



**Parkway School District  
School Health Services  
Guidance for Vision Screening**

**General Guidelines**

- Grades to be screened - Preschool, kindergarten, 3rd grade, 5th grade, 7th grade, 10th grade and students new to the district.
- Teaching tool/video - “Let’s Get Ready for Vision Screening”  
<http://ccox.sites.truman.edu/2018/02/01/vision-screening-preparation1/>
- Timing/Scheduling with two screeners
  - 30 minutes for kindergarten classes of 20 students (recommend doing K at separate time with building nurse)
  - 15 minutes for 3rd and 5th grade classes of 20-25 students
  - 7th grade students approximately 40-50 students per hour with two screeners
  - 10th grade students approximately 50 students per hour with two screeners
- Always coordinate screening days with school administrators and teachers at least 4 weeks prior to screening dates.
- Alert parents of screening days and opt out options in school school newsletter and/or eblast communication at least 2 weeks prior to mass screening day.

**Screening Procedures and Equipment**

| Grade                                                      | Type of Screening Procedure                      |
|------------------------------------------------------------|--------------------------------------------------|
| Preschool and kindergarten students                        | LEA symbols and Stereopsis Kit                   |
| Elementary students                                        | HOTV with Proportional Spacing or Sloan Letters  |
| Students new to the district<br>(Kindergarten - 3rd grade) | Screen with appropriate chart and Stereopsis Kit |
| Middle and high school students                            | HOTV with Proportional Spacing                   |



**Parkway School District**  
**School Health Services**  
**Guidance for Vision Screening**

- Distance wall chart at 10 feet; Chart screening can be more efficient and less disruptive. Insufficient data exists to support Titmus machines as preferred practice for visual acuity screening for school-aged children.
- Occluders - If occluder glasses are used, they should be wiped off with alcohol between students. If this is not feasible, students should be instructed to hold own cupped hand over each eye.
- The school nurse should participate and manage the screening process, if at all possible, while a sub nurse manages the health office. A second sub screener may be available for larger schools. Additional help can be coordinated if more screening time is needed on subsequent days.
- Recruit parent volunteers if possible. They can be used to:
  - Escort students from classroom to screening room
  - Sit or stand next to student being screened to help them with occluder and stereopsis glasses
- If insufficient extra help exists, screening times may need to be increased
- Have Chrome Book to chart screenings. Younger students will need a name tag.
- Remember you are “screening” the students, if in doubt refer for comprehensive eye exam. We do not need to get a specific acuity, just pass or fail.
- SPOT machine can be used for nonverbal students and those with other barriers to chart screening. SPOT machine does not measure visual acuity but can give guidance for referral. It will pick up amblyopia in young students.
- When using the SPOT machine, the room needs to be darkened, possibly use isolation room with lights out but the door open.
- ***Insufficient data currently exists to support instrument-based screening for ages 6 and older.*** It is not necessary to rescreen students who fail the vision chart screening with the SPOT machine. These students should be referred to an eye doctor for vision exams.
- Please be careful using this very expensive piece of equipment. Do not leave it plugged in and unattended.
- If screening away from the classroom, please request that teachers remain with class during the screening process. This will assist with crowd and noise control and discipline. DO NOT send class on own to screening site location.

## Screening Tools

**Critical Line Screening:** Only uses the line student needs to pass by correctly identifying more than half of the letters/ pictures on that line.

How to Do Critical Line Screening for students using HOTV/LEA/Sloan 10 foot Wall Chart:

1. Tape laminated picture of feet on the floor to show students where to stand. Arch of student's foot should be on 10 foot line.
2. Mount the chart at the student's eye level, have younger students sit in chair at 10 feet instead of standing and lower wall chart.
3. Explain procedure to class as a whole prior to starting.
4. Ask if the student wears glasses. If so, screening should be conducted with glasses. Note on the screening form that the student is wearing glasses. If a student has forgotten their glasses and fails the screening, schedule a day for them to return for screening with their glasses.
5. Watch carefully to be sure that the student is not peeking, tilting the head or squinting. Students want to do well on the screening and will often try to compensate for vision problems. If at all possible for young students, have someone stay next to the student and watch closely.
6. Do not allow the student to lean the head or torso forward.
7. Begin by screening the right eye, with the left eye occluded using occluder glasses or student's cupped hand.
8. Instruct the student to keep both eyes open and read the selected letter or line of letters with the uncovered eye. Do not use a marking device (pencil/pen) as a pointer to avoid leaving distracting marks on the chart.
9. Start with the 20/30 line. Have the student read the right side with left eye occluded. Then repeat with the left eye reading the left side with the the right occluded. Finally, have the student read one side with both eyes open. If they can read the 20/30 or 20/32 line, they pass the screening. Under age 6 passes at 20/40.
10. To receive credit for a line, the student must identify one more than half of the letters/symbols on that line.
11. Do not comment either positively or negatively on the student's responses.
12. It is important to inform the classroom teacher if a student fails the screening so that classroom accommodations can be made, if needed.

### **Binocularity / Stereoscopic Vision**

Binocular vision has two components; ocular alignment and stereo acuity. Screening binocularity determines how well the two eyes function together. The purpose of screening binocular vision/stereo vision is to determine if the student has adequate binocularity.

How to do Binocularity/Stereoscopic Vision screening:

Equipment needed

- Random Dot E (RDE) Stereo test Kit
- Model E slide—demonstration plate with a large, embossed letter “E” used for training purposes only.
- Stereo Blank slide—used for training and screening; contains an array of randomly oriented dots; no “E” appears even with the stereo glasses in place.
- Raised/Recessed E slide—used for screening purposes only; contains an array of randomly oriented dots; when stereo glasses are worn, a large letter “E” appears if the student has normal binocular vision.
- Stereo polarized glasses
- Alcohol and cotton balls for sterilizing glasses between students

### **General Procedure for Stereovision Screening**

1. Show the student the Model E slide. Be sure that the student can identify the “E”.
2. Place the stereo glasses on the student. If the student wears prescription glasses for distance viewing, remove prescription glasses and screen only with polarized glasses. If the student wears prescription glasses for near viewing, place polarized glasses over prescription glasses when screening. If you do not know the reason for the student wearing glasses, place the polarized glasses over the prescription glasses when screening.
3. Be sure that the student keeps his/her head straight up when viewing the slides. Tilting to one side or allowing the glasses to tilt on the nose will interfere with the test.
4. Show the student the Model E slide and the Stereo Blank slide. Slightly rotate, without tilting, the slides to give optimal viewing.
5. Have student point to the slide with the “E”.
6. Practice by mixing up the Model E slide and the Stereo Blank slide behind your back and presenting the slides to the student until you feel the student understands.
7. Replace the Model E slide with the Raised/Recessed Stereo E slide.
8. Hold the slides 40” from the student at eye level.
9. Have the student identify the slide with the “E” on it.
10. Continue mixing up the cards behind your back and have the student identify the “E” slide.
11. Repeat this process 5 times. Referral Criteria For a pass: the student must locate the Stereo “E” card at least four out of five presentations. Note: A student who is uncooperative or unable to complete the screening should be referred.



**PARKWAY**  
SCHOOLS  
**Parkway School District**  
**School Health Services**  
**Guidance for Vision Screening**

### **How to use SPOT Check**

Note: The SPOT Check is a screening tool for students who are nonverbal or unable to understand the primary screening method. The SPOT machine does not measure visual acuity.

1. Push the power button located on the bottom of the device.
2. Press start located on the bottom right corner of the screen.
3. Review subjects info being sure to pick the appropriate box under Eyewear prescription: None, Glasses, or Contacts, choose .
4. Choose appropriate age group.
5. Have the subject stand in area with the lights dim.
6. Screener should stand about 3ft away pointing the SPOT at the subjects eyes and adjusting it until you can see their eyes on the screen. Take small adjustments (a couple inches) if it indicates you are too close or too far.
7. The subject should be instructed to look directly at the flashing lights. You will see a wheel appear right before SPOT captures vision, hold machine still at this point. If it indicates "pupils are too small" you must make the room darker.
8. Once SPOT has captured subjects vision it will indicate either "All Measurements in range" = PASS or "Complete Eye Exam Recommended" = FAIL (may also indicate eye abnormalities)

### **SPOT Machine Terms:**

- Myopia (nearsightedness)      Astigmatism (blurred vision)
- Hyperopia (farsightedness)      Anisometropia (unequal refractive power)
- Strabismus (eye misalignment)      Anisocoria (unequal pupil size)

### **Rescreening**

Rescreening is performed to eliminate those students who failed the initial screening due to factors such as fatigue, illness, anxiety, misunderstanding, or distractions during the initial screening. Obvious failure may be referred without rescreening.

