



DELAWARE PEDESTRIAN COUNCIL

STATUS REPORT

December 2020

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EXECUTIVE SUMMARY

The Advisory Council on Walkability and Pedestrian Awareness (also known as the Pedestrian Council) was reestablished in 2015, to help address concerns related to the high number of pedestrian fatalities; lack of awareness about pedestrian laws; and the desire to improve the walkability of the state.

The Pedestrian Council was charged with advising the Secretary of the Delaware Department of Transportation (DelDOT) on ways to make walking a safe, convenient, efficient, and comfortable means of transportation.

For the last five years, members of the Pedestrian Council and its three subcommittees worked on analyzing data, reviewing policies, developing recommendations, and raising public awareness to help improve pedestrian safety in Delaware. This report summarizes their accomplishments and recommendations.

The Pedestrian Council has worked tirelessly to meet the goals set forth by Executive Order 54. Moving forward, DelDOT should follow through in fully addressing the recommendations and, if necessary, create a working group to monitor their implementation.



INTRODUCTION

The Pedestrian Council was reestablished on October 12, 2015, to help address concerns related to the high number of pedestrian fatalities; lack of awareness about pedestrian laws; and the desire to improve the walkability of the state.

Executive Order 54, which was issued by Governor Markell, outlines the goals of the Pedestrian Council:

- "4. The Pedestrian Council shall advise the Secretary of DelDOT on the following issues, in an effort to make walking a safe, convenient, efficient, and comfortable means of transportation:*

 - a. Identifying gaps in the system of pedestrian paths and sidewalks in an effort to create a system of sidewalks and pathways that is continuous and interconnected;*
 - b. Providing advice regarding design standards for crosswalks, sidewalks and pathways ensuring ADA compliance;*
 - c. Providing advice regarding implementation of DelDOT's Sidewalk and Multi-Use Path Maintenance Policy;*
 - d. Reviewing traffic rules to help support a safe pedestrian environment;*
 - e. Providing advice regarding accessibility and connectivity in an effort to make transit a more viable option for all Delaware citizens; and*
 - f. Developing strategies for pedestrian safety education and awareness.*
- 5. The Pedestrian Council shall assist DelDOT with the periodic re-evaluation and implementation of the Statewide Pedestrian Action Plan and shall make recommendations regarding the prioritization of pedestrian infrastructure improvements especially within Level 1 and 2 Investment Areas."*

The Pedestrian Council consists of representatives from various state and local government agencies, nonprofit and advocacy groups, and other concerned members of the public. They first met on Jan 26, 2016 and have been meeting regularly. The following have served as Chairs and/or Co-Chairs from 2016 - 2020: Jonathan Kirch, American Heart Association; Jana Simpler, Office of Highway Safety; James Lardear, AAA; John Sisson, Wilmington Area Planning Council & Delaware Transit Corporation; Nicole Majeski, DelDOT; John McNeal, State Council

for Persons with Disabilities; and Jessica Welch, citizen representative with visual impairment.

The Pedestrian Council established three subcommittees to help accomplish their goals. The subcommittees are – Built Environment, Education and Enforcement, and Legislative and Policy. Chairs of the subcommittees asked stakeholders and subject matter experts to join each subcommittee, in order to provide input to the Pedestrian Council.

PEDESTRIAN DEATHS

Pedestrian deaths have risen dramatically across the country in recent years. The Governors Highway Safety Association (GHSA) reported in March 2020 that the nation's pedestrian deaths in 2019 were the highest in 30 years. Refer to <https://www.ghsa.org/resources/Pedestrians20> for the full report.

Delaware, in particular, is experiencing above average pedestrian fatality rates. The table below shows the percentage of pedestrian deaths against total traffic deaths in Delaware for the years 2007 through 2019¹. According to the same GHSA Report, the national average in 2018 was 17%.

Year	Total Traffic Fatalities	Pedestrian Fatalities	Pedestrian Deaths as Percentage of Total Traffic Deaths
2007	118	15	12.7
2008	122	22	18.0
2009	118	15	12.7
2010	103	22	21.4
2011	103	19	18.4
2012	116	30	25.9
2013	101	26	25.7
2014	125	27	21.6
2015	133	36	27.1
2016	120	27	22.5
2017	118	34	28.8
2018	111	24	21.6
2019	132	32	24.2

¹ From Jan 1 - Oct 31, 2020, Delaware reported 19 pedestrian deaths compared to 24 the same period in 2019.

KEY RECOMMENDATIONS

The Pedestrian Council made 17 recommendations to educate people on pedestrian safety; identify and fill in pedestrian network gaps; and improve walkability of the state. Below are the recommendations they made and what DelDOT has done so far to address them:

- 1** Revise the state's E-Crash Form so that it automatically prompts investigating officers to provide the pedestrian trip origin and destination (if known) for pedestrian crashes. DelDOT Traffic's Pedestrian/Bicycle Safety Working Group identified the need for this information. Engineers, planners and others are missing a critical piece of the puzzle when analyzing pedestrian crashes because of the absence of data on trip origins/destinations for pedestrians involved in crashes.

