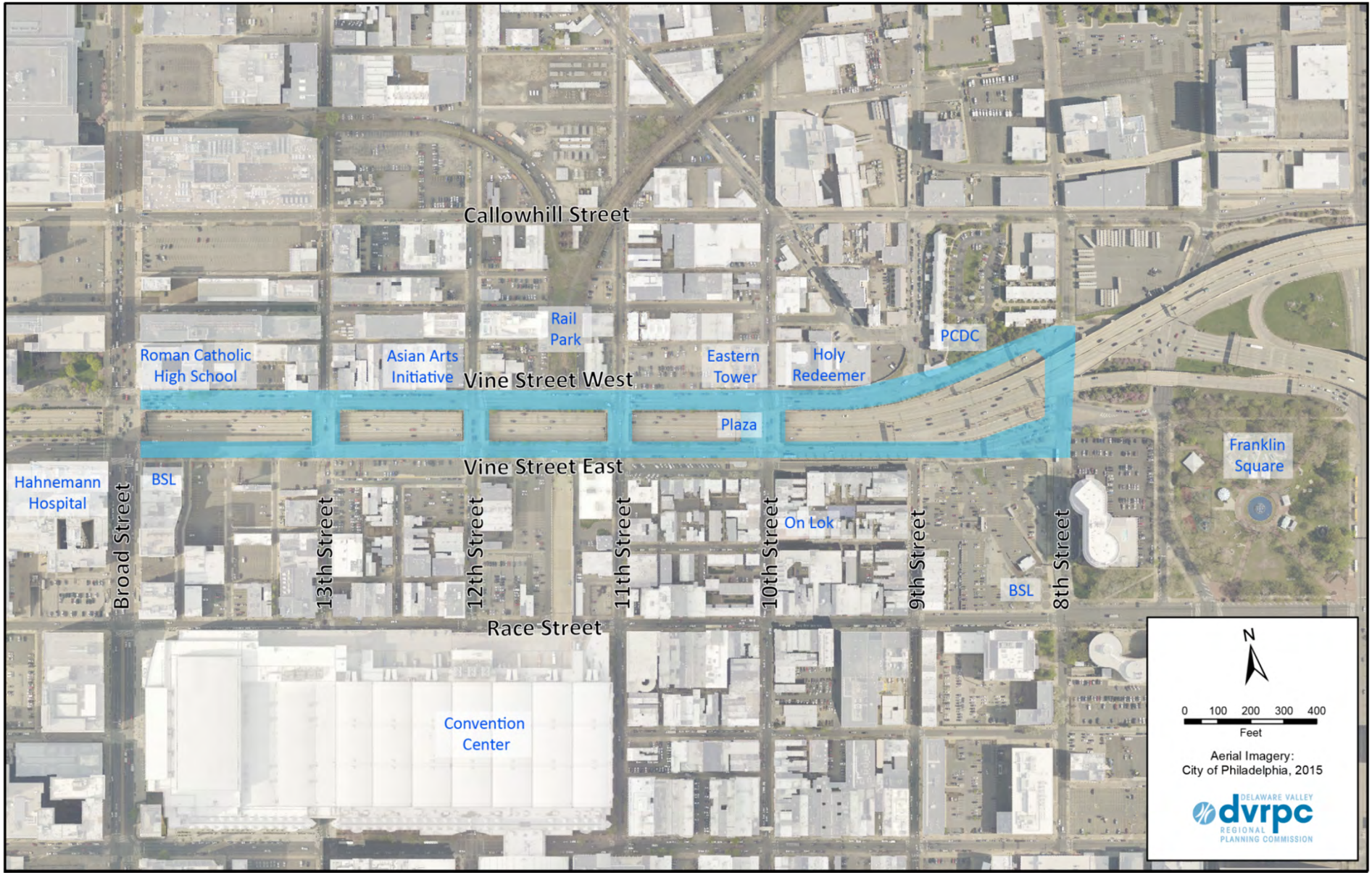

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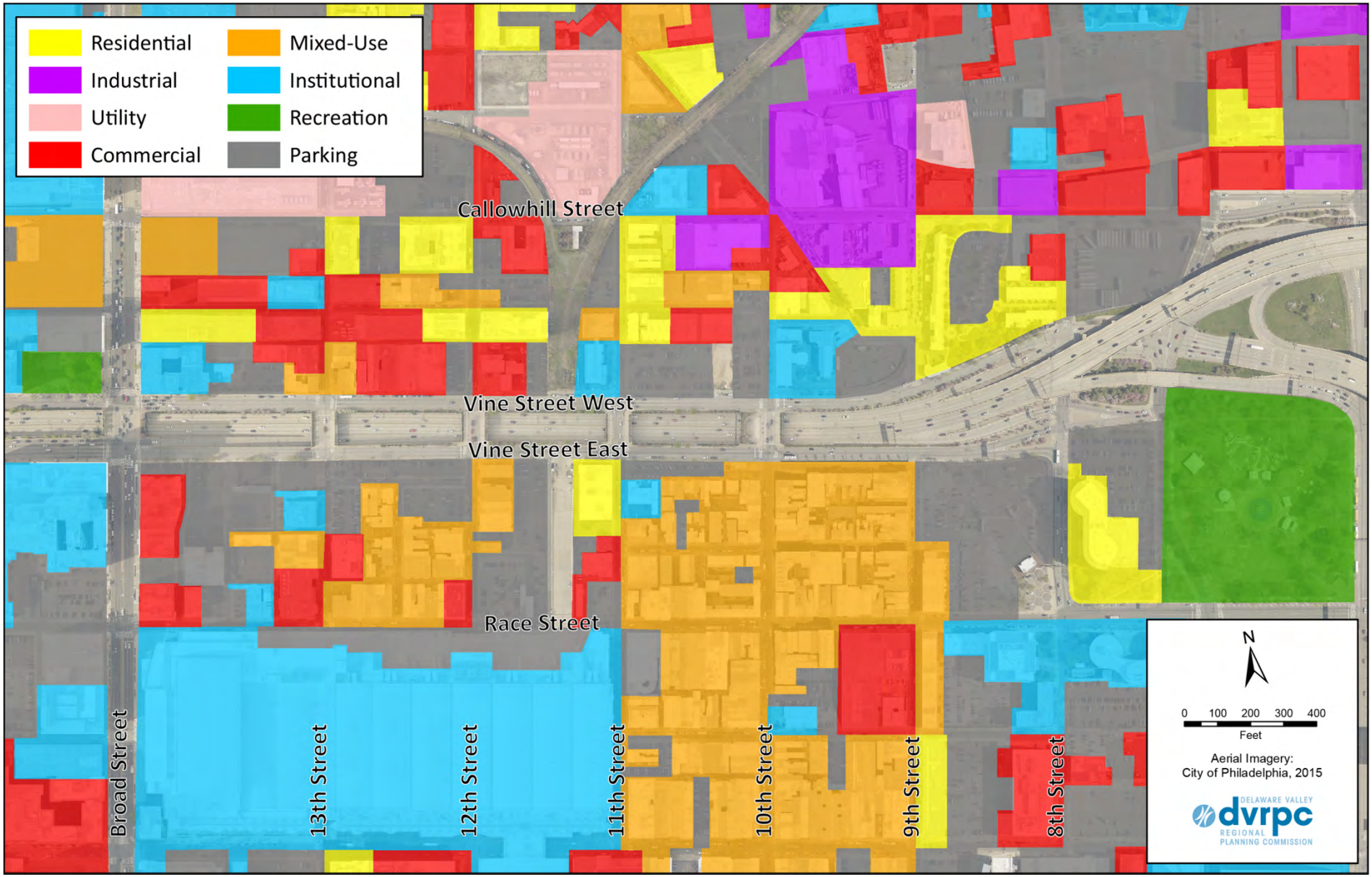

