# **Draft** 12/13/18

# To be added

- 1. Constrained and Aspiration maps to be updated
- 2. RTP Development w/outreach findings (later waiting on outreach results)





Final Design to be completed by designer



# WILMAPCO Council

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# INTRODUCTION

### Who is WILMAPCO?

The Wilmington Area Planning Council (WILMAPCO) is the Metropolitan Planning Organization (MPO) for Cecil County, Maryland and New Castle County, Delaware. We are charged with planning and coordinating this region's transportation investments.

### What is the Regional Transportation Plan?



The Regional Transportation Plan (RTP) identifies our region's long-term transportation needs and the projects and activities that address them. The RTP extends through at least two decades, and the projects it calls for are financially reasonable (based on anticipated revenues) and meet air quality standards. Only transportation projects found in the RTP are eligible for federal funding. It is a living Plan, subject to continual revision (at least every four years), and, generally, a tool for informed transportation and policy decisions.

WILMAPCO's first RTP was published in 1996. The present document is the sixth update to that original Plan. This iteration of the RTP is broken into six sections. These include: the introduction; a section devoted to the status of the existing transportation system; another section which considers the successes and challenges of realizing our previous RTP; a section with our goals, objectives and necessary actions; another section outlining available funding, and a listing of transportation projects; and a final section describing the development of this Plan. An appendix houses more details and background information.

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# THE REGIONAL TRANSPORTATION SYSTEM

### **Location**

The WILMAPCO region is nestled between the metropolitan areas of Philadelphia, Pennsylvania and Baltimore, Maryland along the Eastern Seaboard of the United States. Home to more than 660,000 people and 300,000 jobs, its character is primarily rural<sup>1</sup> and its human landscape suburban, with a handful of towns, and a small city (population 70,000) in Wilmington. More than three quarters of the region's jobs are in the service sector, with a remarkable concentration in finance<sup>2</sup>.

### **Moving People and Goods**

Most of these jobs, and the people who work them, are situated along an east/west, urban belt in the region's north. Major highways run along this belt (the most important of which is I-95) while others (such as US 13) link to them from the north and south. These highways both tie our region to other metropolitan areas and, internally, form the bedrock of our region's transportation system. Less prominent roads weave residential, commercial, and industrial traffic into the major highways. Heavy rail lines (anchored by Amtrak's Northeast Corridor) stretch across the urban corridor and beyond, supporting the highways in channeling materials to local industry and people and goods to other regions. Long, meandering trails reach out from parks and into communities. Wilmington's expanding seaport, along with its small airports and air strips, round out the region's transportation network.

A ...

<sup>1</sup> In 2011, agriculture and developed vegetation covered 28% of the region; developed and other human use 26%; forest and woodland 25%; open water 15%. Source: USGS: GAP/ LANDFIRE National Terrestrial Ecosystems 2011, New Castle County, Delaware and Cecil County, Maryland

<sup>2</sup> 12% of the region's jobs were in financial activities in 2012-16, compared to 7% nationally. Source: American Community Survey.

### Regional Transportation Network



2





A century of suburban sprawl (channeled by highway building) has produced a transportation system where private vehicles are the dominant, and growing, means of travel. Land and transportation policies -- combined with affordable fuel and private vehicles -- enabled the dispersion of population and jobs from the City of Wilmington. In 1920, more than seven in ten New Castle County's residents lived within that city. Today, one hundred years later, it is about one in ten.

Nine out of ten trips each day in our region are made in a private vehicle<sup>4</sup>. These vehicles, and our increasingly advanced web of highways, have brought fast, efficient, and unprecedented mobility to many of our region's residents and visitors, especially those with the greatest financial means. The low-density development pattern in much of the region makes alternative transportation options — such as carpooling, public transit, and walking and bicycling – often difficult and sometimes impossible.

<sup>3</sup> Source: U.S. Census, 2010.

<sup>4</sup> CADSR, University of Delaware. "Delaware Trip Monitoring Survey, 2017" and American Community Survey.

The presence of I-95, together with the seaport and industrial uses along and nearby the coast, and our prevailing consumer culture, generate freight traffic. These goods are hauled on the backs of trucks, in rail cars and in cargo ships. More than half (53%) of the material is just passing through, destined for other regions. Much of the inbound and outbound traffic involves building materials, food, petroleum/coal, and chemicals.



### Means of Transportation to Work, WILMAPCO Region<sup>5</sup>



# KEY SUCCESSES AND CHALLENGES

What will our region look like by 2050? For one thing, we can expect a 11% increase in population. While no growth in the number of jobs is expected given our aging population (62% more seniors by 2050), net population growth will stress our transportation system. If no improvements are made, highway congestion can be expected to increase by 77%. Some of that congestion will be created by additional truck traffic, which is forecasted to grow by 80% between now and 2050.

Our RTPs have taken aim to address these and many more worrying trends over the years. And we have had success implementing many of our previous actions and projects. We track our success and make sure our recommendations are on point though the data-driven Regional Progress Report and the Public Opinion Survey, a scientific sample of resident opinion on matters of transportation quality and policy.

### Successes

Technological advancements in vehicles and highway infrastructure has supported a cleaner transportation system and smoother expressway travel. Automatic tolling adoption has increased from an average of 19% of tolled vehicles in New Castle County in 2000 to 75% in 2016. Together with infrastructure expansions, this has helped to streamline increasing expressway travel. While counterintuitive, cleaner engines and fuels have reduced emissions in regulated pollutants. We expect to see reductions in ozone and microscopic dust emissions through the 2030s – despite rising vehicle travel.

Community planning and implementation has also been a major success. Since 1995, WILMAPCO has undertaken at least 40 corridor- and city-wide or local area transportation plans. Only seven of these plans (18%) have not seen any of their policy recommendations or projects implemented. Conversely, eight plans (20%) have been fully, or nearly fully, implemented while most plans (63%) have seen at least some implementation, with more to come.

But perhaps the single best measure of our success is how well residents say the system meets their travel needs. Overall, an increasing percentage of our region's residents say the transportation system meets their needs. In 2018, about nine in ten (88%) report it meets their needs "well" or "very well."

### Challenges

Continuing suburban sprawl, stubbornly high vehicle crash rates, and enduring social inequities are a few of the key challenges facing the region today. Our transportation and land use policies support growth in places with little existing infrastructure. More sprawl means more driving. And after posting sharp declines during the first half of the 21st Century, vehicle injury and fatality rates have risen during the last few years.

Societal inequities by race and class are replicated in our transportation system. Our public opinion survey, for example, shows that difficulty utilizing the transportation system increases as income decreases. Nearly half (47%) of those living in households earning less than \$25,000 a year reported at least some difficulty getting around, compared to fewer than one in ten (9%) of those living in households earning more than \$100,000 a year.

Select Regional Trends Through 2050<sup>6</sup> Employment - 0% 11% Population Population 65+ 62% Congestion 77% 80% Truck Traffic 10 20 30 40 50 60 70 80 90 0 100



**Road Fatalities per Vehicle Miles Traveled**<sup>8</sup>



<sup>6</sup> Truck traffic and congestion consider trends between 2012 and 2045 from the Freight Analysis Framework. The other demographic trends were developed by combining New Castle County and Cecil County data from the Delaware Population Consortium and the Maryland Office of State Planning. Figures for 2019 in Cecil County were interpolated, while the final year of population and jobs data for Cecil County reaches to 2045.

<sup>7</sup> WILMAPCO Public Opinion Surveys: 2006, 2010, 2014, and 2018.

<sup>8</sup>VMT and freight tonnage figures show growth from 2012, while all other factors are from 2015. Sources: MDOT, DelDOT; Freight Analysis Framework; Delaware Population Consortium, Maryland Department of Planning.

# PLANNING FOR TOMORROW

This section of the RTP presents the goals, objectives, and actions we propose to meet the transportation challenges during the next 25 years. We have three broad, overlapping goals: Support Sustainable Economic Development and Goods Movement, Efficiently Transport People, and Improve Quality of Life.

Within the goals are objectives and within the objectives are actions. The RTP is not structured in a hierarchy. In other words, the achievement of one goal/objective/action is just as important as the next. In fact, many objectives and actions could just as easily fit underneath a different goal than what is identified here.

The actions are the most crucial elements of this section. They will inform planning activities at WILMAPCO, and the projects we seek to implement during the next several years. Our successes and failures in realizing these actions will be tracked, with the performance measures identified in this section.