Status

This recommendation was completed in December 2016 through the Delaware Criminal Justice Information System (DelJIS). Police officers are now being automatically prompted to enter pedestrian origin and destination to E-Crash. DelDOT continues to monitor E-Crash data and works with the Delaware State Police to address data collection issues.

- 2** DelDOT will prioritize, fund and expand the Pedestrian Safety Audit Program to complete a minimum of three (3) corridor audits per year. Improvements shall be programmed into the Capital Transportation Plan (CTP) within one year following the completion of the audit. One or more representatives from the Delaware Transit Corporation shall participate in all Pedestrian Safety Audit Program site visits.

One of the strategies in Delaware's Strategic Highway Safety Plan to reduce pedestrian fatalities and serious injuries is to conduct pedestrian safety audits at high-crash locations.

DelDOT's crash data review identified principal arterial roadways in New Castle County with high concentration of pedestrian crashes. DelDOT Traffic Safety leads the safety audits, which include the following steps: review pedestrian & bicycle crash history along the corridor; perform pedestrian observations & counts; compile existing data, including pedestrian facilities (sidewalk, pedestrian signals, etc.), bus stop locations and ridership data, roadway facilities

One of the strategies in Delaware's Strategic Highway Safety Plan to reduce pedestrian fatalities and serious injuries is to conduct **pedestrian safety audits** at high-crash locations.

(channelization, lighting, etc.), and vehicular and pedestrian volumes; develop existing condition maps; conduct walking tour of corridor with stakeholders; perform additional analysis to evaluate potential improvements (short and long-term); and present improvements to stakeholders for concurrence. This recommendation is to expand the program to ensure that all high-crash corridors are evaluated and to also consider corridors with similar characteristics in order to prevent pedestrian crashes along these corridors from increasing.

Status

In 2013, DelDOT's Traffic Section formed the Pedestrian/Bicycle Working Group which was tasked with developing recommendations to improve pedestrian and bicycle safety across the state with a main focus on improving pedestrian safety. The group began performing pedestrian/bicycle safety audits along corridors where there were higher than average rates of pedestrian related crashes, typically multilane divided highways with high levels of commercial land use. Since 2013, twelve audits have been conducted, including two that were conducted prior to the formation of the Pedestrian/Bicycle Working Group. Some audit recommendations have been completed and implemented and others are in either design or planning phase or being considered further. Information regarding each of the pedestrian safety audits can be found on DelDOT's website at https://deldot.gov/Programs/DSHSP/index.shtml?dc=pedestrian_safety.

Below is a brief summary of where pedestrian/bicycle road safety audits have been conducted:

Location	Beginning Point	Ending Point	Audit Completed	Summary of Recommendations
US 13	Saienni Blvd	SR 273		New crosswalks across US 13; additional sidewalk; median fencing; roadway lighting; Capital Project from US 13/US 40 split to Memorial Drive.
US 40	Buckley Blvd	US 13/US 40 Split	April 2009	
SR 273	Marrows Road	US 13	September 2011	Intersection lighting; additional crosswalks across SR 273; bus stop improvements; additional sidewalk.
SR 1 (Lewes/Rehoboth Beach)	Dewey Beach	Nassau Bridge	January 2014	Additional sidewalk; new crossings on SR 1; HAWK signals; roadway lighting.

SR 2	St. James Church Road	SR 141	January 2015	New crosswalks across SR 2; conversion of half signals to full signals; additional sidewalk; roadway lighting.
US 13	SR 273	Market St./Walnut St. split	August 2015	New crosswalks across US 13; sidewalk; median fencing; roadway lighting; recommended large capital project.
SR 48	West Court Drive	North DuPont Road	April 2016	Pedestrian access route improvements; HAWK signal; bus stop improvements.
US 202	Naamans Rd	Rocky Run Parkway	January 2017	Pedestrian access route improvements; pedestrian improvements at signalized intersections.
US 202	Rocky Run Parkway	Brandywine Parkway	January 2017	Pedestrian access route improvements; median fencing; additional signalized pedestrian crossings at existing intersections.
Philadelphia Pike	Lea Blvd.	DE/PA State Line	January 2018	Roadway lighting; signing and marking improvements, road re-configuration.
US 202	Whitby Drive	Righter Parkway	June, 2018	Pedestrian access route improvements; pedestrian improvements at signalized intersections; transit improvements; roadway lighting.
US 40	SR 72	Buckley Blvd	April, 2019	New crosswalks across US 40; new signal at Rickey Blvd; median fencing; additional sidewalk; roadway lighting.
SR 1 (Dewey Beach)	Anchor Way	Bayard Avenue	April, 2019	Pedestrian access route improvements; installation of Rectangular Rapid Flash Beacons (RRFB), bus stop improvements.