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Existing Land Use

DVRPC 2015

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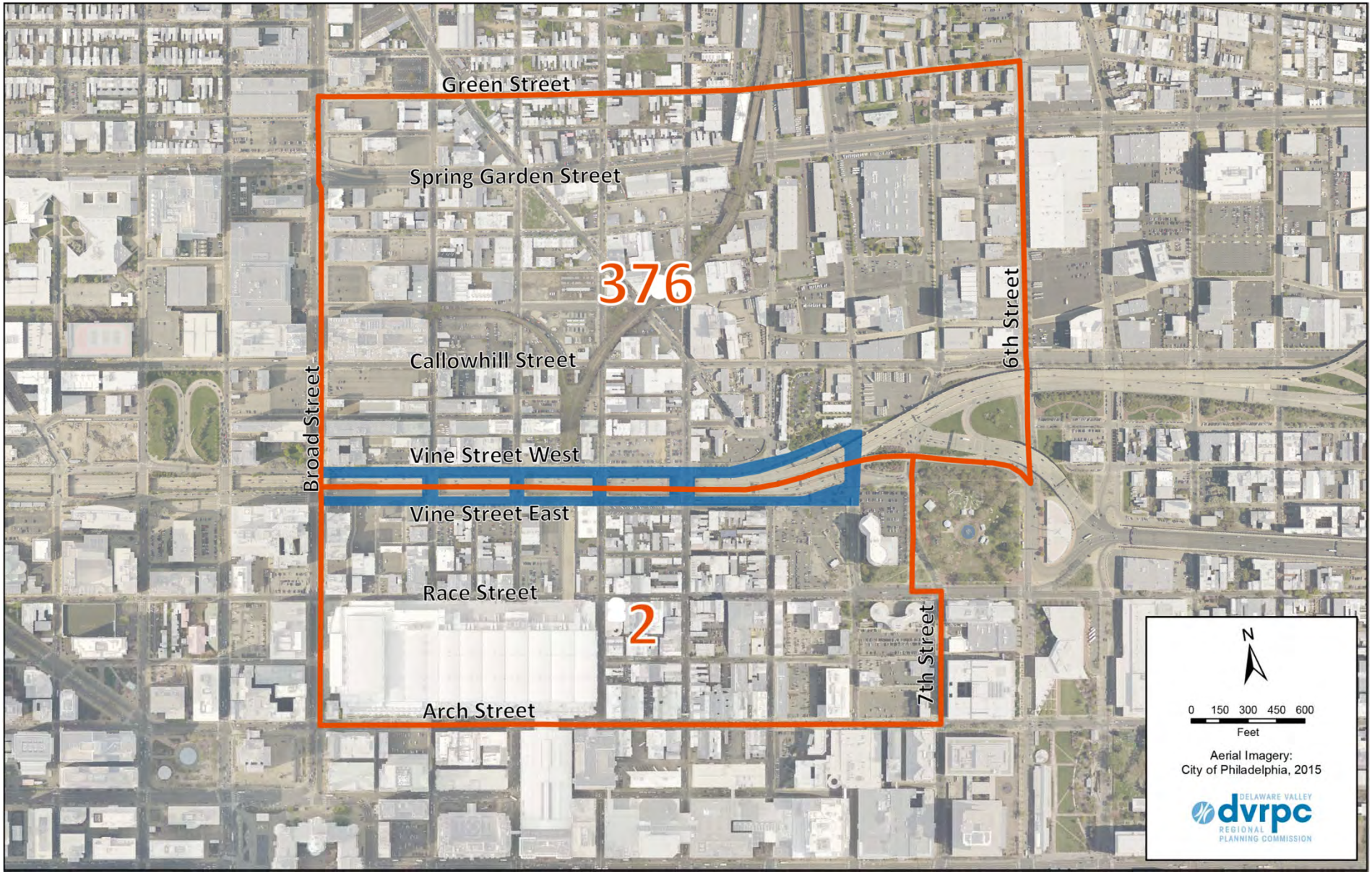
New Developments in Study Area

City Planning Commission 2017, City of Philadelphia 2016, DVRPC 2018



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Census Tracts

2010 Census

Category	Census Tract 2 (from Vine to Arch St)	Census Tract 376 (from Vine to Spring Garden to Green St)	Regional Threshold
Population Estimate	2,304	2,736	N/A
DVRPC Indicators of Potential Disadvantage (IPD)	**5**	**5**	N/A
Non-Hispanic Minority (%)	**59.5%**	**48.9%**	28.36%
Hispanics	0.0%*	0.0%*	9.09%
Carless Households ("Transit Dependent")	**45.6%**	**41.2%**	14.25%
Limited English Proficiency	**22.5%**	**16.3%**	3.44%
Households in Poverty	**22.4%**	**27%**	12.78%
Elderly (75 years and older)	**8.0%**	2.6%	6.55%
Persons with Disabilities	6.3%	**13%**	12.14%
Female Head of Household with Child	0.0%*	7.4%	8.69%