- The number of students rescreened will typically be <5% of those initially screened.
- Rescreening should be done by the building nurse within 14-21 days after the initial screening.
- Procedures for rescreening are the same as those for the initial screening.

### **Referral Criteria**

Student fails either the HOTV/LEA/Sloan chart screening or SPOT screening (nonverbal)

- Students under age 6 - acuity of > 20/40
- Stereopsis failure
- Students age 6 and above - acuity of > 20/30
- Two line difference in acuity. For example: Using Critical Line Screening (20/30), Right 20/30 Left 20/50 should be referred because there is a two-line difference.



**PARKWAY**  
SCHOOLS  
**Parkway School District**  
**School Health Services**  
**Guidance for Vision Screening**

### **Referral Process**

A referral is indicated if the student fails any portion of the screening.

- The nurse should notify the parent/guardian in person or by telephone prior to sending a written (email) referral.
- A written referral, using the SNAP form/template that communicates the findings of the screening as well as any additional observations made in the school setting, should be emailed to the parent/guardian within one week after the rescreening.
- The referral form should request a written report from the eye care professional with the results of the examination and any recommendations for the school setting.

### **Documentation**

- Exporting a grade level of students from IC to use for screening  
<https://www.parkwayschools.net/cms/lib/MO01931486/Centricity/Domain/1939/Exporting%20a%20grade%20level%20list%20of%20students%20from%20IC.pdf>
- You can then use Chromebooks during screening to collect, document and organize screening results using the grade level Google Sheet
- You can process a group in SNAP for documentation. Directions on Inside Health Services/SNAP.

### **Follow-Up and Tracking**

The most important component of any screening program is follow-up.

- A tracking system is essential to follow-up those who are referred in order to assure that the student receives the appropriate treatment/services.
- If information about the referral is not received in 3-4 weeks following the referral, a phone call should be made to the parent/guardian.
- The parent/guardian should be contacted periodically until the nurse knows the disposition of the referral. You can use SNAP to set reminders for these parent contacts.
- The nurse should be aware of community resources for those who need financial assistance.
- All pertinent information regarding the screening results, referral, and results of the professional evaluation as well as recommendations must be documented in the student's health record.
- It may be determined by the professional examiner that the student does not presently need glasses or other specific treatment. This would not invalidate the referral if a problem were confirmed.
- Following professional diagnosis and treatment, further planning may be needed for the student whose vision cannot be brought to within normal limits. Referral for 504 review or Special Education assessment may be necessary when vision is affecting learning.



**PARKWAY**  
SCHOOLS  
Parkway School District  
School Health Services  
Guidance for Vision Screening

### **Possible Screening Scenarios**

- **ELEMENTARY/HOTV/LEA/Sloan charts**
  - **Option 1:** Room reserved, two screeners (including school nurse), students brought to site, teacher and parent volunteers are essential to keep schedule moving along. Allow 15 minutes per class for 3-5th grade plus new students.
    - Building nurse to perform KDG vision screening (stereo and distance) at a different time.
  - **Option 2:** Hallway/ Pod area used/ two screeners (including school nurse) move to each area and set up chart; students come out of class 2 at a time; teacher keeps teaching. This could take place during Specials times or regular class time. Reserved room not needed for this option. Only loose schedule needed, screeners can move on as each area is completed.
    - Building nurse to perform KDG vision screening (stereo and distance) at a different time.
  - **Option 3-**Schedule screening during two different days during the student's PE period. Building nurse will get a sub to cover her office during those two days and then she will be in PE doing the screenings.
    - Process is the same for both options: **Chromebook used to record results, no paper slips used**
- **MIDDLE/ HIGH**
  - **Option 1:** Room reserved, two screeners (including school nurse), students brought to site, teacher and parent volunteers are essential to keep schedule moving along.
  - **Option 2:** Hallway/ Common area used/ two screeners (including school nurse) move to each area and set up chart; students come out of class 2 at a time; teacher keeps teaching. This could take place during Specials times or regular class time.
    - Process is the same for both options: **Chromebook used to record results, no paper slips used**