US 13	Puncheon Run Connector	Scarborough Road	April, 2020	New crosswalks across US 13; new signal at DSP HQ; additional sidewalk; median fencing; roadway lighting; bus stop improvements.
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Pedestrian safety audits being conducted as of October 31, 2020:

- SR 54 (Lighthouse Road) from SR 20 to SR 1, Sussex County
- City of Wilmington – this is the first attempt at evaluating pedestrian crashes and recommending pedestrian safety improvements across an entire jurisdiction

3 Recommend that DelDOT develop guidance and design standards for pedestrian median and sidewalk barriers and prioritize locations for their use. Median barrier or sidewalk fencing to deter pedestrians from crossing at inappropriate locations has been identified as a long-term recommendation in DelDOT's Pedestrian Safety Audits for after other improvements have been completed. Other states have tried barrier/fencing at similar high-crash locations, where other engineering improvements have also been made to improve the safety and accessibility of controlled crossings and to enable pedestrians to safely reach these crossing locations. However, there are no guidance or design standards for them, or a process to prioritize locations for their use. Considerations such as context sensitive design and crashworthiness need to be included.

Part of US13 in New Castle included in a major pedestrian safety improvement project.



Status

In 2017, DelDOT completed a study to install barriers and other safety treatment on a high pedestrian crash stretch of US13 in New Castle - from Route 40 to Memorial Drive. The project moved forward to design in 2018 and DelDOT has allocated \$26 million for construction which is scheduled to start in 2023. Aside from median fencing, the project will include additional signalized crosswalks, corridor lighting, ADA curb ramp upgrades, installation of missing sidewalk links, relocation and/or consolidation of transit stops, signing and striping, etc.

Other options are also being explored, such as installation of bushes/landscaping or simply not mowing the grass.

4 Adopt the revised bus stop policy being prepared by the Delaware Transit Corporation that contains the following language:

- a. A joint DelDOT Traffic/DTC engineering review shall be undertaken for any proposed new bus stops along multilane commercial highways that are located more than 200 feet from a signalized crosswalk to determine the appropriate means of crossing pedestrians across the highway at the midblock bus stop location before the new bus stop is constructed.
- b. If data indicates that an existing bus stop generates midblock crossings, DTC and DelDOT will make every effort to move the bus stop to a safer location within the near vicinity or provide a safe, accessible midblock pedestrian crossing at the site of the bus stop.
- c. DelDOT Traffic's Pedestrian/Bicycle Safety Working Group identified a correlation between locations of pedestrian fatal crashes and high numbers of transit users getting on and off buses. Anecdotal evidence exists of bus passengers being involved in pedestrian crashes. Additionally, DTC's Bus Stop Policy has not been revised since 2000. Reviewing the policy could be an opportunity to make possible pedestrian-safety motivated revisions to ensure safe access for pedestrians, safe pull-offs for buses, and not promoting mid-block activity.

Status

The revised bus stop policy was completed in May 2017.



Transit riders at a bus stop on US13 in New Castle.

- 5** Update department's sidewalk maintenance policy to include a schedule of inspection. Dedicated funding and resources shall be made available for maintenance and repair of on and off-road DelDOT bicycle and pedestrian facilities.

One thing that DelDOT does well is measuring road conditions and DelDOT has a robust maintenance model in its handling of roadway maintenance. Parity of pedestrian facilities is needed, with dedicated staffing, funding, and other resources to maintain those pedestrian facilities that DelDOT is responsible for.

Status

DelDOT conducted an inventory of state-maintained sidewalks several years ago through its Pedestrian Access Route Program (PAR). The sidewalks were reviewed for ADA compliance and were mapped accordingly. The map is regularly updated as new sidewalks get completed and old ones repaired/upgraded to current standards. Right now, the process of updating this map is tedious because it is done manually. However, a mobile app is now being developed that would enable responsible DelDOT personnel to make immediate updates to the map while on the field conducting inspections.

In 2018, DelDOT created a Sidewalk Committee composed of representatives from different sections. The committee is developing strategies for ranking sidewalk construction and/or repairs.

6 Recommend that DelDOT complete and implement the ADA Transition Plan in accordance with FHWA requirements.

DelDOT is working on finalizing and obtaining Federal Highway Administration approval of its ADA Transition Plan. DelDOT has an obligation to alleviate all of the non-compliant features within its right-of-way. This recommendation is to prioritize the resources necessary to implement the Plan.

Status

The ADA Transition Plan was completed and approved by the Federal Highways Administration on July 3, 2018.