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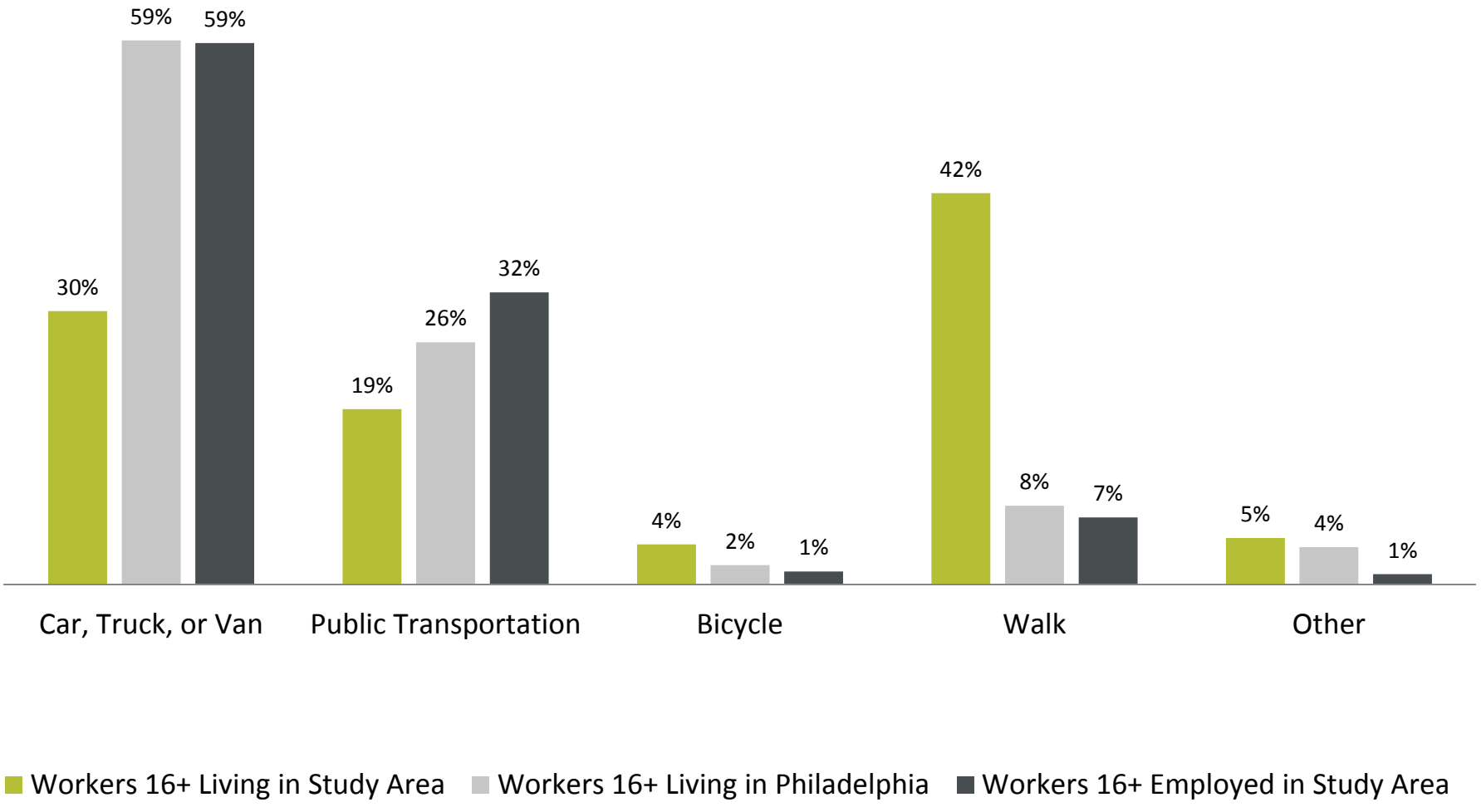
Indicators of Potential Disadvantage

ACS 2015 5-Year Estimates, DVRPC Indicators of Potential Disadvantage Webmap



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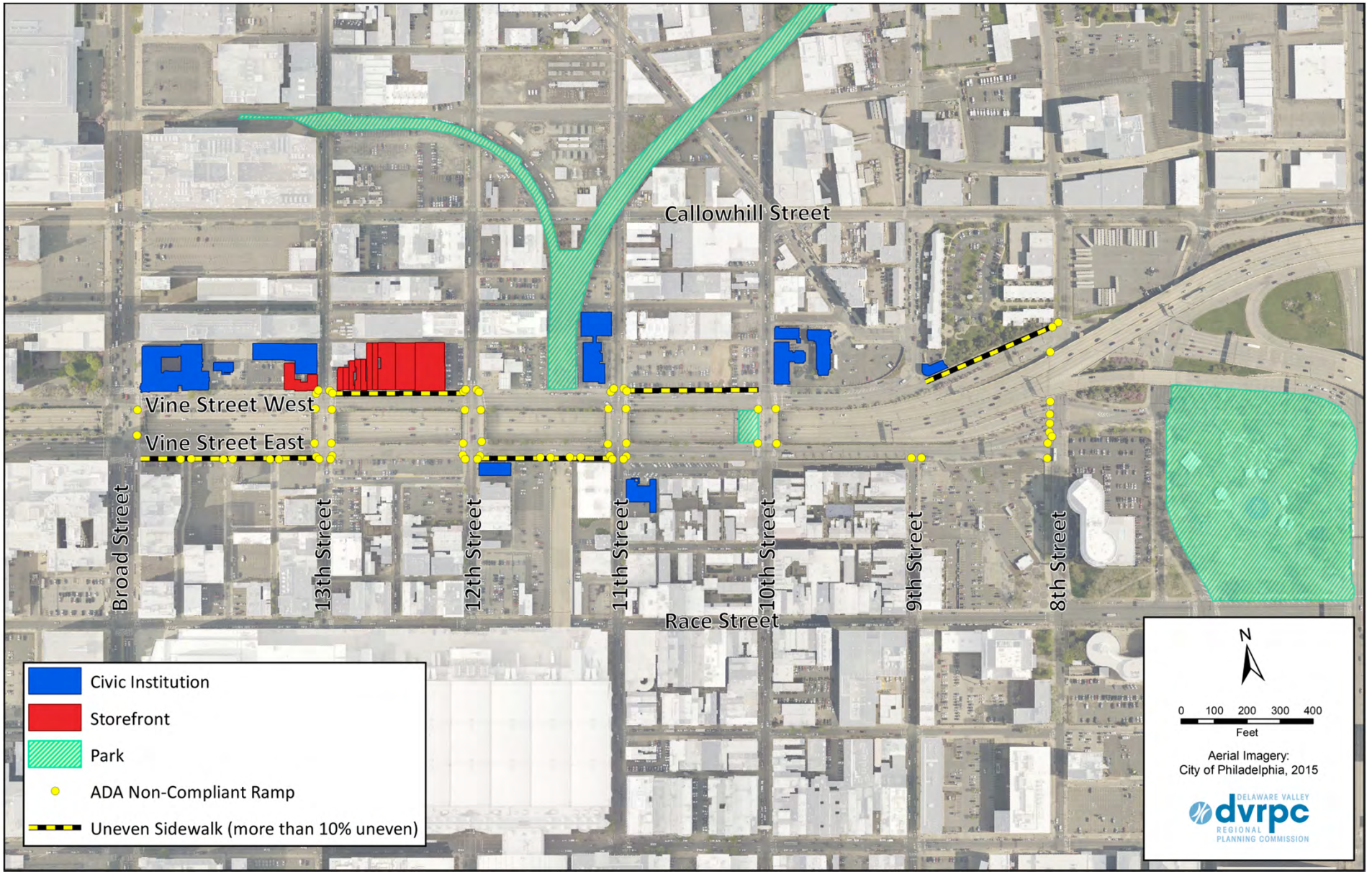
Commuting Patterns

