

WILLS EYE HOSPITAL
COMMUNITY HEALTH NEEDS ASSESSMENT
IMPLEMENTATION PLAN

FY 2023

The FY2023 Implementation Plan will focus on the following vision health needs identified from the Community Health Needs Assessment conducted in 2022 (in order of priority):

1. Low awareness of vision threatening conditions and associated risk factors and the importance of routine eye exams
2. Creating a sustainable model for vision screenings and adherence to follow-up care in community centers in underserved areas
3. Routine pediatric vision screenings in children under 17 and low adherence to obtain glasses or follow-up care with a pediatric ophthalmologist
4. Lack of city-specific data on eye and vision health for residents of Philadelphia

Priority #1: *Low awareness of vision threatening conditions and associated risk factors and the importance of routine eye exams*

Annual eye screenings allows for the monitoring, detection and management of sight threatening eye disease such as diabetic retinopathy, age-related macular degeneration, glaucoma, and cancer/tumors. Early detection and timely treatment of eye disease can often delay or prevent severe vision loss. Diabetic eye disease is one sight threatening disease that causes blindness without any initial symptoms. Often times, when someone realizes their vision is being impaired by diabetic eye disease it is too late to repair. Routine eye screenings provides a level of eye care particularly for populations with high prevalence of disease, and allows for the identification and prompt referral of individuals for evaluation and management of their eye health. Additionally, eye screening events or appointments provides an opportunity to educate the general public and target audiences on vision threatening diseases and associated risk factors by providing educational pamphlets and materials in several different languages and literacy levels to help educate as many people as possible.

Specific Goals addressing Priority #1 for FY2023:

The goals for FY2023 are to raise awareness of vision threatening diseases such as diabetic eye disease by screening high risk patients, educating patients on preventive care and risk factors and connecting patients with appropriate follow up care. To address these goals we will:

- Partner with Keystone First to screen their members for diabetic eye disease. We aim to host three clinics this year, with an estimated 50 patients per clinic, with the goal of helping 150 patients this year through these screenings.
- Establish and host “Wills Eye on Diabetes Day”, a one day event for diabetics in the community to be screened for diabetic eye disease at no cost. This day will also be used to educate diabetics on healthy living, provide resources for insurance, and preventive care. Free follow up care will be offered to patients who don’t have insurance and test positive for eye disease.
- Educate the next generation about the importance of the field of ophthalmology and eye and vision care by working with adolescent mentoring programs or job fairs and exposing adolescents to the colligate and non-colligate career opportunities in ophthalmology.
 - In partnership with The Courtyard Mentor Network, a program that mentors young adolescent black males on different career paths and helps guide them in fulfilling their goals, Wills Eye will host 5 student interns from this program the summer prior to entering their first year in high school.
 - The interns will work in various different parts of the hospital two days a week. Tasks such as filing, creating charts, and greeting patients, will teach them about accountability while also keeping them out of trouble during the summer months. In addition to hard work, these interns will also be exposed to different inspiring facets of our hospital, such as media technology, photography, and surgery observation. Additionally, the interns will learn important life skills such as the job application process, working papers, taxes, and earning their first paycheck! They will also need to get personal bank accounts for direct deposit which helps develop independence and a sense of ownership.

Priority #2: A sustainable model for vision screenings and adherence to follow-up care in community centers in underserved areas

The World Health Organization estimates that 285 million persons have poor vision worldwide, of whom 39 million are blind. Approximately 80% of vision impairment is estimated to be avoidable through treatment or prevention. Annual vision screenings can help detect many sight-threatening conditions such as uncorrected refractive error, cataracts, glaucoma, diabetic retinopathy, and age-related macular degeneration, however many individuals at highest risk of these sight-threatening conditions are in underserved communities with limited access to eye care services. In order to have a valuable impact on the eye health of the patient, a vision screening program needs to be sustainable and have a high adherence to follow-up care if pathology is detected.