7 Adopt a Complete Streets Implementation Plan that contains the following:

- a. More specific recommendations related to development projects, including requirements for developers along multilane commercial corridors to provide necessary pedestrian safety infrastructure to prevent midblock crossings from occurring due to development of specific parcels. Requirements for non-motorized safety improvements on these corridors will be provided by the Safety Programs Manager or designee.
- b. More specific recommendations related to school projects.
- c. Improved guidance regarding the selection of design speeds for non-freeway classified roadways that promote slower vehicular speeds and more compatibility with non-motorized road users.
- d. In the section “New Roads, Road Expansion & Roadway Redesign Projects”, add the following policy direction: “Widening projects will strongly consider and include as appropriate all pedestrian safety countermeasures including but not limited to signalized crosswalks, lighting, well placed bus stops and barriers to discourage pedestrian crossings at inappropriate locations.”
- e. More specific requirements for Department projects to extend the limits of Capital projects to include key pedestrian origins and destinations, if necessary, to ensure that these origins and destinations are connected seamlessly to safe pedestrian road crossing infrastructure.

- f. In addition, DelDOT will offer, on an annual basis, training regarding Complete Streets for DelDOT and/or Municipal design, construction, maintenance staff and consultants. DelDOT will define staff required to take this training. DelDOT's Complete Streets Policy has been in effect since 2010. However, the Complete Streets Implementation Plan is still being finalized. This recommendation is based on the fact that mid-block crashes on multilane commercial highways account for most pedestrian fatalities in Delaware. Additionally, it needs to be recognized that high speed roads are generally incompatible with pedestrian safety and comfort. The Built Environment Subcommittee also approved the training recommendation, in order to ensure that all persons tasked with implementing capital projects are aware of the policy, implementation plan, and best practices.

Status

DelDOT adopted its Complete Streets Policy on January 6, 2010 to provide safe mobility to all road users – including bicyclists, pedestrians, transit riders and motorists. Complete Streets Policy requires that different modes of transportation be incorporated in the planning and design of roadways, whether new construction or retrofit. Private developers are also required to follow this policy. Depending on the location, DelDOT's Development Coordination Manual requires that developers requesting access to state-maintained roads include both motorized and non-motorized users in the design and construction of their projects. The Complete Streets Implementation Plan is still in draft form.

A Complete Street is designed to provide safe mobility to all users including bicyclists, pedestrians, transit riders, and motorists.



- 8** To reduce time and difficulties encountered when DelDOT reconstructs existing public use pedestrian facilities crossing private property, amend Delaware Code to grant DelDOT the power and authority to temporarily trespass on private property to reconstruct existing public use pedestrian facilities to a contemporary standard.

Currently, DelDOT has powers and authority to grant access to the public roadway network; has power and authority to require pedestrian facilities in the public right of way during development coordination or public works permitting activities; and has the power of eminent domain to acquire property rights for public purposes. Over the course of time pedestrian facilities have been constructed in the public right of way and standards for pedestrian facilities have evolved. DelDOT has a responsibility to the pedestrian in the public right of way and is leveraging as many resources as possible to bring pedestrian facilities to contemporary standards. When DelDOT has a proposed project, such as an alteration (pavement rehabilitation) project, DelDOT desires to remedy as many non-compliant pedestrian features as possible. When DelDOT desires to remedy pedestrian features, this may temporarily affect private property owner rights. A typical process when trespassing on private property would involve a right-of-way acquisition phase which can create challenges even though the end result is a modern pedestrian facility in the public right-of-way.

Status

A review of the Delaware Code revealed that DelDOT already has the authority to enter onto private land to repair and reconstruct existing facilities [17DE.C. §132(c)(13)]. Roadways, where the sidewalks are a concomitant or subsidiary element of the roadway, that have been used by the public and maintained at the public expense for 20 years can no longer be deemed private. They are deemed public roads [17DE.C. §509]. As a courtesy, DelDOT will provide written notice to the land owner prior to entering the property

In 2018, DelDOT issued two Design Guidance Memoranda on this topic: DGM 1-1 Right-of-Way Verification gives guidance to designers on the level of right-of-way verification needed for different types of projects, and DGM 4-1 Right to Enter Guidance and Limitations establishes procedures to follow when entering private property to maintain, repair, and reconstruct public use facilities.

Recently filled sidewalk gap along South Little Creek Road in Dover.



- 9** DelDOT Planning liaisons with each local land use agency, should promote non-motorized road user safety and accessibility concerns with the land use agency when reviewing development of parcels along roads and work to incorporate necessary developer improvements to promote safe non-motorized movements.

The purpose of this recommendation is to improve DelDOT coordination with local land use agencies and to provide additional guidance to DelDOT's Development Coordination section regarding its role in implementing the Department's Complete Streets Policy.