Census Transportation Planning Products (CTPP) 2010 5-Year Data



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Sidewalk Infrastructure

DVRPC December 2017

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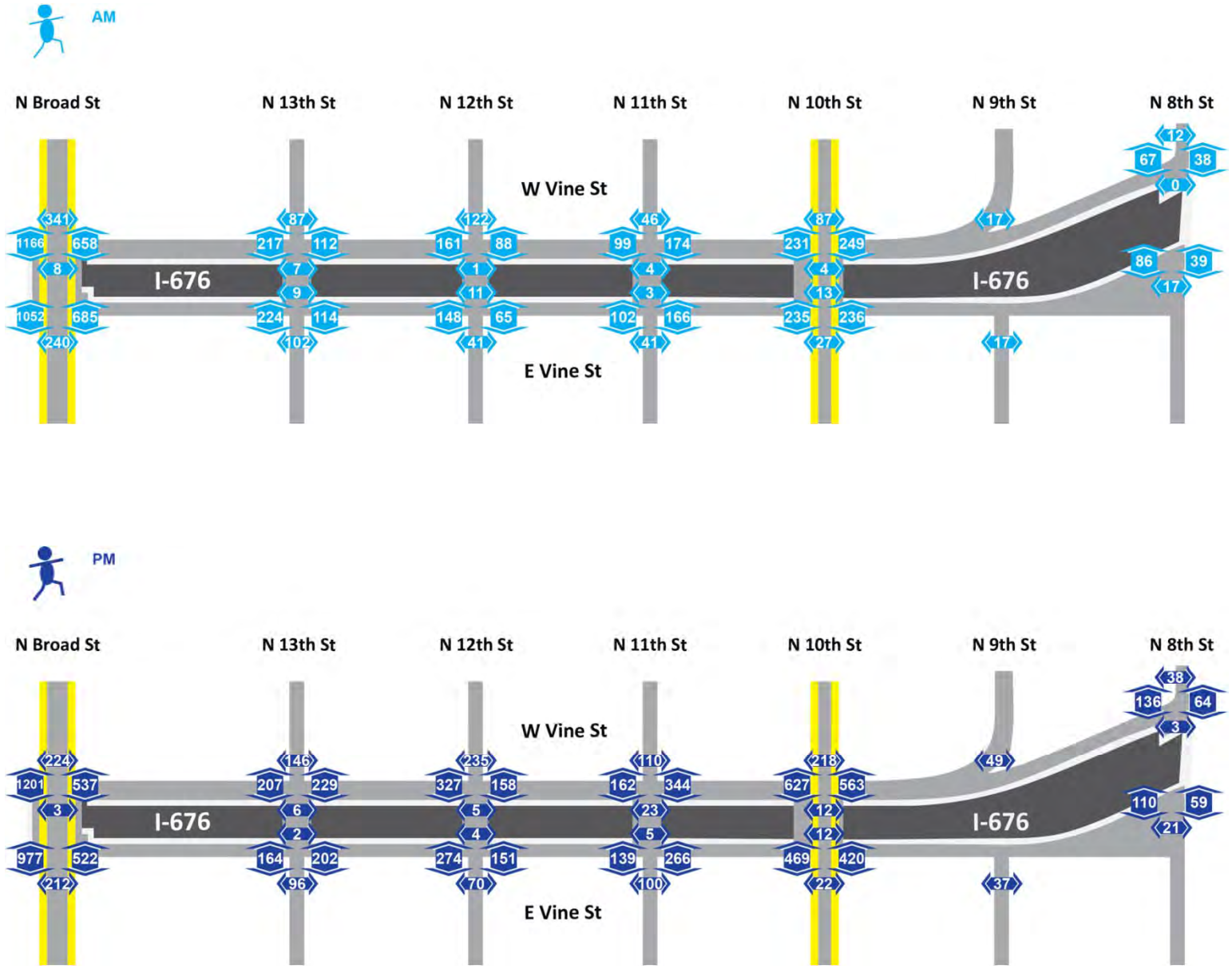
Weekday Pedestrian Volume by Intersection