We will show two classes of performance measures – National Performance Measures (NPM) required of MPOs and Performance Measures (PM). We nest the required NPMs inside actions where we feel they will be best addressed. However, not all actions will be associated with an NPM. While not required, PMs dig deeper into the source of an action's performance. How well we do in meeting our actions and performance measures will inform the next update of our RTP, due in four years' time.







# **GOAL:** Support Sustainable Economic Development and Goods Movement

Transportation can help or hinder economic development. A transportation system which efficiently moves freight and workers maximizes economic development potential, while one that leads to chronic traffic problems slows economic activity. Simultaneously that system must be planned and built wisely to lessen and withstand the stresses of climate change, such as increased heat, sea level rise, and more chronic flooding. These interwoven challenges impact our long-term economic development potential.

Ensuring that we get the most out of each transportation dollar invested, developing effective transportation networks, and reducing our dependence on oil while planning to reduce and adapt to environmental impacts will make for a stronger and more sustainable economy in the decades ahead

### **OBJECTIVES**



# Maximize our investments

Encourage increased density and future growth in Center TIAs

PM: HH and employment growth by TIA; TIP spending by TIA; Percent of location efficient places; demographic projections and TIP spending Center vs. Rural TIAs Use WILMAPCO's project prioritization process to select projects for TIP funding

PM: projects in current TIP vs. unfunded projects, by tech score

### Support the

examination of additional and sustainable funding sources for transportation projects

PM: alternative funding sources secured; review UPWP

### Create and support the implementation of subregional plans

PM: qualitative review of UPWP; implementation progress of subregional plans Support municipalities and existing communities

PM: qualitative review of UPWP; summarize recommendations of local plans

# **Public Opinion**

SUPPORT concentrating development and transportation projects to places with more people and jobs

### **Spotlight: Corridor Planning**

WILMAPCO works alongside local governments, civic leaders, residents, and businesspeople on corridor plans. While not required by federal mandate, these local plans propose transportation and land use recommendations to support prosperity, sustainability, and improve quality of life.

Many planning efforts fall into this category – from Glasgow Avenue to Route 9 to Concord Pike. While considering ways to make travel safer and more efficient, these "master plans" also tackle how land development in the corridor influences transportation patterns that can be made better.



The Route 9 Master Plan envisions intensive housing, retail, and office redevelopment packed around the new Route 9 Library.

National performance measure (NPM)

Actio



# Develop effective transportation networks

WEEEEEE

### Manage congestion

- NPM: % of the interstate system providing reliable travel times; % of the non-interstate NHS providing reliable travel times; % of the interstate system where peak hour travel times meet expectations; % of the non-interstate NHS where peak hour travel times meet expectations; annual hours of excessive delay per capita
- PM: Maintain CMS Report; integrate CMS into TIP (management and expansion TIP projects vs. CMS corridors)

### Streamline freight movement

- NPM: % of the interstate system mileage providing for reliable truck travel times; % of the interstate system mileage uncongested
- PM: Maintain a Freight Plan; (management and expansion TIP projects vs freight bottlenecks

### Promote seamless interregional travel

 PM: Maintain an Interregional Report; status of major interregional projects

WIVIN

Enhance intermodal

systems connectivity

PM: qualitative review

of UPWP

### **Spotlight: Interregional Planning**

WILMAPCO's planning efforts do not end at our borders. Our Interregional Report tracks projects and activities on key travel routes to neighboring regions, such as along I-95, the Northeast Rail Corridor, US 40, and US 301. The report, updated every four years, also provides a demographic and travel survey of trends and forecasts of the 28-county, four-state region surrounding Cecil and New Castle Counties. The aim of this initiative is to foster seamless travel between regions.

**54%** 

# **Public Opinion**

say improving signal timing or improving public transit is the best long-term solution to congestion

### **Status of Significant Inter-Regional Transporation Projects**



80%

DRAFT 12/13/18

Plan for energy security and resilience



NPM: % of SOV tripsPM: per capita VMT

Support cleaner vehicle infrastructure, fuels, and technology

 PM: Qualitative review of UPWP; number of public EV charging stations; Transportation GHG Emission Analysis

### Adapt to sea level rise, storm flooding, and other environmental challenges

 PM: SLR vulnerability vs. planned projects; Funded TIP projects potentially impacted by SLR; qualitative review of UPWP

相称

# **Public Opinion**

say it's important to help develop infrastructure for no or low polluting alternative fuel vehicles

## Spotlight: Public Electric Vehicle (EV) Charging Hotspots

Six years ago, when Electric Vehicle (EV) technology was still in its infancy, WILMAPCO developed a methodology to help identify the best places to put publicly-accessible EV charging stations. Our EV Charging Hotspot analysis, still fresh, has been used to support successful grant applications and has informed the work of Electrify America, which aims to build a national network of EV charging stations. Between 2012 and 2016, the number of public EV stations increased in our region from two to eleven.



### EV Charging Hotspot Analysis<sup>9</sup>

Widener Law / Concord



### **Performance Measurement**

# 2-YEAR 4-YEAR 2-YEAR TARGET BASELINE TARGET 27.9% 28.0% 27.9% 28.0% 2016 2016 - 2018

Percent of Non-Single Occupancy Vehicle Trips and Future Targets\*

\*National Performance Measure

### **Goal: Efficiently Transport People**

Our transportation network should move people efficiently, regardless of which form of transportation is used and who uses it. We should seek to maximize the professional and personal time of our residents and visitors, reducing the hours many spend each year in heavy vehicle traffic, or waiting for delayed buses and trains. We should engage the public about the best ways to accomplish this -- early, often, and throughout the planning process.

Improving system performance by loosening congestion, ensuring that accessibility and connectivity is achieved by all, and placing the public's voice at the forefront of new plans will help us to achieve this goal.

### EFFICIENTLY TRANSPORT PEOPLE





### **Spotlight: Autonomous Vehicles**

Autonomous Vehicles (AVs) [self-driving] will be a game changer in how our transportation system functions and how cities are laid out. Within the next decade, car companies are expecting to roll out vehicles with partial autonomous capabilities. By 2050, it is expected that a sizeable share of our vehicle fleet will be fully autonomous.

AVs hold both great promise and the threat of unintended negative consequences. With better situational awareness than humans, AVs should, for example, significantly reduce vehicle crashes. They should also allow for faster, more efficient, and higher capacity travel – reducing the need for travel lanes and parking spaces and getting people and goods to places faster. On the flip side, they may also encourage more suburban sprawl, social inequity, and pollution.

WILMAPCO is beginning to think about AVs in our plans. Smart transportation plans will consider that less space for parking will be needed, but more space may be required for "drop off" lanes. Fewer and skinner travel lanes will also be necessary that will allow more road space for other things like bicycle lanes and sidewalks and green space.



Potential 50% Human, 50% AV Driven Street



### Potential 50% AV Driven Street



AVs need less space to operate than human-driven vehicles. This will allow future streets to be designed with much less space dedicated to vehicles. (Image source: RESTREET, courtesy of Department of Urban & Regional Planning, Florida State University).



### **Spotlight: Performance Measurement**

Taking time to measure performance has long been a staple of work at WILMAPCO. Our centerpiece performance measurement document, the Regional Progress Report, has been updated at least every few years since 2004. Today, this report examines each action in our RTP and judges if we have made good, partial, or poor progress through performance indicators. The Progress Report, along with the Public Opinion Survey, inform the goals, objectives, and actions of the next RTP. Many poorly preforming actions from our last RTP were rethought and reinvigorated in this RTP.



### Draft 2050 RTP (12/13/2018: \*final design pending\*

### ENGAGE THE PUBLIC VIA AN OPEN INVOLVEMENT PROCESS

Reach a wide and growing public audience

 PM: transporter distribution; electronic reach (web hits, e-news subscribers, facebook friends); POS familiarity with WILMAPCO Achieve an early, open, ongoing and transparent public dialogue in all WILMAPCO projects

• PM: review of public participation components of studies Promote inclusionary public participation regardless of age, race, class, or any socio-cultural community •PM: transporter

distribution analysis

Increase the racial/ ethnic diversity of PAC membership

 PM: Racial/ethnic background of PAC members

### **Public Opinion**

About one third of the region's residents are familiar with WILMAPCO.