Status

The counties require developers to have their plans reviewed and approved by DelDOT before they can be issued permits. Following the Delaware Strategies for State Policies and Spending, DelDOT's Development Coordination Section requires that developments under Levels I and II provide shared-use-paths/sidewalks or if this is not feasible, to pay a fee-in-lieu. DelDOT sets aside these fees-in-lieu for use in constructing pedestrian facilities in other places. Developments under Levels III and IV are required to provide SUPs/sidewalks if they abut an existing facility or if the proposed project will generate 2000 or more Average Daily Trips.

DelDOT's Bicycle and Pedestrian Coordinators review all plans to make sure the required bicycle and pedestrian facilities are present. They review hundreds of plans every year.

Additionally, DelDOT is working with communities, municipalities and counties to establish Transportation Improvement Districts (TID). A TID is a defined geographic area where land use and transportation needs are planned in detail in advance. Developers pay a pre-determined fee to ensure that necessary transportation infrastructures are built as development happens. As of October 2020, DelDOT has four working TIDs – 3 in Southern New Castle and 1 in Sussex County.



DelDOT Secretary Jennifer Cohan and Sussex County President Michael Vincent sign a Memorandum of Understanding on October 27, 2020 for the management of the Henlopen Transportation Improvement District.

10

DelDOT create a method of publicly tracking and recording progress on implementing the Complete Streets Policy and reporting on waivers granted. DelDOT's Complete Streets Policy and draft implementation plan reference a waiver process and also suggest that data be collected on DelDOT's efforts to implement the policy. This recommendation is to implement these elements and provide a public tracking and reporting method.

Status

There is a waiver process that DelDOT project managers follow when compliance to Complete Streets Policy is technically infeasible or when it is unreasonable to meet full compliance. The waiver process requires approval from plan reviewers, Division Directors and the Chief Engineer. Project managers are required to document the entire process and these documents are available to the public upon request.

11

There should be one section, with appropriate resources (e.g. staffing, funding, etc.), within DelDOT that coordinates various programs to ensure that gaps in the bike and pedestrian networks are filled and resources are maximized. This section shall be responsible for ensuring project limits include key origins and destinations and are connected to the network at logical termini.

While DelDOT has an approved Complete Streets Policy and Pedestrian Accessibility Standards, DelDOT staff with multi-modal expertise and responsibilities are scattered within the agency and are often not included in project scoping decisions or Department plan reviews until the later phase. Additionally, there is the need to keep pedestrian facility inventory information updated and to improve project coordination.

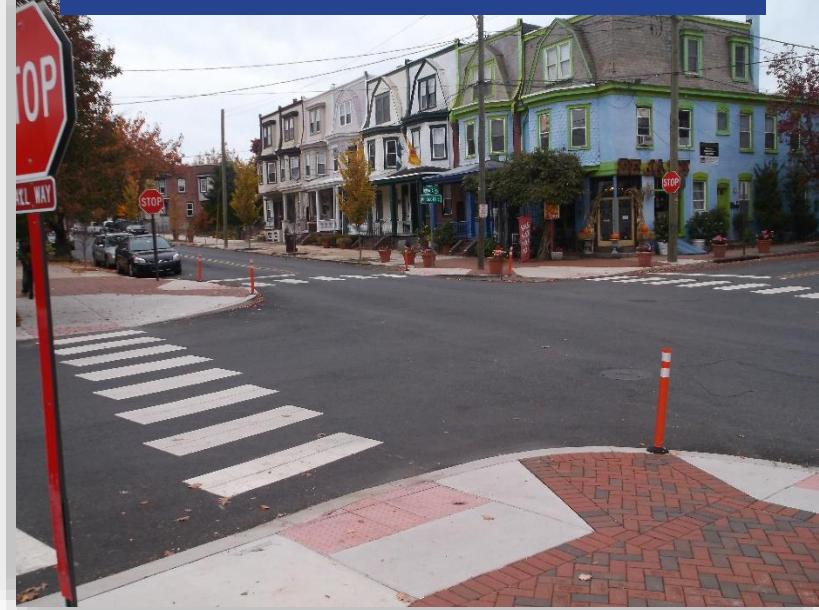
Status

DelDOT has a bicycle-pedestrian section under the Division of Planning that manages three programs – Transportation Alternatives Program (TAP), Trails and Pathways, and Pedestrian Access Routes Program (PAR). The focus of all three programs is to improve bicycle and pedestrian network across the state. TAP is a community-driven program that requires project sponsors and 20% match to construct projects. Trails and Pathways focuses on building pedestrian and bicycle facilities such as bicycle trails and routes, sidewalks, and shared-use-paths. PAR Program on the other hand is to convert non-compliant pedestrian facilities to acceptable standards.

Transportation Alternatives Program, Trails and Pathways, and Pedestrian Access Routes Program are just three of the programs that deal with bicycle and pedestrian projects within DelDOT.