DVRPC Traffic Counts, February 2017



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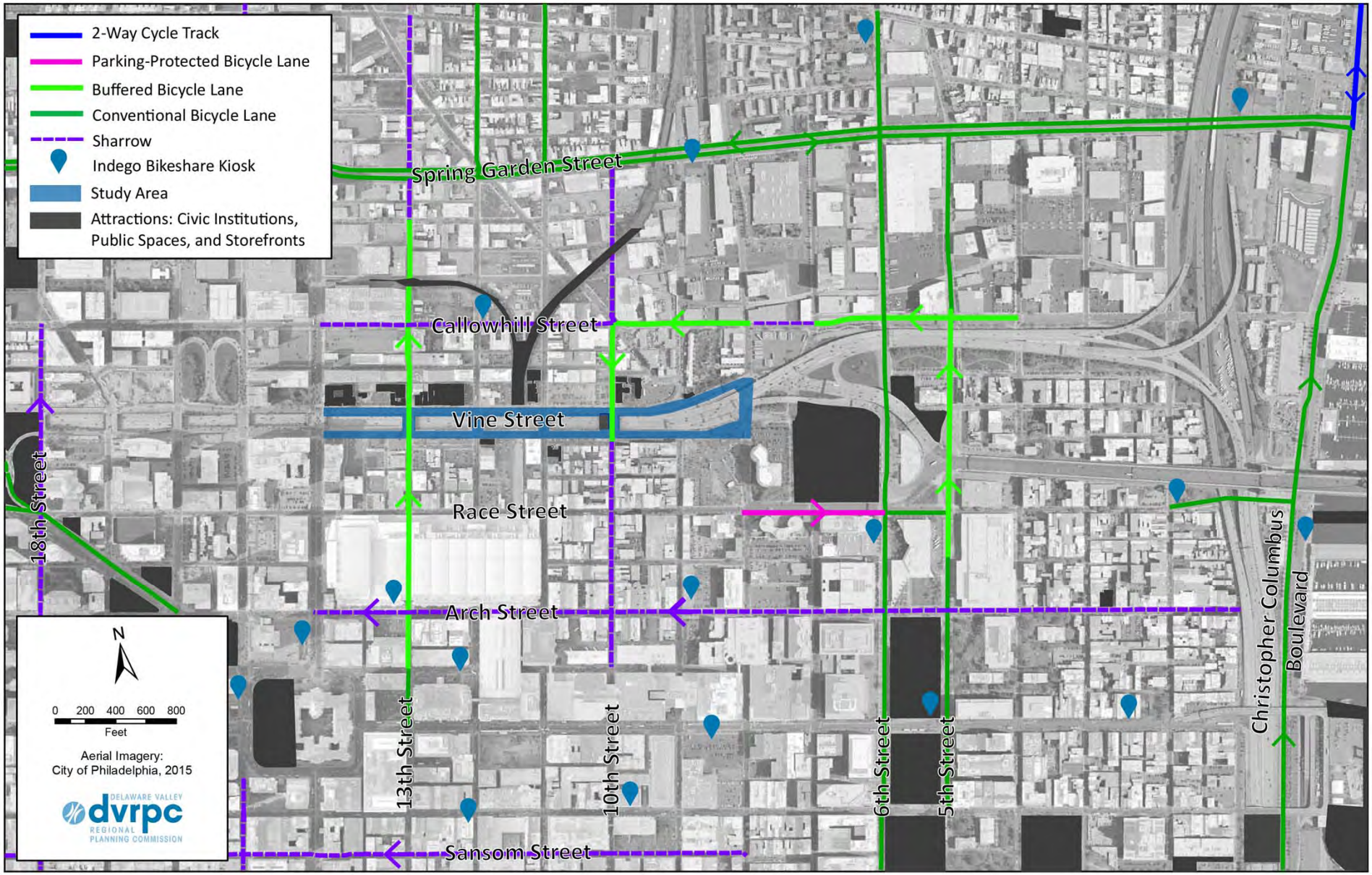
Weekday Pedestrian Volume by Crosswalk

DVRPC Traffic Counts, February 2017



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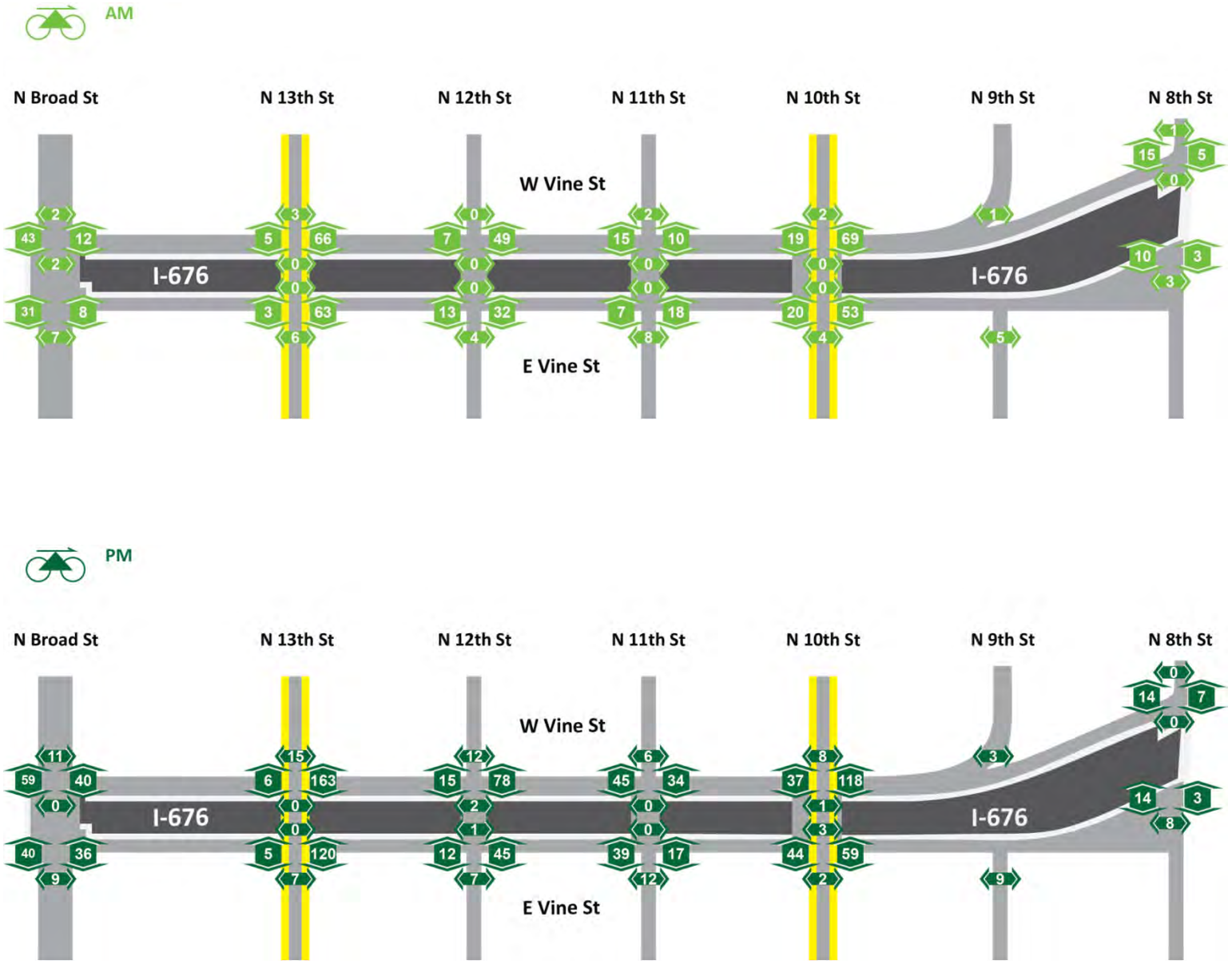
Bicycle Lanes