Spotlight: Public Involvement

For the 2050 Regional Transportation Plan, WILMAPCO staff identified four primary goals for public outreach:

- 1. Test public support for the RTP objectives, gain a greater understanding of any needed changes to objectives, and fine tune the policies specified in the plan
- 2. Gain better understanding of which types of projects are most desired
- 3. Gain better understanding of preferred public outreach methodologies
- 4. Educate on the current state of transportation

For a region as diverse as WILMAPCO's a variety of outreach strategies were used to accomplish these goals. For additional details on the 2050 RTP outreach strategy and results, please see Appendix XX.

### Draft 2050 RTP (12/13/2018: \*final design pending\* Performance Measurement

### Followers of the WILMAPCO Facebook Page



### **Goal: Improve Quality of Life**

Transportation influences the health and well-being of people and the environment. On the human health side, private vehicle crashes are a leading cause of accidental death in the United States. Overreliance on private vehicles also lowers physical activity, increasing the risk of obesity and cardiovascular disease, and produces emissions, which harm our respiratory systems, and have been linked to cancer. Societal inequities are also reproduced in the transportation network. Low income and ethnic and racial minority communities are more burdened with transportation's negative impacts (such as exposure to emissions) and receive fewer benefits (such as funded projects in their communities). The expansion of infrastructure -- and the often subsequent triggering of new development -- also threatens the continued destruction of our natural habitats.

By working to protect public health and safety, promoting active transportation, ensuring transportation choice and equity, and preserving our natural and cultural resources we can improve our quality of life.



### **IMPROVE QUALITY OF LIFE**

### Draft 2050 RTP (12/13/2018: \*final design pending\*

### **PROTECT PUBLIC HEALTH & SAFETY**

Promote safer transportation network design and travel for all modes • NPM: road injuries and fatalities per VMT; total road injuries and fatalities total bicycle crashes, fatalities, and injuries rove safety for ple walking <sup>M:</sup> total pedestrian shes, fatalities, and Support disaster planning efforts • PM: qualitative review of Exceed transportation conformity standards • PM: on road mobile source ozone and PM2.5 projections; qualitative

Fund CMAQ projects with the greatest air quality benefits • PM: WILMAPCO CMAQ prioritization vs. eventual funding • NPM: 2 and 4-year total prioritic evolutions

Seek to improve multimodal access and connectivity to healthy and affordable food, employment and services in all WILMAPCO studies PM: connectivity analysis

### **Public Opinion**

Low-income residents are **5x more likely** to have some difficulty with transportation, compared to high income residents

### Spotlight: Social Determinants of Health (SDOH)

A person's health is impacted not just by their genetics and lifestyle, but also by the social conditions where they live. Communities with limited formal education, those without easy access to healthy food, those with limited social cohesion, and those experiencing poverty and racism, among many other factors, can be expected to have poorer health outcomes.

This past year, WILMAPCO, with the support of Nemours and several other agencies and civic groups, helped develop a Social Determinates of Health (SDOH) index as part of our development of a transportation project prioritization process for the Route 9 Corridor Master Plan. It incorporated many documented SDOH indicators that caused some neighborhoods to be of greater public health concern. In that local analysis, these neighborhoods received greater consideration for transportation improvement projects, which would improve access and connectivity and help address these health concerns.

WILMAPCO is beginning to analyze and apply SDOH concepts on a regional scale and in other studies.

### Draft 2050 RTP (12/13/2018: \*final design pending\*





https://www.healthypeople.gov/2020/topics-objectives/topic/social-determinants-of-health

### **Performance Measures**

### **Total Crash Fatalities and Future Target\***



\*National Performance Measure

### Draft 2050 RTP (12/13/2018: \*final design pending\*

### **PROMOTE ACTIVE TRANSPORTATION**

### Fund transportation choices

PM: TIP funding trends
NPM: Percentage of non-SOV trips Apply a Complete Streets Policy in all WILMAPCO studies and in the TIP

• PM: review of UPWP studies and the TIP

Fund TAP investments within areas of greatest need

• PM: WILMAPCO TAP prioritization versus eventual funding

### Develop and implement SRTS Programs

• PM: qualitative review of UPWP

### **Public Opinion**

**65%** say that distance, their car, and a lack of convenience is what keeps them from walking more.

### **Spotlight: Location Efficiency**

Housing and transportation are the two biggest line items in the average North American household's budget. Using data from the Center for Neighborhood Technology, WILMAPCO examined which communities in our region had reasonable housing and transportation costs which are considered here to be at or below the median spent nationally. We found that, for the typical household (one that earns the region's median income), most of the region was not very affordable. While some 60% of housing units were in areas where housing costs were affordable, only 19% were in places where transportation costs were affordable. Most residents of the WILMAPCO region then, especially in Cecil County and outside of the I-95 corridor in New Castle County, spend much more time than expected on just getting around.

Creating walkable and bikeable communities with nearby destinations like jobs, markets, and activities will lessen the need for private cars and pay downstream economic and environmental dividends.

http://www.wilmapco.org/data/TranspHousingCosts DataReport.pdf

### Draft 2050 RTP (12/13/2018: \*final design pending\*



### Draft 2050 RTP (12/13/2018: \*final design pending\* Performance Measures

### WILMAPCO TIP's Alternative Transportation Funding Trends



### Draft 2050 RTP (12/13/2018: \*final design pending\*

### ENSURE TRANSPORTATION CHOICE & EQUITY

Equitably distribute TIP funding Analyze the inequities EJ Reduce Generate beneficial Plan for livable, transportation projects within EJ transportation costs sustainable and PM: transportation as a percentage of household spending; Inflation-adjusted bus/train fares; transportation and housing affordability data groups experience prosperous • PM: TIP spending within EJ communities in the transportation network neighborhoods • PM: TIP spending within EJ communities PM: qualitative review
 of UPWP PM: Maintain an EJ report **Public Opinion** 73% of black residents say improving bus service is important versus about 48% of whites

### Spotlight: Environmental Justice (EJ)

Societal burdens carried by low-income and racial and ethnic minority or EJ communities are replicated within the transportation system. WILMAPCO has analyzed these patterns and has proposed some solutions. Significantly, we found that the percentage of planned project spending within EJ neighborhoods has declined during the past decade, in step with greater funding for suburban highway projects. We have also found that EJ groups are consistently less familiar with WILMAPCO and have unique transportation concerns. EJ is woven into our project prioritization process to help speed the implementation of beneficial projects in EJ communities. And while we have bolstered EJ public outreach initiatives, more work is needed. A fresh regional EJ study is underway and is expected in the Fall of 2019.

### **Performance Measures**

### Planned Transportation Spending within EJ Areas



### Draft 2050 RTP (12/13/2018: \*final design pending\*

### PRESERVE NATURAL & CULTURAL RESOURCES

Support the designation and implementation of scenic byways • PM: qualitative review of UPWP; corridor management plans Avoid TIP expansion projects in Rural TIAs and Sensitive Ecological Areas • PM analysis of RTP/aspiration projects

Seek to preserve and protect natural and cultural resources in all WILMAPCO studies

PM: qualitative review of subregional studies

Support efforts to reduce negative transportation impacts on the environment and society • PM: qualitative review of UPWP

Promote use of designs that minimize impervious surface and environmental impacts • PM: qualitative review of subregional studies and TIP Establish a better relationship between transportation and tourism • PM: Greenway progress

### **Public Opinion**

**70%** say preserving farmland and open space is very important

### Spotlight: Rural Development

In our region, rural development is outpacing urban redevelopment. As shown in our Progress Report, the cities of Newark and Wilmington, together, can expect only a 6% increase in households though 2040. Rural parts of the region, meanwhile, can expect 32% more households. This continues a similar historic trend of sprawl into rural areas.

These new households, particularly in Southern New Castle County, have stressed roads and have helped trigger many of the major transportation projects found in this and past RTPs. Rural parts of New Castle County have captured more than double the planned transportation investment of Newark and Wilmington during the past decade. These expansion projects often bring lasting change to sensitive natural landscapes and set the stage for additional development, which is driving the "cycle of sprawl" we will explore in the next section.

To better preserve farmland and open space we must understand the impact transportation investments have on future land development, and plan transportation and land development in tandem.