Transportation Alternatives Project in Wilmington.

The staff of the bicycle-pedestrian team includes the Bicycle and Pedestrian Coordinators who provide expertise in reviewing plans for both DelDOT and private development projects. They also review and provide input to plans submitted by private developers through DelDOT's Development Coordination Section. They make sure that bicycle and pedestrian facilities are incorporated in all projects and that they meet standards.



12 Recommend that DelDOT work with Delaware State Police, local law enforcement, Office of Highway Safety, and others to develop and conduct a "Share the Road Safety Class" and that the Pedestrian Council endorse the class as an educational supplement to pedestrian ticketing.

Based off a similar program in Portland, Oregon, that targets pedestrians, bicyclists, and vehicle drivers that are ticketed for various offenses related to pedestrian safety. This class is a one-time opportunity for offenders to have their tickets dismissed in exchange for an educational experience on how non-motorized and motorized users of the roadways should interact with each other. The class is sustained through a small fee, much cheaper than the overall cost of a ticket. Portland officials have considered their program to be successful, although it is mostly targeted at bicyclists. This class would be voluntary for individuals ticketed.

Status

This project was referred to the University of Delaware's Institute of Public Administration for further investigation. Funding for the study will be made available through the State Planning and Research (SPR) Program.

13 Recommend that DelDOT establish and use data-driven thresholds for targeted outreach to specific schools regarding the Safe Routes to Schools program.

As of now, Safe Routes to Schools improvements work on a voluntary basis or through some other improvement system. This recommendation is to establish data sets that would assist schools in determining if they have a pedestrian issue. This would allow DelDOT to create a greater sense of urgency for needed improvements. Although ineligible for Safe Routes to Schools, this program could be expanded to high schools and universities.

Status

Safe Routes to School Program (SRTS) was created and funded in 2005 by the federal government through the Safe, Accountable, Flexible, and Efficient Transportation Act: A Legacy for Users (SAFETEA-LU). This was replaced in 2015 with Fixing America's Surface Transportation Act (FAST) which no longer provides funding for SRTS. DelDOT is exploring ways to keep the program going by utilizing other funding sources. This recommendation will be pursued pending the availability of funding and manpower.



Annual Walk to School Day at Downes Elementary School in Newark. Events like this provide opportunity to promote pedestrian safety among school-aged children.

14 Recommend that DelDOT work with the Office of Highway Safety, Department of Education, and school districts to conduct crossing guard training prior to each school year and that the Pedestrian Council endorse the recommendation that crossing guard training be required on an annual basis for all non-law enforcement crossing guards in Delaware.

Through conversations with AAA Mid-Atlantic and with DelDOT, it was clear that there was a gap in training for crossing guards in Kent and Sussex Counties. It is important that crossing guards know the responsibilities of being a crossing guard and can become the prime educator for teaching children how to cross the road properly. Very few school districts in these two counties have participated in free training for crossing guards, and when asked to participate earlier this year, many were non-responsive. By making training mandatory, this will eliminate this need.

Status

AAA conducted its first crossing guard training in Kent County at the Caesar Rodney School District on April 13, 2018. The plan is to conduct more of this in the future.

15 Recommend that DelDOT work with the Office of Highway Safety, Department of Education, and school districts to consider including pedestrian safety education for school aged children. Children 5-9 years old rank as one of the most common age groups to be hit and injured by a vehicle in Delaware. Most of these crashes are on low speed roadways limiting the severity of the injury. This is to help teach children at a younger age the proper way to behave on/around roadways.

Children **5-9 years old** rank as one of the most age groups to be hit and injured by a vehicle in Delaware

Status

Members of the Education and Enforcement Subcommittee reached out to Delaware students, teachers and parents at different events. They distributed brochures and reflective items and talked about the importance of pedestrian safety. A portion about pedestrian safety was also included in the Driver Education curriculum.

16 Recommend that section 3.2.14 of the Defensive Driver curriculum be amended from its current language of “Pedestrian” to read “Pedestrians, including pedestrian safety, yielding to pedestrians, White Cane Law, and active traffic devices for pedestrian crossing such as HAWK signals and Rectangular Rapid Flashing Beacons.”

The current curriculum for defensive driving courses had a one-word statement of “pedestrians”, which meant that any education involving pedestrians would be extremely limited. With new laws involving vulnerable users, White Cane Law, as well as pedestrian dedicated traffic signals, it is important that Delaware’s drivers be educated on how they operate.

Status

These proposed changes to the Delaware Administrative Code are awaiting public review and adoption.

17 Recommend upon request that the annual Pedestrian Council budget consider including pedestrian safety and educational materials.