To develop a sustainable model for vision screenings and adherence to follow-up care, a partnership between the Vickie and Jack Farber Vision Research Center at Wills Eye and the Stephen Klein Wellness Center was established to work towards the goal of eliminating correctable and avoidable vision impairment, and achieving eye and vision health equity in an at risk, underserved population. The Stephen Klein Wellness Center is located in North Philadelphia and dedicated to providing health care services including medical and psychiatric care as well as individual, group or legal counseling to men, women and children who are currently or formally homeless. They also provide these services to the residents of the North Philadelphia community. The vision screening model should be efficiently integrated into the routine care provided to clients of the Stephen Klein Wellness Center. A pilot study where a vision and eye health program was successfully implemented at the Stephen Klein Wellness Center and 239 participants were screened from 3/20/2019 – 6/27/2019. Highlights of the pilot study results are listed below:

- 22% of the 239 participants screened were referred for eye exam for possible eye pathology leading to
 - 10 newly diagnosed cases of diabetic retinopathy
 - 12 newly diagnosed cases of glaucoma
 - 12 newly diagnosed cases of macular degeneration
- Almost 80% of participants were referred for glasses
 - 26% of patients screened had uncorrected refractive error (persons needing glasses) at level of driving vision or worse
- While most participants were aware of glaucoma, cataracts and myopia, fewer were aware of diabetic retinopathy, despite the high frequency of diabetes in this community.

While these results imply that the vision screening program implemented at the Stephen Klein Wellness Center was feasible and a number of challenges were identified that needs to be addressed in the next phase.

A recently established medical clinic named the *Hansjörg Wyss Wellness Center* in South Philadelphia provides clinical and educational outreach to the surrounding immigrant population. Its goal is to create a full-spectrum primary care clinic with social services, wellness activities, and other community-focused programming. In late May 2021, Wills Eye formed a community clinic to provide specialized and sustainable ophthalmic services to the population served by the Wyss Wellness Center. Our services include refractions for glasses, screenings for chronic conditions, and dilated fundus exams provisioned by Wills Eye faculty and fellows. In addition, the initiative consists of screenings facilitated by Sidney Kimmel Medical School students under the guidance of board-certified physicians. The community served is primarily composed of immigrants from SE Asia, Central and South America, West Africa, and Eastern Europe. To date, the clinic has been very successful in provisioning needed ophthalmic care to a multitude of underserved immigrant families (primarily those from South America and

Southeast Asia). However, currently, there is a paucity of eye care services available to these groups due to language barriers and lack of proximity and knowledge regarding the medical system and its inherent complexities.

Specific Goals to address Priority #2 for FY2023:

The goals for the next part of implementing a sustainable model for vision screenings and adherence to follow-up care in community centers in underserved areas is to:

- Conduct part 2 of the pilot study at the Stephen Klein Wellness Center which will
 - Target recruiting high risk patients (persons with diabetes, over the age of 60, and/or with a family history of glaucoma)
 - Incorporate screenings during primary care visits on high risk groups
 - Increase follow-up for eye care after screenings
 - Increase awareness of eye health/vision screening importance - develop educational materials targeted at high risk groups

- Provide comprehensive eye care services to the families at the Wyss Wellness Center within six months of initiating screening examinations. This population is a mix of uninsured, partially insured, and insured patients in our local community. In this first phase metrics will be collected to evaluate:
 - If comprehensive eye care can be integrated into routine care in a community center with mixed population of uninsured, partially insured and insured patients.
 - If it is cost-effective and sustainable so that all patients can receive appropriate follow-up care even if they are uninsured or underinsured
 - Adherence rates to follow-up for failed screenings with an ophthalmologist

Priority #3: Pediatric vision screenings in children under 17 and low adherence to obtain glasses or follow-up with a pediatric ophthalmologist