### **Performance Measures**

Demographic Projections and Planned Transportation Spending in Wilmington and Newark vs. Rural Areas

NEW CASTLE COUNTY, 2017-2040



6% more households 0% more jobs



32% more households 4% more jobs

### CECIL COUNTY, 2017-2040



24% more households 19% more jobs



32% more households

### AVERAGE TIP SPENDING SINCE FY 2010 (REGIONAL)





### **TRANSPORTATION INVESTMENT AREAS & CONNECTIVITY ANALYSES**

Land use and transportation planning are often not well coordinated on a regional scale. This has historically led to Wilmington's suburban sprawl and, today, continues to churn a "Cycle of Sprawl" which threatens lasting economic growth, leads to social inequity and poor health outcomes, and endangers our environment. As shown in the conceptual graph below, sprawling developments are built on the region's edge; which necessitates transportation expansions (encouraging more sprawl); and leaves less funding for developed areas (encouraging more sprawl). The result is a continuation of suburban sprawl, increasing total vehicle miles driven, and persistence of social inequities.



While the cycle continues in the WILMAPCO region, channeling development into existing places and identified growth areas is the preferred development method of our residents. This is illustrated in the graphic below.


### **Transportation Investment Areas (TIAs)**

One way to help break the cycle of sprawl is to properly invest in Transportation Investment Areas (TIAs). TIAs are an overarching guide for where the various types of transportation investments ought to go, in recognition of transportation's close relationship with land use. The TIAs were developed by reviewing and consolidating state and local land use plans into a single map.

The graphic below provides a description of each TIA type. Generally, places with the heaviest concentrations of population and employment and infrastructure – "Centers" and "Cores" – are tabbed for the greatest transportation investments, to maintain and expand existing networks. Places with the least development -- "Rural" -- should see the most limited project funding. The three other TIA types ought to receive varying levels of project funding as needed. WILMAPCO should ensure that proposed RTP and TIP projects are appropriate for the TIA designation.

While not a TIA type, we also identify four distinct villages within Cecil County's Core TIA. These places were identified in the County's Comprehensive Plan. Investments made in and surrounding these villages should take care to consider potential disruptions to their unique historic character.

#### <sup>10</sup> WILMAPCO Public Opinion Survey, 2018



# Center

High existing and planned concentrations of people and jobs with opportunities for significant redevelopment.

**Transportation Objectives**: intensive transportation investment with an emphasis on public transportation (including rail and the most frequent bus service) and walking and bicycling improvements. New highway interchanges should be discouraged. High frequency bus service is appropriate.



# Core

Established places with a mixture of people and jobs, often along and nearby suburban highways.

**Transportation Objectives**: maintain and manage the existing infrastructure while allowing for system expansion for all modes of transportation, except train stations and the addition of public transit centers. Moderate frequency bus service is appropriate here.



# Community

Established places home to mostly single-family residential communities.

**Transportation Objectives**: maintain and manage the existing infrastructure while allowing for some periodic system expansions. Infrequent bus service is appropriate.

#### Draft 2050 RTP (12/13/2018: \*final design pending\*



# **Developing**

Quickly developing places with unsettled land use and transportation patterns.

**Transportation Objectives**: maintain and manage the existing and emerging infrastructure. Some system expansion will be necessary, but major capacity road expansions and interchanges should be discouraged. Infrequent bus service is appropriate.



# Rural

Agricultural and natural areas where urban development is not expected.

**Transportation Objectives**: preserve the existing infrastructure with an aim of protecting existing agriculture and natural resources. All system expansions apart from bicycling and walking paths should be actively discouraged. No fixed-route bus service is appropriate. Scenic byway easement purchases should be pursued where applicable.



# **FINANCIAL PLAN**

The Financial Plan of the RTP assesses how much funding is available for future transportation investments, priority projects for road, transit, bicycle and pedestrian infrastructure known as the Constrained Project List, and desired projects that cannot be funded based on current funding forecasts known as the Aspirations List.

# 2050 Financial Forecast

Working with DelDOT and MDOT, we developed funding forecasts for New Castle and Cecil counties. Additional details about assumed operating and system preservation expenses may be found in the RTP appendices.

Summary- <i>\$s x 1000</i>	Cecil	NCC
Total Revenue from State estimates <sup>1</sup>	227,500	6,612,385
MDTA Tolls/BUILD Grant	1,389,380	
Less core business		(2,755,095)
Less GARVEE payback		(76,834)
Total revenue for new capital projects	1,616,880	3,780,456
Constrained project costs	1,616,879	3,780,454
Difference	1	2

### Available Funding Analysis - FY 2019-2050

#### 1. Total Revenue Sources:

**Delaware** - Total Capital Revenue for taken from line 65 "Total Funds Available for Capital Expenditures" and assumes that 50% will be spent in New Castle County.

**Maryland** - Assumes 86.4 % of funds will go towards surface transportation expansion, use of private funds (\$696 total statewide), and that 0.5% of total surface transportation funds will go towards Cecil County projects. Assumes I-95 widening will be 100% MDTA and I-95 interchanges will be 100% MDTA/Other/BUIILD grant



#### Funding Forecast for New Castle County Capital Transportation Projects

### Funding Forecast for Cecil County Transportation Expansion



# Public Opinion (updated w/2018 POS, WS)

Public SUPPORT for Various Transportation Funding Solutions

Fees for those who benefit from improvements – 68%

Extra fees for licensing inefficient vehicles – 66%

Increasing tolls – 45%

Increasing license and registration fees – 41%

Delay or eliminate projects – 37%

Increasing fuel taxes - 26%

Increasing transit fares – 25%

Tax on miles traveled - 22%

# **Financially Constrained Projects**

Many capital projects can be pursued through 2050 with available funding. The projects presented in this section represent the current priority projects. This listing will likely evolve in the decades to come, as funding is identified and lost, and policies, development patterns, and priorities change.

Project Name	2018 Cost (x1,000)	Year of Expenditure Cost x \$1,000	Funds available for capital improvements	Difference
Cecil County Long Term	807,509	1,517,780	1,517,781	0
Cecil County Medium Term	71,998	94,100	94,100	0
Cecil County Short Term	4,188	4,999	5,000	1
New Castle County Long Term	577,972	1,204,302	1,204,303	1
New Castle County Medium Term	1,099,088	1,560,158	1,560,158	0
New Castle County Short Term	901,027	1,015,994	1,015,995	1
Total	3,461,783	5,397,333	5,397,337	3

# Total Costs by Implementation Term and County

ST to 2024; MT 2025-2035; LT =>2036

Cecil County funding assumes that I-95 costs will be 100% MDTA tolls, BUILD Grant, local, and private