Philadelphia Streets Department 2014, DVRPC 2018



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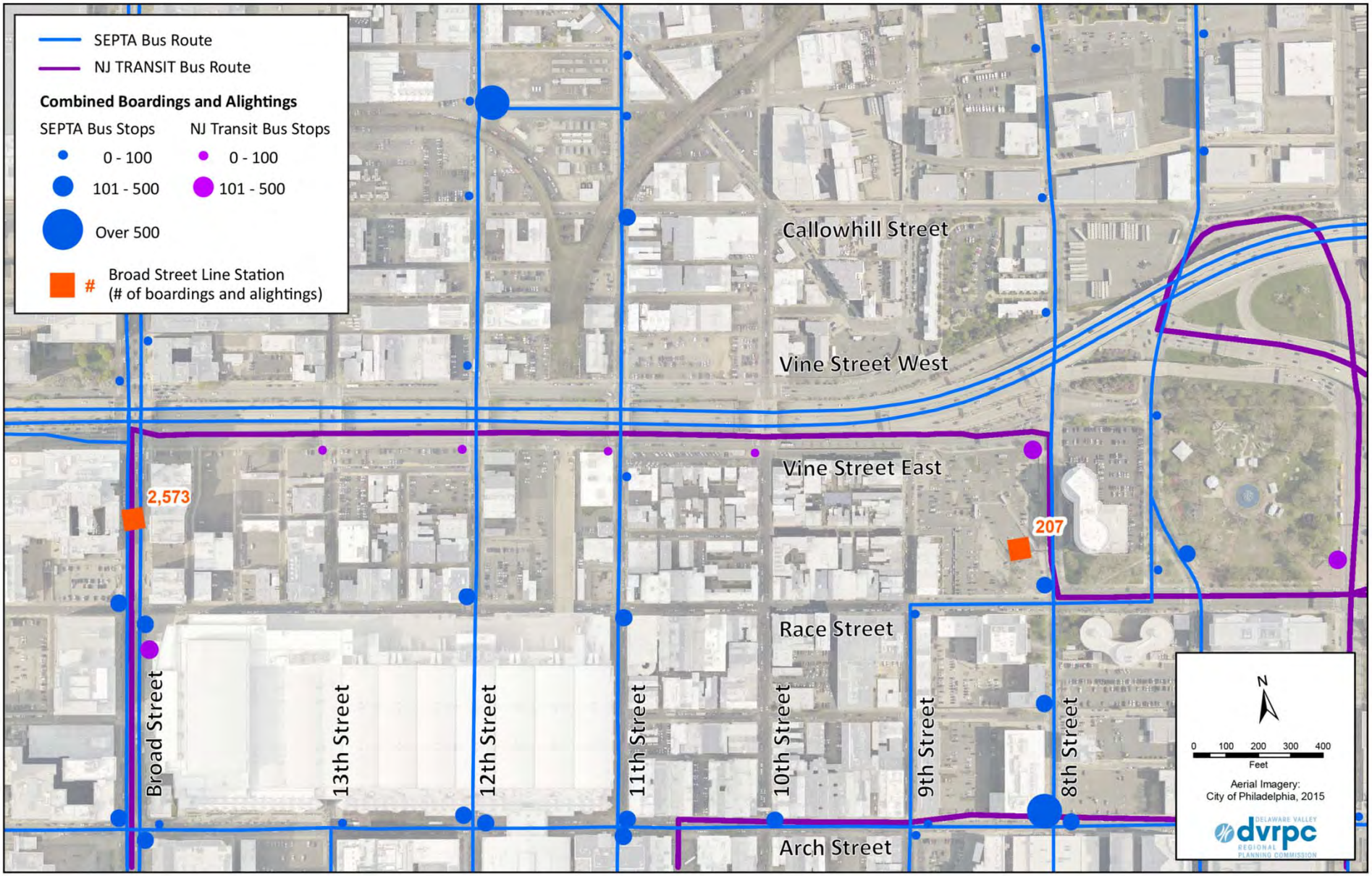
Weekday Bicycle Volume by Crosswalk

DVRPC Traffic Counts, February 2017



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Average Weekday Transit Boardings and Alightings

SEPTA 2016, NJ Transit 2018

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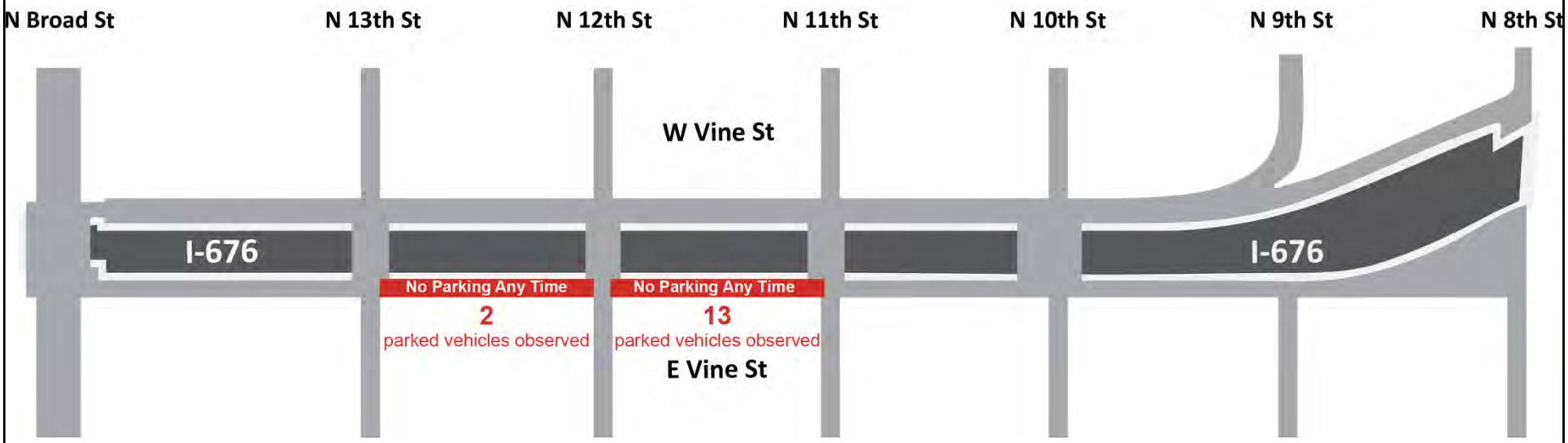
Parking Capacity