Conspicuity Enhancement is an effective, science-based traffic safety countermeasure for reducing pedestrian crashes. The purpose of enhancing conspicuity for pedestrians is to increase the opportunity for drivers to see and avoid pedestrians, particularly at night. Pedestrians who are more visible are less likely to be struck. In accordance with Delaware’s Strategic Highway Safety Plan, the Delaware Office of Highway Safety has an implementation strategy in place to distribute retro-reflective materials as part of pedestrian safety and educational campaign efforts. This recommendation is for the Pedestrian Council to assist OHS by providing funding for these giveaway items.

Status

The Pedestrian Council purchased pedestrian safety informational materials and reflective items that were distributed to state troopers, homeless shelters, libraries, and the general public.



OTHER KEY ACCOMPLISHMENTS

Pedestrian Safety Awareness Month

The Pedestrian Council worked with the Office of Governor John Carney Jr. to recognize October as Pedestrian Safety Awareness Month in Delaware. The Pedestrian Council chose the month of October because Delaware usually sees a spike in pedestrian fatalities in October as the days begin to get shorter and pedestrians become more vulnerable on the roads. October is also the month designated for Walk to School Day (1st Wednesday of October) and White Cane Day (October 17th).

Partnership with Homeless Shelters

Recognizing that most homeless or transient individuals are walkers, and that a number of pedestrian fatalities were homeless or transient individuals, the Education and Enforcement Subcommittee of the Pedestrian Council partnered with homeless shelters in the state to conduct pedestrian safety events.

Subcommittee members, together with officers from the Delaware State Police (DSP), visited the Sussex Code Purple in Seaford and the Dover Interfaith Mission for Housing to talk to homeless individuals about safety tips while walking and driving. The Seaford Police Department was also present in the Sussex event.

Talking to the homeless provided valuable insights for future outreach endeavors. Subcommittee Members found out that the homeless favor wearing dark colored clothing at night because they want to blend in with



the environment while looking for a place to sleep. If someone wants to reach out to them during the day when shelters are closed, many are at libraries and transit centers.

Targeted Public Outreach

Following the lead of the Office of Highway Safety (OHS), the Education and Enforcement Subcommittee conducted targeted outreach along high pedestrian fatality corridors and at various sports and safety events.

An event was conducted in front of Goodwill-Claymont along Philadelphia Pike on October 17, 2019 where Subcommittee Members talked to passing pedestrians on how to be safe. Philadelphia Pike has a history of high pedestrian crashes and fatalities. In 2019 alone, two pedestrians died along this corridor. In the three hours that Subcommittee Members were there, they witnessed at least 35 pedestrians crossing midblock on Philadelphia Pike near the intersection of Harvey Road.

DelDOT completed a pedestrian audit of Philadelphia Pike in 2019 and recommended some short-term fixes including additional crossing signs, lighting, and restriping crosswalks. As a long-term solution, a road diet is recommended.

Pedestrian Safety Campaigns were also conducted at the following:

- Governor's Cup 5K, October 17, 2017 and October 15, 2019 at the Governor's Mansion in Dover
- Delaware Middle Schools Cross Country Championship, October 25, 2017, October 24, 2018 and October 23, 2019 at the Browns Branch County Park in Harrington
- Safe Summer Day, June 9, 2018 and June 8, 2019 Brecknock Park in Camden



Reflective Items and Educational Materials.

Seventy percent of pedestrian deaths in Delaware occurred under dark conditions. A study conducted by Federal Highway Administration (FHWA) in 2011 showed that using retro-reflective materials at night is very important and that wearing white clothing is not enough.

The study showed that pedestrians wearing white or light-colored clothing are not visible to drivers until they are well within 200 feet. A driver travelling at 60 MPH needs 260 feet to stop safely. Pedestrians wearing dark colored clothing at night are first seen at a distance of 55 feet – giving drivers less than one second reaction time.

Reflective materials are more visible at night because instead of absorbing light, they reflect light back. Pedestrians wearing reflective materials can be first seen at 500 feet. The Pedestrian Council purchased reflective materials that were handed out at the pedestrian safety events. Some were also given to law enforcement officers for handing out to pedestrians walking at night.

Council and subcommittee members seized every opportunity to educate the public on how to make walking safer for everyone. Their message consisted of the following:

What can you do to stay safe as a pedestrian?

- Cross at crosswalks or cross roads with signals and take the time to cross safely;
- Never dart out;
- When walking at night, use a flashlight or reflective items;
- Use sidewalks when available;
- When sidewalks are not available, walk facing traffic.

What can you do as a driver?

- Yield to pedestrians;
- Slow down in heavily traffic pedestrian areas;
- Always keep an eye out for pedestrians.



CONCLUSION

The Pedestrian Council was reestablished with the purpose of advising the Secretary of DelDOT on ways to make walking a safe, convenient, efficient, and comfortable means of transportation. Its diverse membership was helpful in offering different perspectives in the areas of engineering, education and enforcement.