# Map of Financially Constrained Projects Over \$15 Million

MAP BEING UPDATED



# List of Financially Constrained Projects Over \$15 Million (\$s x 1000)

## Timeframe (Short term to 2024; Medium Term 2025-2035; Long Term 2035-2050)

Project Name	County	Timeframe	Mode	Category	2018 Cost	YOE Cost
I-95 and Belvidere Road Interchange	СС	MT	Road	Expansion	43,907	54,00
Maryland Commuter Rail: Perryville to Elkton (MARC extension)	СС	MT	Transit	Expansion	23,446	32,45
		MT Total			67,353	86,45
MD 213 / US 40 Intersection Improvements	СС		Multimodal	Management	44,740	63,78
MD 213, Bridge St.: US 40 to MD 279, Multi-lane urban	CC			Management		34,90
reconstruction					20,000	0 1,50
MD 272: US 40 to Lums Rd.	СС	LT	Multimodal	Expansion	30,501	58,44
I-95 and MD 222 Interchange	CC	LT	Road	Expansion	163,672	313,61
I-95: Susquehanna River to DE Line	CC	LT	Road	Expansion	533,253	1,021,76
Elkton Train Station	CC	LT	Transit	Expansion	14,842	25,26
		LT Total		•		1,517,780
Boyds Corner Rd: Cedar Lane to US 13	NCC	ST	Multimodal		18,000	21,49
Christina River Bridge	NCC	ST	Multimodal	· ·	49,733	52,76
Claymont Train Station	NCC	ST		· ·	60,000	65,56
•	NCC			Management Management		
SR 141 & I-95: I-95 - Jay Drive	NCC		Multimodal	Management Expansion	79,689 34,301	89,69 37,48
SR 2, Elkton Road: MD Line to Casho Mill Rd SR 299, SR 1 to Catherine Street	NCC		Multimodal	· ·	25,470	28,66
	NCC	ST		· ·		
SR 72, McCoy Road to SR 71	NCC	ST	Multimodal	· · ·	18,129	19,8
Support for new technologies				Management	80,000	95,52
JS 40 / SR 72 Wrangle Hill Road JS 40: Salem Church Rd to Walther Road	NCC	ST		Management	14,477	15,8
	NCC	ST	Multimodal		18,500	22,09
JS 301: MD State Line to SR 1 (Mainline)	NCC	ST	Road	Expansion	141,624	150,24
JS 40 and SR 896 Interchange	NCC	ST	Road	Expansion	58,500	71,94
Newark Regional Transportation Center, Phase II	NCC	ST	Transit	Management	61,453	67,15
Transit service expansion and frequency enhancements	NCC	ST	Transit	Expansion	60,000	71,64
	NICC	ST Total	Dillio (no al		719,876	809,89
BR 234 Pedestrian Improvements, Kirkwood Highway over Mill Creek	NCC	MT	Bike/ped	Management	20,000	28,52
US 13, US 40 to Memorial Drive	NCC	MT	Bike/ped	Management	28,000	34,43
				Management	28,000	36,36
ADE ramp improvements and / bike access and add NP ramp		N/T			22,000	50,50
	NCC	MT	Wultimoual	Management	,	
anes				_	15,000	21.20
anes North Claymont Spine Road: Northeast Corridor to Naamans Road	NCC	MT	Multimodal	Expansion	15,000	
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection	NCC NCC	MT MT	Multimodal Multimodal	Expansion Management	10,000	16,52
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements	NCC NCC NCC	MT MT MT	Multimodal Multimodal Multimodal	Expansion Management Management	10,000 14,550	16,52 17,89
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896	NCC NCC NCC NCC	MT MT MT MT	Multimodal Multimodal Multimodal Multimodal	Expansion Management Management Expansion	10,000 14,550 21,500	16,52 17,89 26,44
lanes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement	NCC NCC NCC	MT MT MT	Multimodal Multimodal Multimodal Multimodal	Expansion Management Management	10,000 14,550	16,52 17,89 26,44
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction	NCC NCC NCC NCC NCC	MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal	Expansion Management Management Expansion Management	10,000 14,550 21,500 16,000	16,52 17,89 26,44 22,83
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St	NCC NCC NCC NCC NCC NCC	MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal	Expansion Management Management Expansion Management Management	10,000 14,550 21,500 16,000 17,000	16,52 17,89 26,44 22,82 24,23
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies	NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal	Expansion Management Management Expansion Management Management Management	10,000 14,550 21,500 16,000 17,000 104,000	16,52 17,85 26,44 22,83 24,23 24,23 171,85
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services	NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal	Expansion Management Management Expansion Management Management Management	10,000 14,550 21,500 16,000 17,000 104,000 19,752	16,52 17,89 26,44 22,83 24,23 171,89 24,29
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services I-95 and SR 896 Interchange	NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road	Expansion Management Expansion Management Management Management Expansion	10,000 14,550 21,500 16,000 17,000 104,000 19,752 148,500	16,52 17,89 26,44 22,83 24,23 171,89 24,29 24,29 24,29 241,72
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services I-95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road	Expansion Management Expansion Management Management Management Management Expansion Expansion	10,000 14,550 21,500 16,000 17,000 104,000 19,752 148,500 110,000	16,52 17,89 26,44 22,81 24,22 171,88 24,29 24,29 211,72 156,83
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services -95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273 SR 896 at Bethel Church Rd Interchange	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road Road	Expansion Management Expansion Management Management Management Expansion Expansion Expansion	10,000 14,550 21,500 16,000 17,000 104,000 19,752 148,500 110,000 25,000	16,52 17,89 26,44 22,83 24,23 171,89 24,29 24,29 24,29 211,72 156,83 30,74
Annes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for new technologies Support for shared ride services I-95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273 SR 896 at Bethel Church Rd Interchange US 301: Spur	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road Road Road	Expansion Management Expansion Management Management Management Management Expansion Expansion Expansion	10,000 14,550 21,500 16,000 17,000 104,000 19,752 148,500 110,000 25,000 78,000	16,52 17,89 26,44 22,83 24,23 171,89 24,29 24,29 24,29 24,29 24,29 24,29 24,29 24,29 24,29 24,29 24,29 24,21 171,89 24,23 24,43 24,24,25 24,25,25 24,25,25 24,25,25 24,25,25 24,25,2
Annes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services I-95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273 SR 896 at Bethel Church Rd Interchange US 301: Spur Fairplay Train Station - Parking	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT MT MT MT	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road Road Road Road Transit	Expansion Management Expansion Management Management Management Management Expansion Expansion Expansion Management	10,000 14,550 21,500 16,000 17,000 104,000 19,752 148,500 110,000 25,000 78,000 14,252	16,52 17,89 26,44 22,83 24,22 171,89 24,29 211,77 156,83 30,74 111,20 20,33
lanes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 2, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services I-95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273 SR 896 at Bethel Church Rd Interchange US 301: Spur Fairplay Train Station - Parking Newport Rail Station	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT MT MT MT M	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road Road Road Transit Transit	Expansion Management Expansion Management Management Management Expansion Expansion Expansion Management Expansion	10,000 14,550 21,500 16,000 104,000 19,752 148,500 110,000 25,000 78,000 14,252 30,000	16,52 17,89 26,44 22,81 24,22 171,89 24,29 211,72 156,83 30,74 111,20 20,32 42,71
I-495 ramp improvements - ped / bike access and add NB ramp lanes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services I-95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273 SR 896 at Bethel Church Rd Interchange US 301: Spur Fairplay Train Station - Parking Newport Rail Station Rail - Newark to Elkton	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT MT MT MT M	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road Road Road Transit Transit	Expansion Management Management Expansion Management Management Management Expansion Expansion Expansion Management Expansion Management Expansion	10,000 14,550 21,500 16,000 104,000 19,752 148,500 110,000 25,000 78,000 14,252 30,000 30,000	16,52 17,89 26,44 22,83 24,23 171,89 24,29 211,72 156,83 30,74 111,20 20,32 42,77 42,77
Annes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services I-95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273 SR 896 at Bethel Church Rd Interchange US 301: Spur Fairplay Train Station - Parking Newport Rail Station	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT MT MT MT M	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road Road Road Transit Transit	Expansion Management Expansion Management Management Management Expansion Expansion Expansion Management Expansion	10,000 14,550 21,500 16,000 104,000 19,752 148,500 110,000 25,000 78,000 14,252 30,000 30,000 240,000	16,52 17,89 26,44 22,81 24,29
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services -95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273 SR 896 at Bethel Church Rd Interchange JS 301: Spur Fairplay Train Station - Parking Newport Rail Station Rail - Newark to Elkton Transit service expansion and frequency enhancements	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT MT MT MT M	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road Road Road Transit Transit Transit	Expansion Management Management Expansion Management Management Management Expansion Expansion Expansion Management Expansion Expansion Expansion Expansion Expansion	10,000 14,550 21,500 16,000 104,000 19,752 148,500 110,000 25,000 78,000 14,252 30,000 30,000 240,000 <b>963,554</b>	16,52 17,89 26,44 22,81 24,23 171,89 24,29 211,72 156,83 30,74 111,20 20,32 42,77 342,18 <b>1,383,3</b>
anes North Claymont Spine Road: Northeast Corridor to Naamans Road Philadelphia Pike/Naamans Road intersection SR 273 / Chapman Rd Intersection Improvements SR 4, SR 2 to SR 896 SR 9, New Castle Ave - 3rd St to Landers Ln, Pavement Reconstruction SR 9: Landers Ln - A St Support for new technologies Support for shared ride services -95 and SR 896 Interchange SR 1: Tybouts Corner to SR 273 SR 896 at Bethel Church Rd Interchange JS 301: Spur Fairplay Train Station - Parking Newport Rail Station Rail - Newark to Elkton	NCC NCC NCC NCC NCC NCC NCC NCC NCC NCC	MT MT MT MT MT MT MT MT MT MT MT MT MT M	Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Multimodal Road Road Road Road Transit Transit Transit	Expansion Management Expansion Management Management Management Management Expansion Expansion Expansion Management Expansion Expansion Management Management	10,000 14,550 21,500 16,000 104,000 19,752 148,500 110,000 25,000 78,000 14,252 30,000 30,000 240,000 <b>963,554</b>	21,38 16,52 17,89 26,44 22,81 24,23 171,89 24,29 211,72 156,83 30,74 111,20 20,32 42,77 342,18 <b>1,383,30</b> 51,50 57,48