Philadelphia City Planning Commission 2015, DVRPC 2017



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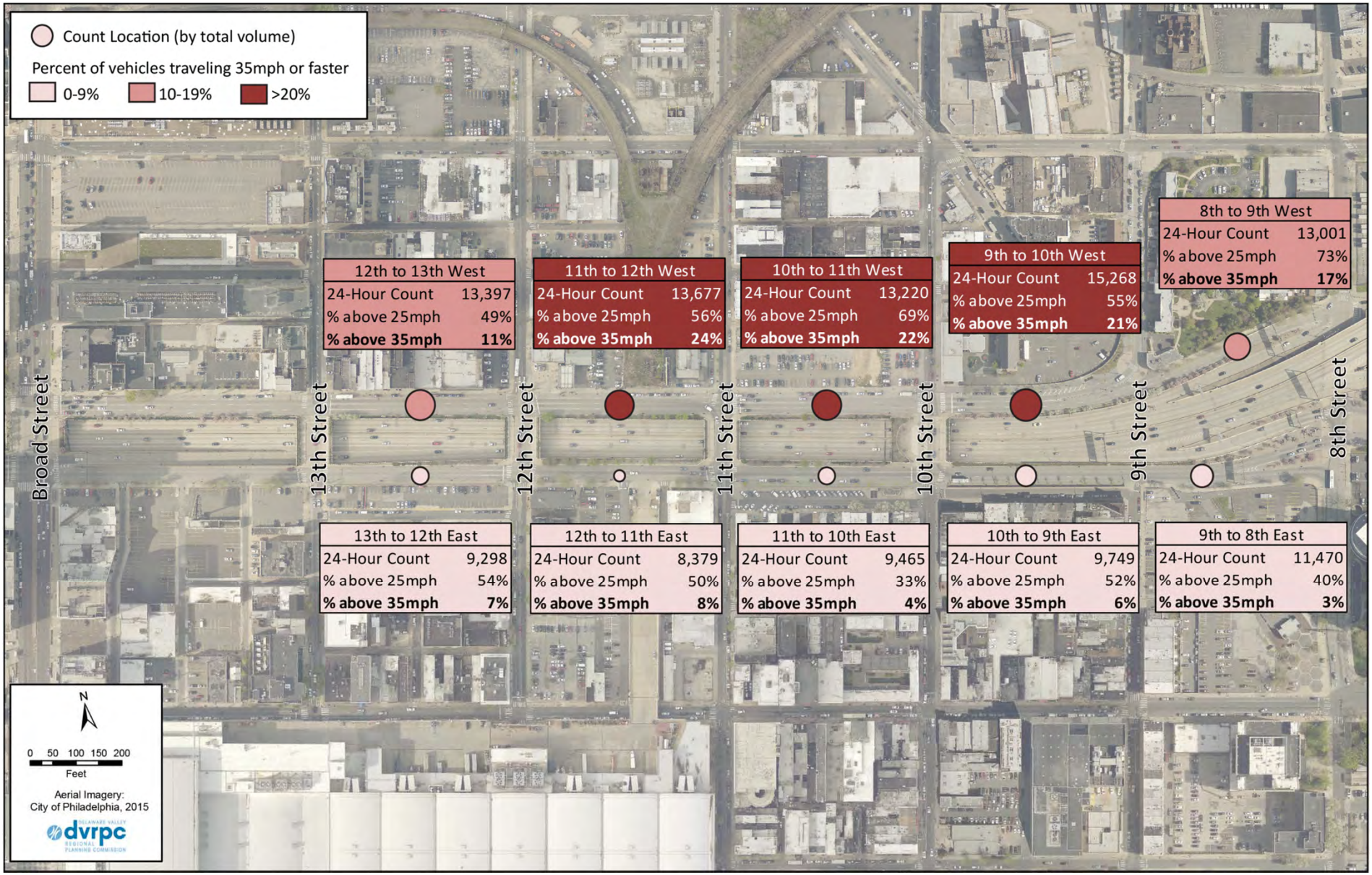
Parking Violations