For the past five years, they have met regularly – analyzing data pertaining to pedestrian crashes, pedestrian and driver behavior, and also sidewalk networks across the state. They reviewed traffic rules and provided advice regarding implementation of DelDOT's Sidewalk and Multi-Use Path Maintenance Policy, DTC's bus stop policy and identified gaps in the state's E-Crash reporting system.

They held discussions with various parties including DelDOT engineers, project and program managers, persons with disabilities, law enforcement officers, educators, homeless shelter volunteers and guests, and many others. They reviewed existing programs and developed recommendations to help improve the condition of the pedestrian network and reduce pedestrian injuries and fatalities in Delaware.

While the Pedestrian Council is not satisfied because pedestrian fatalities have not been eliminated, the state has taken important steps in addressing the problem and making the transportation system safer and more accessible for pedestrians.

The Pedestrian Council has worked hard to fulfill the original focus and goal of providing advice to DelDOT as stated in Executive Order 54. It even went above and beyond and embarked on public campaigns for pedestrian safety awareness the most notable of which is designating October as Pedestrian Safety Awareness Month.

DelDOT should continue to work to fully address the recommendations and monitor their implementation. Moving forward, efforts should shift to safety and connectivity and incorporate the focus areas identified in the updated Strategic Highway Safety Plan to further address how we can prevent pedestrian fatalities from occurring. It is imperative to strengthen partnership with local land use agencies to ensure that connection between developments and pedestrian networks are incorporated.

A stakeholder group with an expanded membership of those who will be involved in implementing these recommendations and the Strategic Highway Safety Plan should be developed as to collectively work to improve safety and connectivity for pedestrians.

PEDESTRIAN COUNCIL AND SUBCOMMITTEE MEMBERS

2016-2020

Helen Arthur, DHSS (PC, EE)
David Bartoo, DNREC (PC, BE)
Marsha Carson, Department of State (PC)
Jennifer Cohan, Secretary, DelDOT (PC)
Brian Clarke, (BE, EE)
Darlene Cole, DHSS (EE)
Lt. Tracy Condon, DSP
Matt Cox, (BE, EE)
Douglas Denison, Department of State (PC)
Lauren Devore, Sussex County (PC, EE)
Jim Galvin, Dover-Kent MPO (BE)
Bernie Gilbert, DelDOT (BE)
Ken Grant, AAA (PC, EE, LP)
Peter Haag, DelDOT
William Jiron Jr., Appointed by the Governor (PC)
Jared Kauffman, DTC (BE)
Richard Killingsworth, DHSS (PC)
Jonathan Kirch, American Heart Association (PC)
Richard Klepner, Office of Highway Safety (PC, EE, LP)
Chip Kneavel, DelDOT
Jim Lardear, AAA (PC, LP)
Mark Luszcz, DelDOT (BE, LP)
Reed Macmillan, Dover-Kent MPO (PC)
Nicole Majeski, Deputy Secretary, DelDOT (PC)
Jackie McDermott, Office of Highway Safety (PC)
Charles McLeod, Department of State/DelDOT (PC, LP)
Susan Moerschel, DNREC (PC)
Barbara Monaghan, Developmental Disabilities Council (PC)
John McNeal, State Council for Persons with Disabilities (PC)
Paul Moser, DelDOT (BE)
Tom Nickel, DelDOT (BE, LP)
Linda Osiecki, DelDOT (BE, EE)
William Payne, Care Giver, Appointed by the Governor (PC, EE)
Louie Phillips, American Heart Association (PC, EE)
Tina Shockley, Department of Education (PC)
Jana Simpler, Office of Highway Safety (PC)
John Sisson, WilMAPCO/DTC (PC, BE)
Richard Vetter, Dover-Kent MPO (PC, BE)
Michael Wagner, Department of Education (PC, EE)

Jennifer Walls, Sussex County (PC, BE)
Amy Wilburn, Citizen Representative
James Wilson, Bike Delaware (LP)
Todd Webb, DelDOT (PC, BE)
Adam Weiser, DelDOT (BE, LP)
Jessica Welch, Citizen with Visual Impairment, Appointed by the Governor (PC)
Jamie Wolfe, State Council for Persons with Disabilities (PC)
Debra Young, Empowerability (BE)
Tigist Zegeye, WILMAPCO (BE)

Administrative Support

Maria Andaya, DelDOT
Anthony Aglio, DelDOT
Farzana Atique, McCormick Taylor
Drew Boyce, DelDOT
Sarah Coakley, DelDOT
Annie Cordo, Deputy Attorney General
Marc Cote, DelDOT
Ken Feaster, Deputy Attorney General
Jeff Niezgoda, DelDOT

Legend:

PC = Pedestrian Council
BE = Built Environment Subcommittee
EE = Education and Enforcement Subcommittee
LP = Legislative and Policy Subcommittee