Draft 2050 RTP (12/13/	2018: <b>*fin</b>	al design p	ending*			
Project Name	County	Timeframe	Mode	Category	2018 Cost	YOE Cost
Eagle Run Rd to Continental Drive Connector	NCC	LT	Multimodal	Expansion	40,000	76,644
Improve I-95 southbound off-ramp by widening and signalizing ramp right turn	NCC	LT	Multimodal	Management	24,500	63,090
SR 896: US 40 to I-95 (widening to six lanes)	NCC	LT	Multimodal	Expansion	30,000	77,25
Support for new technologies	NCC	LT	Multimodal	Management	65,000	124,547
Tyler McConnell Bridge, SR 141, Montchannin Road to Alapocas Road	NCC	LT	Multimodal	Expansion	46,000	88,14
US 13, Philadelphia Pike: I-495 - PA Line	NCC	LT	Multimodal	Management	10,000	19,16
US 40 Overpass of Norfolk Southern RR	NCC	LT	Multimodal	Management	35,000	77,74
I-295, Northbound	NCC	LT	Road	Expansion	10,000	19,16
SR 1: Tybouts Corner to Roth Bridge	NCC	LT	Road	Expansion	60,000	154,50
SR 141 & I-95 Interchange	NCC	LT	Road	Management	38,400	73,57
SR 9, River Rd. Area, Dobbinsville (viaduct)	NCC	LT	Road	Management	11,368	21,78
US 40/SR 7 Grade Separated Intersection	NCC	LT	Road	Expansion	58,000	111,13
Transit service expansion and frequency enhancements	NCC	LT	Transit	Expansion	68,000	130,29
		LT Total			546,268	1,146,02
		Grand			3,461,783	5,397,33
		Total			3,401,783	3,337,33



## Map of Financially Constrained Projects Under \$15 Million

MAP BEING UPDATED



# List of Financially Constrained Projects Under \$15 Million (\$s x 1000)

## Timeframe (Short term to 2024; Medium Term 2025-2035; Long Term 2035-2050)

Project Name		Timeframe		Category		YOE Cost
East Coast Greenway - Cecil County Phase 1	CC	ST	Bike/ped	Expansion	4,187	4,99
Cecil County – Short Term		ST Total			4,187	4,99
East Coast Greenway - Cecil County Phase 2	CC	MT	Bike/ped	Expansion	4,500	7,43
Elkton Bus Service Circulator	CC	MT	Transit	Expansion	145	20
Cecil County – Medium Term		MT Total			4,645	7,64
Augustine Cutoff Pathway	NCC	ST	Bike/Ped	Management	2,100	2,36
Commons Blvd Pathway	NCC	ST	Bike/Ped	Management	5,450	6,50
East Coast Greenway: Churchmans Crossing - Newark gaps (approx .2 mi)	NCC	ST	Bike/Ped	Expansion	800	95
East Coast Greenway: New Castle - Churchmans Crossing gaps approx. 2.8 mi)	NCC	ST	Bike/Ped	Expansion	5,000	5,97
East Coast Greenway: PA line to Claymont Regional Transportation Center	NCC	ST	Bike/Ped	Expansion	4,000	4,50
Gilbert Avenue sidewalk (one side)	NCC	ST	Bike/ped	Expansion	450	53
Improve pedestrian bridge and connector trail over I-495 pedestrian bridge	NCC	ST	Bike/Ped	Management	3,000	3,58
Library Ave Pedestrian Improvements	NCC	ST	Bike/Ped	Management	2,000	2,38
New St sidewalk (one side): Old Capitol Trail to Jackson Avenue	NCC	ST	Bike/ped	Expansion	820	, 97
Newark Bicycle Signal Detection	NCC	ST	Bike/Ped	Management	2,000	2,38
Newark Bike Lanes	NCC	ST	Bike/Ped	Management	2,000	2,38
Newport Rd Sidewalk, east side: Old Capitol Trail - Kiamensi St	NCC	ST	Bike/ped	Expansion	1,000	1,19
Sidewalk upgrades: Hickman Rd (access to Tri-State Mall), Analine Village path from Parkway Ave to Woodfield Dr, Darley Rd	NCC	ST	Bike/Ped	Management	3,000	3,58
4th St., Walnut St. to I-95	NCC	ST	Multimodal	Management	3,000	3,47
Cedar Lane: Marl Pit Rd. to Boyds Corner Rd.	NCC	ST	Multimodal	Management	11,781	14,06
Center Boulevard extended to Churchmans Rd	NCC	ST	Multimodal	Expansion	5,000	5,46
Delaware Avenue Extension to Marrows Rd	NCC	ST	Multimodal	Expansion	5,000	5,62
Delaware Avenue Separated Bicycle Facility	NCC	ST	Multimodal	Management	10,000	11,25
Eagle Run Road: SR 273 to SR 7 (complete road for thru traffic)	NCC	ST	Multimodal	Expansion	3,000	3,18
Garasches Lane	NCC	ST	Multimodal	Management	5,149	5,62
I-95, Carr Road and Marsh Road Interchange Improvements	NCC	ST	Multimodal	Management	5,022	5,32
Install street lighting, especially in neighborhoods and along Hickman Road.	NCC	ST	Multimodal	Management	2,000	2,38
King & Orange Streets, MLK Blvd. to 13th St.	NCC	ST	Multimodal	Management	6,250	6,63
Mill Creek Road and Stoney Batter Road Intersection (Highway Safety Improvement Program)	NCC	ST	Multimodal	Management	3,351	3,55
N412, Lorewood Grove Road, Rd 412A to SR 1	NCC	ST	Multimodal	Management	10,169	12,14
Naamans Rd / Philadelphia Pike access management (new signals at the spine road intersections; converting Alcott Avenue to right-in, right-out)	NCC	ST		Management	5,000	5,97
Old Baltimore Pike and Salem Church Rd Intersection	NCC	ST	Multimodal	Management	2,350	2,49
Possum Park Rd and Old Possum Park Rd Intersection Improvements	NCC	ST		Management	1,650	1,85
Ridge Road - change free right turn from Naamans Road to a vield, and improving EB Ridge Road lane merge approaching Analine Village using signs and pavement markings	NCC	ST	Multimodal	Management	6,000	7,1
Road A / SR 7 Improvements	NCC	ST	Multimodal	Expansion	11,047	12,07
Society Drive - all way stop or a roundabout at the Northtowne Plaza driveway/bus stop crossing	NCC	ST		Management	6,000	7,10
SR 2 / Red Mill Rd. Intersection Improvements	NCC	ST	Multimodal	Management	9,025	10,15