DVRPC 2017, weekday field observations



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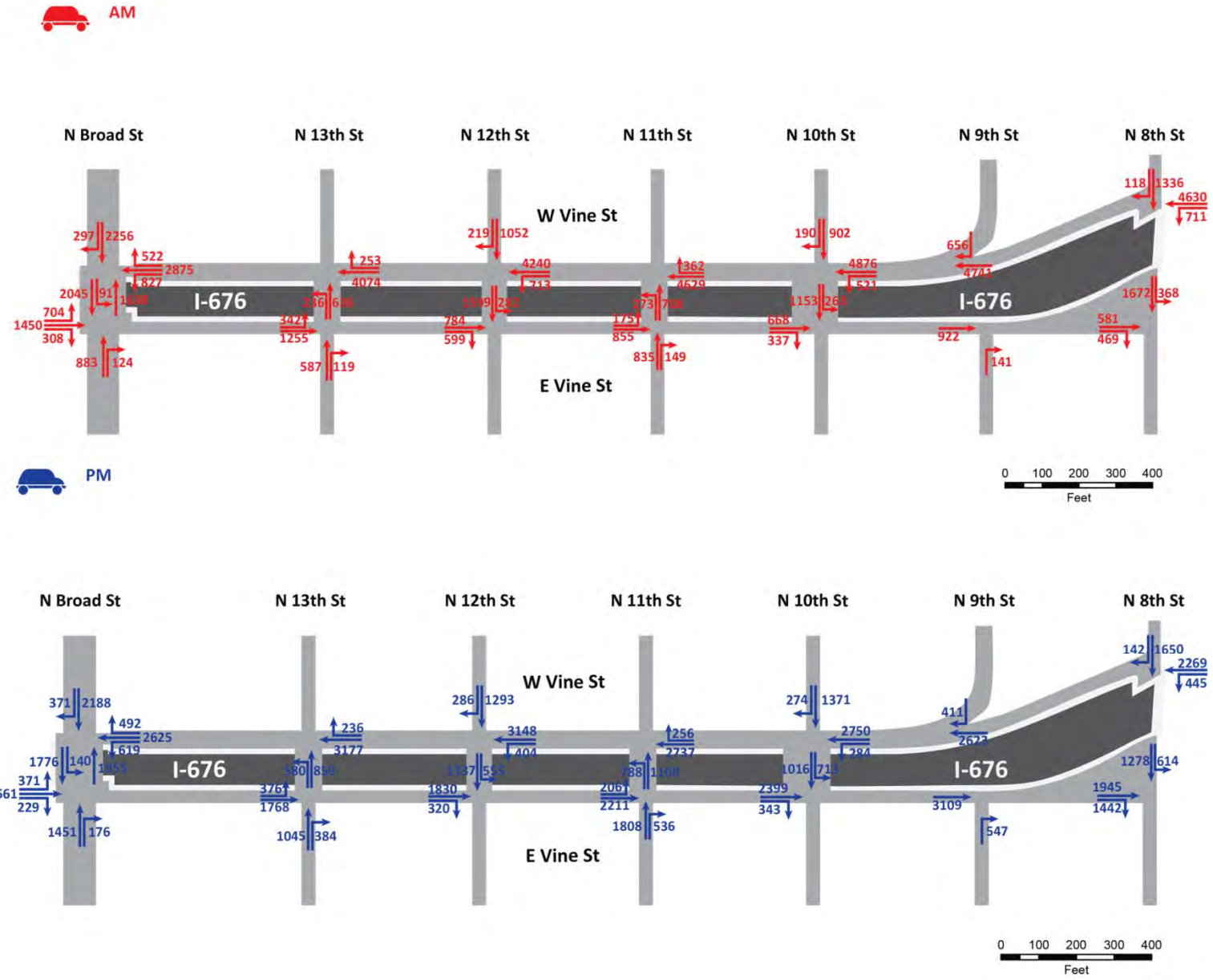
Weekday Vehicle Speed and Volume Counts

DVRPC Traffic Counts, October 2017



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Weekday Peak Vehicle Turning Movements

DVRPC Traffic Counts, February 2017. AM Peak: 8:00-9:00AM. PM Peak: 4:45-5:45PM.

Task 1 Takeaways

- Safety, accessibility, walkability
- Traffic calming particularly on Vine West
- Pedestrian improvements on 8th, 10th, and 13th
- Bike lane improvements and connections

Task 2: Model Existing Conditions and No Build Scenarios

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Existing Conditions: Level of Service

Future No Build Scenario

- Applied background traffic growth factor
- Horizon year 2025

Background Traffic Growth Factors

Federal Functional Class	Study Area Street Segments	Average Annual Traffic Growth (Forecasted)	Total Traffic Growth 2017-2025 (Forecasted)
Minor Arterial	- Vine Street East and West - 13th Street from Race to Vine - 12th Street from Race to Callowhill - 11th Street from Race to Callowhill	0.66%	5.28%
Major Collector	- 13th Street from Vine to Callowhill - 10th Street from Race to Callowhill - 9th Street from Race to Callowhill - 8th Street from Race to Callowhill	0.53%	4.24%
Other Principal Arterial	- Broad Street from Race to Callowhill	0.41%	3.24%

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Future No Build with Developments

- Applied background traffic growth factor
- Horizon year 2025
- Estimated trip generation from new developments
- Applied trips to model

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Future No Build with Developments (2025): Developments Considered for Trip Generation

Estimated Trips Generated

Location	Residential Units	Commercial SF	Estimated Trips Generated: Weekday AM Peak	Estimated Trips Generated: Weekday PM Peak
10th Street and Vine West	150	45,000	98	104
1001 Ridge Avenue	48	2,900	56	161
900-34 Callowhill Street	142	14,000	41	113
323 North 13th Street	97	0	20	28
339 North Broad Street (complete)	110	6,000	39	65
322-44 North Broad Street (complete)	256	11,000	72	115
Total	**803**	**78,900**	**326**	**586**

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Future No Build with Developments (2025): Level of Service

LOS Summary Table

Intersection	AM			PM		
	Existing	No Build	No Build with Developments	Existing	No Build	No Build with Developments
Vine EB & Broad	C	C	**C**	C	C	**D**
Vine EB & 13th	B	B	**B**	B	B	**B**
Vine EB & 12th	B	B	**B**	B	B	**B**
Vine EB & 11th	B	B	**B**	B	B	**B**
Vine EB & 10th	A	A	**A**	B	B	**B**
Vine EB & 9th	A	A	**A**	A	A	**B**
Vine EB & 8th	D	D	**D**	C	D	**D**
Vine WB & Broad	C	D	**D**	C	C	**C**
Vine WB & 13th	B	B	**C**	B	B	**B**
Vine WB & 12th	B	B	**C**	B	B	**B**
Vine WB & 11th	A	A	**B**	B	B	**B**
Vine WB & 10th	A	B	**B**	B	B	**B**
Vine WB & 9th	A	A	**A**	A	A	**A**
Vine WB & 8th	B	B	**B**	B	C	**C**

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Task 2 Takeaways

- LOS lowest at:
  - Broad and Vine West
  - Broad and Vine East
  - 8th and Vine East
- Capacity reduction may be feasible

Task 3: Develop Improvement Alternatives

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Potential Improvements

- Lane reconfiguration
  - East/west
  - North/south
- Signal timing
- Street geometry
- Other?

Key locations **Constraints** **Plans**

Public Meeting

- Purpose
- Invitees
- Potential Dates (April 9, 10, 11, 12, 13)

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Next Steps

- Meeting notes
- Finalize/promote public meeting
- Tasks 3/4: Develop/analyze improvement alternatives