**PARKWAY**  
SCHOOLS  
**Parkway School District**  
**School Health Services**  
**Guidance for Vision Screening**

**Referral Resources - Call first to verify services before making a referral**

The school nurse's role is to identify whether there is a need for financial assistance for those students with incomplete referrals.

1. School social workers can be helpful in identifying social resources for families.
2. Vision Van/Eye Care Charities of Mid America-the van will be scheduled to come to Parkway one time per year.
3. MO HealthNet - If a parent indicates there is a financial problem, the first step is to determine if the student is financially eligible for assistance through MO HealthNet. MO HealthNet is based on a national student health insurance program for uninsured students. This is a program for medical, dental and vision insurance. Access to these programs is through the Family Support Division (FSD) of the Department of Social Services. Students eligible for free and reduced lunch programs may often meet the financial criteria. If the parent/ guardian does not have a Medicaid card for the student and is interested in exploring their eligibility for MO HealthNet, they should be referred to the county FSD office. The phone numbers are 855-FSD-INFO (855-373-4636) or log on to <https://mydss.mo.gov/healthcare/mohealthnet-for-kids>. These programs will provide an eye exam every two years, and frames and lenses if needed. New lenses may be obtained on an annual basis if there is a medical necessity. Legal Services of Eastern Missouri also has staff who help families complete Medicaid applications.
4. Prevention of Blindness Program  
A resource available to all citizens in Missouri is the Prevention of Blindness Program (POB). This program is entirely funded by the State of Missouri, and all funds are expended through a coordinator in the state office. All individuals in the state who are legal residents, regardless of age, are provided eye care services when they meet the eligibility requirements. 15 Eligibility requirements include: • Financial – dependent upon net monthly income, number of individuals in the household, cash and resources other than the family residence. All income generated in the household is taken into consideration. • Visual – eligibility is based on a visual acuity of 20/200 or worse without correction in at least one eye, a progressive eye disease, or malformation or malfunction of the eye. Visual eligibility determination for the Prevention of Blindness Program can be made after a report is filed in the POB office by an eye care professional that has completed an examination of the client. This examination is to determine the existence or nonexistence of disease of the eye, to check for ocular muscle functions, and to determine whether any other ocular problems exist.





**PARKWAY**  
SCHOOLS  
**Parkway School District**  
**School Health Services**  
**Guidance for Vision Screening**

The program provides for the purchase of the following:

- Glasses
- Routine and follow-up eye examinations
- Surgery
- Hospitalization
- Anesthetic fees Other services include:
- Referrals to other agencies (public and private)
- Counseling
- Purchase of some medication

The Prevention of Blindness Program accepts referrals from any source, utilizing a form that may be obtained from the county Family Support Division office. The nurse may need to assist the parent/guardian in completing the form to avoid unnecessary delays in getting approval for care. The phone numbers are 855-FSD-INFO (855-373-4636) <https://mydss.mo.gov/healthcare/mo-healthnet-for-the-blind-and-visually-impaired>.

5. National Association of School Nurses / Vision Service Plan The National Association of School Nurses (NASN) collaborates with Vision Service Plan (VSP) Sight for Students program for low-income students not eligible for government programs. Members of NASN can obtain materials for providing up to ten “gift certificates” for vision care. In exchange, they agree to ensure the student is financially eligible, assist the family with completing the application, and assure the family keeps the appointment.  
<https://schoolnursenet.nasn.org/blogs/nasn-profile/2017/10/03/advance-your-nursing-practice>  
<https://vspglobal.com/cms/vspglobal-outreach/gift-certificates.html>

Additional eyecare/vision resources available at

<https://www.mercy.net/content/dam/mercy/en/pdf/mnm-resources/eye-care-vision-resources.pdf>