Draft 2050 RTP (12/13						
	County	Timeframe	Mode	Category	2018 Cost	YOE Cost
SR 273 / Harmony Rd. Intersection Improvements (Highway	NCC	ST	Multimodal	Management	4,175	4,56
Safety Improvement Program)				, j		
Support for shared ride services	NCC	ST		Management		7,16
Walnut St., Front St. to 3rd St. with sweep removal	NCC	ST		Management	3,721	4,44
I-295, Westbound from I-95 to US 13	NCC	ST	Road	Expansion	5,000	5,30
Valley Rd/Little Baltimore Rd/North Star Rd Intersection	NCC	ST	Road	Management	2,586	2,82
Continue connection to SEPTA bus services	NCC	ST	Transit	Management		1,19
Enhance bus service to station and Tri-State Mall site	NCC	ST	Transit	Management		1,19
New Castle County Transit Center	NCC	ST	Transit	Management		4,64
Newark Transit Amenities and Service Modification	NCC	ST	Transit	Management		1,1
Wilmington Transit Hub	NCC	ST	Transit	Expansion	10,000	10,6
New Castle County – Short Term		ST Total			181,151	206,10
DE 896: US 40 to Porter Road, Sidepaths	NCC	MT	Bike/ped	Management	3,000	4,2
East Coast Greenway: Claymont Station - Northern Delaware Greenway (2.25 mi)	NCC	MT	Bike/ped	Expansion	11,000	14,78
Naamans Road shared use pathway	NCC	MT	Bike/Ped	Management	6,000	8,5
Neighborhood connections pathway network (multiple projects)	NCC	MT	Bike/ped	Expansion	1,000	1,2
Newark Mid-block Pedestrian Crossing Improvements	NCC	MT	Bike/Ped	Management		1,4
Newark Pedestrian Improvements	NCC	MT	Bike/Ped	Management		2,8
Did Baltimore Pike: SR 72 to SR 273, Sidepath	NCC	MT	Bike/ped	Management	8,000	11,4
Red Clay Creek Greenway through Marshallton	NCC	MT	Bike/ped	Expansion	6,000	8,5
JS 13: US 40 to Tybouts Corner, Sidepaths	NCC	MT	Bike/ped	Management	7,000	9,9
JS 40: MD State Line to SR 896, Sidepaths	NCC	MT	Bike/ped	Management	8,000	11,4
JS 40: MD State Line to Sk 850, Sidepaths	NCC	MT	Bike/ped	Management		10,1
Churchmans Crossing Sidewalks & Bus Stop Improvements	NCC	MT		Management		7,1
Denny Rd/ Lexington Parkway Intersection	NCC	MT		-	5,000 750	1,0
				Management		
Explore access to future residential/marina east of Northeast	NCC	MT	Multimodal	Expansion	5,000	8,2
Corridor rail through adjacent Linde property	NCC	MT	Multimodal	Managament	8 000	11,4
Glasgow Ave Improvements Governor Printz Boulevard Road Diet	NCC	MT		Management		1,4
		MT		Management		
Maryland Ave. and Monroe Street	NCC			Management		9,8
Old Capitol Trail/ Newport Rd. Roundabout	NCC	MT		Management	3,201	4,5
Did Capitol Trail/ Stanton Rd. Roundabout	NCC	MT		Management		3,5
5. College Ave Gateway	NCC	MT		Management		2,0
Signal Coordination - S. College Ave	NCC	MT		Management		2,6
SR 2, Kirkwood Hwy / Harmony Rd.	NCC	MT		Management	5,500	7,8
SR 4, Harmony Road Intersection Improvements	NCC	MT	Multimodal	Management	750	1,0
SR 4, Ogletown Stanton Road/ SR 7, Christiana Stanton Road Phase 1, Stanton Split	NCC	MT	Multimodal	Management	900	1,2
support for shared ride services	NCC	MT	Multimodal	Management	5,000	9,5
JS 13: Duck Creek to SR 1	NCC	MT	Multimodal	Management	8,976	12,7
Nest Park Place Traffic Calming	NCC	MT	Multimodal	Management	2,500	3,5
Niggins Mill Road	NCC	MT	Multimodal	Management	2,450	3,4
Vilmington Traffic Calming; 12th St. Connector	NCC	MT	Multimodal	Management	8,000	9,8
Otts Chapel Rd/Welsh Track Rd Intersection	NCC	MT	Road	Management	200	2
New Castle County – Medium Term		MT Total			132,234	186,3
Glasgow Pathway: Porter Rd - Canal	NCC	LT	Bike/Ped	Management		7,4
JS 40: Newtown Trail & Pedestrian Improvements	NCC	LT	Bike/ped	Expansion	5,000	9,5
Harvey Road Traffic Calming	NCC	LT		Management	3,000	5,1
New Sweden Road Extension (South Wilmington)	NCC	LT	Multimodal		5,000	9,5
SR 4, Churchmans Road Intersection Improvements	NCC	LT		Management		11,8
SN 4, Churchinans Noau intersection improvements				-		5,1
Wyoming Rd and Marrows Road Access Management	NCC	LT	iviuitimodai	Management	3,000	5,1
	NCC	LI LT Total	Multimodal	Management	26 <b>,70</b> 4	48,7

### **Unfunded Aspiration Projects**

The projects outlined in the previous section expend much of the forecasted capital through 2050. A separate, longer list of projects awaits funding. These "aspiration" projects were identified in recent transportation studies, or by the Maryland and Delaware Departments of Transportation, and are considered relevant by WILMAPCO. Maps and a listing of the aspiration projects follow.

Aspirational projects have been scored using the WILMAPCO Project Prioritization Process. Additional, innovative sources of funding should be pursued to add the projects to the Constrained Project List based upon priority scores.



# Draft 2050 RTP (12/13/2018: \*final design pending\*



## Draft 2050 RTP (12/13/2018: \*final design pending\* List of Aspiration Projects

Project Name		Source Plan	Mode	Category	Technical Score	
East Coast Greenway - Cecil County Phase 3	СС	2003 East Coast Greenway Feasibility Study	Bike/ped	Expansion	9	
Perryville Train Station Parking Improvements	СС	2012 Perryville TOD Plan	Transit	Manageme nt	4	
US 40 Corridor and Intersection Improvements	СС	US 40 Plan - Cecil County	Multimoda I	Manageme nt	4	
North East Transit Hub/ Train Station	СС	2014 North East TOD Plan	Transit	Expansion	3	
Port Deposit Shared Ride Service	CC	2013 Port Deposit Transit Feasibility Study	Transit	Manageme nt	3	
Elkton Downtown Connector Streets & Streetscaping	CC	2011 Elkton TOD Plan	Multimoda I	Expansion	2	
Perryville Bicycle and Pedestrian Improvements	СС	2012 Perryville Greenway Plan	Bike/Ped	Expansion	2	
Perryville Connector Streets	CC	2012 Perryville TOD Plan	Multimoda I	Expansion	2	
Susquehanna River Pedestrian/Bicycle Crossing	СС	Other Bike/Ped	Bike/ped	Expansion	2	
Lower Susquehanna Heritage Greenway	СС	Lower Susquehanna Heritage Greenway Corridor Management Plan	Bike/ped	Expansion	1	
MD 275, Perrylawn Drive: MD 222 to MD 276 (divided highway reconstruct)	СС	Other Intersection / Road Improvements	Multimoda I	Manageme nt	1	
North East TOD Pedestrian Improvements	СС	2014 North East TOD Plan	Bike/Ped	Manageme nt	1	
Rolling Mill Rd. Bridge (2-lanes with sidewalks)	СС	2014 North East TOD Plan	Multimoda I	Manageme nt	1	
Cecil County Bicycle Plan Implementation	CC	2012 Cecil County Bicycle Master Plan	Bike/Ped	Expansion	0	
Chesapeake City Parking Plan Implementation	CC	2009 Chesapeake City Parking Plan	Multimoda I	Manageme nt	0	
MARC Maintenance Facility	CC	Rail	Transit	Expansion	0	
MD 213 / MD 282 Intersection	CC	Other Intersection / Road Improvements	Multimoda I	Manageme nt	0	
MD 213, Singerly Rd: North of Providence Rd. to MD 273, 2 lane reconstruction	СС	Other Intersection / Road Improvements	Multimoda I	Manageme nt	0	
MD 222, Bainbridge Rd: MD 275 to Bainbridge entrance, 2	CC	Other Intersection / Road	Multimoda	Manageme	0	
ane reconstruction		Improvements		nt		
MD 222, Perryville/Bainbridge Rd: US 40 to MD 276	СС	Other Intersection / Road Improvements	Multimoda I	Expansion	0	
MD 272/ North Main St. Intersection Improvements	СС	2014 North East TOD Plan	Multimoda I	Manageme nt	0	
MD 273, Telegraph Rd: East Limits of Rising Sun to Sylmar Rd, 2 lane reconstruction	СС	Other Intersection / Road Improvements	Multimoda I	Manageme nt	0	
MD 7, Philadelphia RdCecil Ave: East limits of Charlestown to MD 272, 2 lane reconstruction	СС	Other Intersection / Road Improvements	Multimoda I	Manageme nt	0	
MD 213: Frenchtown Road to US 40	СС	Other Intersection / Road Improvements	Multimoda I	Expansion	-1	
Newark Car-sharing Expansion	NCC	2011 Newark Transportation Plan	Bike/Ped	Expansion	25	
N. Chapel St. Underpass at Cleveland Ave	NCC	2011 Newark Transportation Plan	Multimoda I	Manageme nt	23	
Newark Downtown Parking Improvements	NCC	2011 Newark Transportation Plan	Road	Manageme nt	22	
Comprehensive truck signage	NCC	2017 Route 9 Corridor Master Plan	Trucks	Manageme nt	16	
Garasches Ln to Terminal Ave Extension Concept Study	NCC	2017 Route 9 Corridor Master Plan	Study	Expansion	16	