Wills Eye Vision Screening Program for Children

The *Wills Eye Vision Screening Program for Children* was established in partnership with the School District of Philadelphia to help conduct in-school vision screenings for children in grades K-5, provide free glasses to children with refractive error, help children with suspected non-refractive eye disease(s) to be evaluated by a pediatric ophthalmologist and provide vision screening trainings for school nurses. Additionally, The *Wills Eye Vision Screening Program for Children* conducts summer vision screenings at Boys and Girls Clubs of Philadelphia and Chester, PA and children receive free glasses before returning to school in the fall. The *Wills Eye Vision Screening Program for Children* team consists of a pediatric ophthalmologist, project director,

project manager, optometrist, vision screeners, optician, and social worker. A school nurse coordinator is appointed by the School District of Philadelphia to select the schools each semester, attend screenings, and manage parental/guardian consent form return. The majority of chosen schools are in underserved areas of Philadelphia. The *Wills Eye Vision Screening Program for Children* also works closely with the school nurses, teachers, school staff and parents to educate about the importance of vision screening, glasses and follow-up care for their children.

Give Kids Sight Day

Give Kids Sight Day provides free eye care and glasses to children 17 years and under living in Philadelphia and the surrounding suburbs. Additionally, pediatric ophthalmologists are present to provide immediate care if non-refractive eye disease(s) is suspected. The child and family will work with a social worker to set up follow-up visits with the pediatric ophthalmologist if non-refractive eye disease is confirmed.

Specific Goals addressing Priority #3 for FY2023:

Wills Eye Vision Screening Program for Children

The *Wills Eye Vision Screening Program for Children* continues to strive to address the visual needs for the more than 12,000 K-5 students in the 30 Wills Eye catchment-area schools. In the latest report on Philadelphia, rates of childhood poverty vary from 3.9% in Chestnut Hill-West community to 67% in Huntingdon Park according to the “Health of Philadelphia Neighborhoods”. Accompanying these disparities are disparities in reading level and overall health.

Reaching these children is our top priority to ensure maximum visual correction.

- We have returned to in person visual assessments for all schools in our catchment area for the 2022-2023 school year.
- We have implemented a policy to track glasses delivery to ensure students are receiving their two pairs of glasses through the school nurses. As school nurses are not present on a daily basis, the policy was needed to prevent glasses from being lost prior to reaching the child.
- Closer coordination with school nurses and other school personnel to address potential problems with follow up visits when required has begun.

- We are developing an easier mechanism for parents to schedule children who require greater visual care through the Deerbrook program at Wills Eye Pediatric Ophthalmology Service. This involves take home fliers in English and Spanish, as well as direct email access to the Deerbrook team at Wills Eye. We are fine-tuning our outreach to parents to assess whether phone contact, forms through the school, or electronic access is most convenient to parents as this is the step that requires the most personnel hours to overcome.

Give Kids Sight Day

This year will be the 13th annual *Give Kids Sight Day*. Our longtime partner for this program, Children First has changed the scope of their mission and are turning more towards governmental advocacy. Without their help, Wills' team will have to take on the outreach, patient scheduling, and overall planning of the event. We are hopeful that with the help of volunteers, incorporating an online scheduling system, and our connections within the community, we can schedule 690 kids. Our outreach will include Philadelphia area schools, community centers, day cares, health clinics, and more. We want to try and reach diverse, low-income communities with difficulty gaining access to care.

Priority #4: Lack of city-specific data on eye and vision health of the residents of Philadelphia

A comprehensive profile of vision health and eye pathologies city - wide would be an excellent resource for providers, organizations, policy makers, and Philadelphia residents. Patient records to assess basic demographic and trends in ocular pathologies of patients that visit the Wills Eye resident clinical services, the Wills Eye Emergency Room, Wills Eye specialty clinical services and surgeries can be used as a first step to build a preliminary profile of the eye health of the Philadelphia. While not all Philadelphians receive eye care from Wills Eye, many patients are referred to Wills Eye for complex cases, surgery and ocular pathologies such as glaucoma, cancer, and retinal disease.

Specific Goals addressing Priority #4 for FY2023:

The first step in working towards achieving this momentous goal is to create a Wills Eye database that is easily searchable and useful for data analyses. The data scientists in the Vickie and Jack Farber Vision Research Center will be working on this project.