

# Vision Screening Practices and Data Collection:

## Results from a Survey of State School Nurse Consultants – Part 2



### Background

The National Center for Children’s Vision and Eye Health (NCCVEH) at Prevent Blindness partnered with the National Association of State School Nurse Consultants (NASSNC) to conduct a survey to collect information from State School Nurse Consultants (SNNCs) on how their states collect, store, and report data on vision screening, referrals for eye care, and tracking of follow-up treatment. For more information on the background of the survey please see [Factsheet #1 \(nationalcenter.preventblindness.org/data-collection-state-school-nurse-consultants\)](https://nationalcenter.preventblindness.org/data-collection-state-school-nurse-consultants).

In 2015, the NCCVEH published “Vision and Eye Health in Children 36 to <72 Months: Proposed Data System,”<sup>i</sup> with recommendations for recording vision screening and eye care follow-up outcomes in preschool-aged children; however, there is neither current data on adoption of the recommendations nor national uniformity in data collection on children screened, referrals to eye care, examination results, and treatment after children do not pass a vision screening. Per the recommendations of the NCCVEH<sup>ii</sup>, vision screening records should include these components:

- Demographic information of the patients (child-level data collection and reporting)
  - > “Vision Screening Process” to report the process by which children are screening
  - > “Not Screened” to report when vision screening is not completed for a child
  - > “Screening Outcome” to report the details of a completed screening
- Follow-up eye examination data from the eye care provider
- Systematic data collection throughout the vision screening programs

### What Data are School Nurse Consultants Currently Collecting?

In 2019, the NCCVEH surveyed 40+ SNNCs and state education and health staff. Findings demonstrated that that data collection procedures in many states were not aligned to the NCCVEH’s guidelines for collecting vision screening data. One-third of respondents reported the state does not collect any data. The most common data collected by states was the number of children screened (63%), number of children referred for an eye exam (60%), and referral completion (43%). Only 3 states collect data on efforts to contact parents/guardians regarding referrals for an eye exam (e.g. number of times calls, emails, texts, were attempted) and one state each reported collecting data on: student demographic information, the number of failed/no screening conducted, and the screening outcome.

### Current Limitations of State Data Collection Systems

Respondents reported several limitations of current data collection methods. Two states reported their

screening programs lacked resources to collect sufficient vision screening data (e.g. staff, challenges of receiving data from vision screening devices, and data points such as the number of students screened, number of students referred, and the number of services each vision screener provided). Other limitations mentioned were the accuracy, validity, and reliability of the data collected, as well as the fact that many school districts are not required to perform vision screening.

### Exploring Use of Records for Vision Screening Results

The survey explored the possibility of utilizing a State Immunization Registry to include vision screening data, which could potentially allow tracking child-level data for better tracking of outcomes. Respondents were asked if their state includes vision screening results and/or other health information in their State Immunization Registry. Table 1 shows that the majority of States’ Immunization Registries do not include any other health information, while two states include vision screening information in the Immunization Registry.

**Table 1. Percentage of other health information included in States' Immunization Registries**

Information	Percentage
No other information included	77
Lead screening results	14
Vision screening results	6
BMI screening results	3
States don't have immunization registry	3
Other	23
Hearing, dental, scoliosis screening results	0
<b>OTHER</b>	
Hb/HCT, TB test, Height/Weight, Head Circumference, Blood Pressure	
Asthma	
Developmental screening for ASD (autism)	

Respondents were asked to share opinions on the efficacy of current or possible future utilization of the immunization registry for capturing and reporting vision screening and eye care data. A summary of open-ended responses follows:

- Most responded that such integration would not be feasible. There are no laws requiring the collection and reporting of vision screening data, and no funding or personnel to work on this.
- Lack of willingness to initiate a new reporting system or double charting, which are costly, time-consuming and create privacy concerns.
- Two participants stated the current system only allows school nurses to view registries.
- A few participants mentioned that they would like to see this implemented in their states.

### Recommendations for More Effective Vision Screening Data Collection

The most common suggestion for how vision screening, referral, eye care and treatment information can be reported and/or tracked more efficiently

was that the reporting system should be linked to electronic medical records. Several participants also reported the need for a better method to track vision screening information, particularly at the school district level. Participants also suggested the need for laws requiring data collection and reporting, as well as creating provisions to allow the exchange of hearing and vision screening information between schools and medical providers. **Only one state was satisfied with the current method.** Below are additional recommendations for improving data collection for vision screening, referral and treatment provided by respondents:

- Using a database that could be linked to the immunization registry
- Establishing a mandate for reporting all school health screening data
- Reporting referral completion and why referrals were not completed

The data from this survey demonstrates current gaps in best practices for vision screening and eye health data collection, tracking and reporting, and opportunities for several improvements to increase uniformity throughout the U.S.

For more information, contact Donna Fishman [dfishman@preventblindness.org](mailto:dfishman@preventblindness.org). This project supports NASSNC's mission to bring State School Nurse Consultants together to transform school health services.

i E. Hartmann, et al. Vision and Eye Health in Children 36 to <72 Months: Proposed Data System. *Optometry and Vision Science*. 2015. Vol. 92, No. 1, pp. 24-30

ii Ibid