Project Name	County	Source Plan	Mode	Category	Technica
					Score
Illegal truck movement outreach and enforcement	NCC	2017 Route 9 Corridor Master Plan	Trucks	Manageme nt	16
Pigeon Point Rd Extension w/new I-295 interchange Concept Study	NCC	2017 Route 9 Corridor Master Plan	Study	Expansion	15
SR 273: I-95 to SR 1	NCC	Other Intersection / Road Improvements	Road	Manageme nt	15
Build industrial access road to future industry east of Northeast Corridor rail with new bridge over Naamans Creek	NCC	2017 North Claymont Area Master Plan	Road	Expansion	14
Construct new road from Alcott Avenue to spine road	NCC	2017 North Claymont Area Master Plan	Multimoda I	Expansion	14
Local Glasgow Circulator Roads - to include sidewalks and bicycle accommodations	NCC	2000 US 40 Plan	Multimoda I	Manageme nt	14
S. Walnut Street Bridge Area	NCC	Wilmington Initiatives Plan	Multimoda I	Manageme nt	14
Widen eastbound Naamans Road approaching Spine Rd (2 left turn, 2 through, 1 right turn)	NCC	2017 North Claymont Area Master Plan	Multimoda I	Expansion	14
Scotland Drive/US 40, Intersection	NCC	2000 US 40 Plan	Multimoda I	Manageme nt	13
Two-way traffic on 8th St between King & Walnut Sts	NCC	2010 Downtown Circulation Study	Multimoda I	Manageme nt	13
US 40, SR 72 to Salem Church Rd	NCC	2000 US 40 Plan	Multimoda I	Manageme nt	13
US 40: SR 896 to SR72	NCC	2000 US 40 Plan	Multimoda I	Manageme nt	13
Churchmans Road Extended, SR 2 to SR 4	NCC	1997 Churchmans Crossing Plan	Multimoda I	Expansion	11
I-95/DE 72 partial interchange - northbound entrance, southbound exit only	NCC	US 301 MIS	Road	Expansion	11
DE 1 southbound ramp/US 40 Intersection	NCC	US 40 Plan	Multimoda I	Manageme nt	10
Market Street: 11th to 16th Sts.	NCC	Wilmington Initiatives Plan	Multimoda I	Manageme nt	10
Port of Wilmington Truck Staging Area (site location undetermined)	NCC	2013 Port of Wilmington Truck Parking Study	Road	Manageme nt	10
Water St. East Extended (French St. to Front St.)	NCC	Wilmington Initiatives Plan	Multimoda I	Expansion	10
Water St. West: Shipley Street to West Street	NCC	Wilmington Initiatives Plan	Multimoda I	Manageme nt	10
Foulk Road Sidewalks	NCC	Other Bike/Ped	Bike/Ped	Manageme nt	9
Salem Church Rd: I-95 to US 40, Sidewalks	NCC	2000 US 40 Plan	Multimoda I	Manageme nt	9
Shipley Street Enhancements: 12th Street to MLK Blvd.	NCC	Wilmington Initiatives Plan	Multimoda I	Manageme nt	9
Southbridge Streetscape Improvements (Future Phases)	NCC	2008 Southbridge Circulation Study	Multimoda I	Manageme nt	9
SR 1 NB Ramp to US 40	NCC	2000 US 40 Plan	Road	Manageme nt	9
SR 72: US 40 to SR 71, Sidewalks	NCC	2000 US 40 Plan	Bike/ped	Manageme nt	9
Add Southbound lanes on Market St. between 2nd St and MLK Blvd.	NCC	2010 Downtown Circulation Study	Road	Manageme nt	8
Christina River Greenway	NCC	2006 New Castle County Greenway Plan	Bike/ped	Expansion	8
DE 7: US 40 to DE 71	NCC	2000 US 40 Plan	Multimoda I	Manageme nt	8

Project Name	County	Source Plan	Mode	Category	Technica
Clinton St Bicycle Plans	NCC	2009 Delaware City	Bike/Ped	Preservatio	Score 7
		Transportation Plan		n	
Cooch's Bridge/Old Baltimore Pike Greenway	NCC	2006 New Castle County Greenway Plan	Bike/ped	Expansion	7
Delaware City Pedestrian / Bike / Wayfinding mprovements	NCC	2009 Delaware City Transportation Plan	Multimoda I	Preservatio n	7
Delaware City Plan Regional Wayfinding	NCC	2009 Delaware City Transportation Plan	Multimoda I	Preservatio n	7
Emergency planning and implement flood mitigation	NCC	2009 Delaware City Transportation Plan	Multimoda		7
Mill Creek/Hockessin Greenway	NCC	2006 New Castle County Greenway Plan	Bike/ped	Expansion	7
Route 9 traffic calming, pedestrian facilities and bicycle anes	NCC	2009 Delaware City Transportation Plan	Multimoda	Preservatio n	7
JS 40 & Pleasant Valley Road Intersection	NCC	2000 US 40 Plan	Multimoda		7
Nashington Street Improvements	NCC	2009 Delaware City Transportation Plan	Multimoda		7
City of New Castle Intersections (SR9/3rd and SR9/6th & SR9/Delaware St)	NCC	1999 City of New Castle Transportation Plan	I Multimoda		6
Route 9; Reconstruct Ferry Cutoff as 4 lanes	NCC	1999 City of New Castle Transportation Plan	I Multimoda	Expansion	5
Airport Rd: Commons Blvd – I-95	NCC	New Castle County	Multimoda	Manageme nt	4
Buck Rd Sidewalk	NCC	New Castle County	Bike/Ped	Manageme	4
Grubb Road, SR 261: Foulk Rd. to Naamans Rd.	NCC	Brandywine Hundred Pedestrian Plan	Bike/Ped	Expansion	4
-95/ Chapman Road ramp	NCC	1997 Churchmans Crossing Plan	Road	Manageme nt	4
-95: MD Line to SR 1	NCC	I-95 MD Line to I-295 Program	Road	Expansion	4
Pike Creek Road Sidewalks	NCC	Other Bike/Ped	Bike/Ped	Manageme nt	4
SR 896: C & D Canal to US 40, Widening to 6 lanes	NCC	US 301	Multimoda		4
Reybold Road: SR 72 to Salem Church Rd	NCC	2000 US 40 Plan	Multimoda	Manageme nt	3
JS 40/ US 13 Interchange	NCC	2000 US 40 Plan	Multimoda	Manageme	3
Church Road: Wynnfield to SR 71	NCC	2000 US 40 Plan	Multimoda		2
Convert 1500 block of King St to two-way street	NCC	2010 Downtown Circulation Study	I Multimoda		2
Del Laws Road, Sidewalks	NCC	2000 US 40 Plan	Bike/ped	Manageme	2
Old Porter Road: Porter Road to SR 71	NCC	2000 US 40 Plan	Multimoda	Manageme	1
SR 52 and Snuff Mill Rd, Center Meeting Rd Intersections	NCC	2002 Centerville Village Plan	Multimoda		1
GR 72: Reybold to US 40	NCC	2000 US 40 Plan	I Multimoda		1
SR 896 Corridor Pathway (formerly Iron Hill Bikeway)	NCC	2006 New Castle County Greenway Plan	Bike/ped	Expansion	1
JS 13: Odessa Transportation Plan Implementation	NCC	Other Intersection / Road Improvements	Multimoda	Manageme nt	1
Philadelphia Pike: Naamans Rd - PA Line	NCC	North Claymont Area Master Plan	I Multimoda		0

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# **RTP DEVELOPMENT**

# [Need results of innovative outreach to write this section]

The contents of the present Plan were informed by many factors, agencies, and individuals. Chief among these was ensuring its compliance with current federal transportation requirements. This includes having a financially constrained and air quality-conforming project list. Performance measurement was also built into this Plan. We identify both relevant, nationally-required performance indicators with each action, and other deeper measures WILMAPCO uses.

Our progress in achieving previous RTP actions (documented in the 2017 Regional Progress Report, which is available in the appendix) was another major influence. Objectives and actions were revised, added, or removed, based on our performance.

Finally, feedback from our member agencies, local governments, civic representatives, and the public informed the Plan. A public opinion survey (available in the appendix) of 600 residents across our region was conducted to better understand transportation needs. Representatives from WILMAPCO also gathered feedback on draft versions of the RTP through an "Our Town" open house events held on February 7, 2018, and presentations given to dozens of civic and local government groups.

# \*\* DISCUSS EXTRA OUTREACH\*\*\*

This will be 2 pages for the section

