

Member Question: Do you test forklift drivers for depth perception and if so, what is considered passing?

I called a large forging industry that I used to work for and they are now requiring 20/25 with or without correction. However, we used to require 20/30 with or without correction in at least one eye. I would speak with an ophthalmologist and get his opinion. However, once again, it all depends on if you are union or non union. If you are non union, the management can pretty much make it what they want. If you can justify whatever you feel is a safe comfort zone with feedback from the ophthalmologist, then I would try and push that with the union and have the doctor's reasoning to back it up. Hope this helps.

Anna B.

I don't have to do it for my current employer however all of my previous employers I have and when I managed the clinic in OH we did. I have always used a Titmus eye machine and it said what was pass or fail.

Lorine R.

Here is a book she can use made by Titmus-

An example of a contour stereotest used in the clinic is the Titmus Fly Stereotest. In the Titmus Fly Stereotest, horizontal disparity is presented via the vectographic technique (Fricke and Siderov, 1997). When tested a 40 cm the fly has a disparity of 3,600 sec of arc; the disparity of the animals range from 400 - 100 sec of arc and the disparity of the Wirt rings range from 800 - 40 sec of arc (figure 8).



Figure 8. Titmus Fly Stereotest

[Figure 8. Titmus Fly Stereotest.\(41 K jpeg image\)](#)

Examples of random-dot stereotests used in the clinic are the Frisby Stereotest, the Randot Stereotest, the Random-dot E Stereotest and the Lang Stereotest. The Frisby Stereotest (figure 9) uses real depth to determine stereoacuity. Three perspex of different thicknesses are used. Four squares of geometric shapes are painted on one side of the perspex. In one of the squares, a circle of these geometric shape is painted on the other side of the perspex. Both the Randot (figure 10) and the Random-dot E uses crossed polarised filters. Disparity is also constructed vectographically. The Randot Stereotest uses modified animals and ring designs with random dot backgrounds to eliminate monocular cues. The Lang Stereotest uses a panographic technique (Fricke and Siderov, 1997) to present disparity, therefore, no filters are required. Patients are required to identify pictures on the Lang Stereotest. The Lang II Stereotest has a monocularly visible shape on it (figure 11). Lorine R.

When we had FLO we did test for depth perception and passing was 85%. Hope that helps.

Stephanie H.

Laura, We do testing for our PIV and our requirements do NOT specifically state any depth perception requirements. I am attaching our requirement in a word document, but also cut and paste something from the OSHA website stating that certain depth perception is NOT required per OSHA but that it is a "good idea".

Hope this helps. Chris P. The attachment is below and following that is a reply received from OSHA.

ATTACHMENT B MEDICAL ASSESSMENT OF EMPLOYEE FITNESS TO OPERATE POWERED INDUSTRIAL TRUCKS (PITs)

I. Medical Evaluation

- Each employees assigned to operate a PIT should meet the following medical criteria.
 - Vision: Has visual acuity correctable to 20/40 in each eye with no double vision and no tropia. Has normal field of view and color vision.
 - Hearing: Has hearing no more than 25 dB loss at 500, 1,000, and 2,000 H_z in the best ear without hearing aid. Employees with poorer hearing will require individual evaluation to determine their functional hearing capability and suitability for PIT operation.
 - Upper/Lower Extremities/Back: Has no ergonomic impairment of the use or strength of back, fingers, arms, or other bio-mechanical defects that may interfere with the employee's ability to control and safely operate a PIT.
 - Neuro-Muscular: Has no uncontrolled illness of a severity likely to interfere with employee's ability to operate a PIT safely. Generally, the status of employees with an illness that has the potential to cause unexpected loss of consciousness, equilibrium, mental capabilities, nervous system, and muscular should be carefully reviewed.
 - Mental Alertness: Is "fit for duty" and mental alertness and judgment are not compromised by external influences, including alcohol and drug abuse.

II. Further Evaluation Indicated

Individuals who do not meet all the medical qualification criteria will be further evaluated in consideration of the requirements of their specific job. The evaluation should take into consideration potential hazards, options to safely and reasonably accommodate the individual, and assure the safe operation of the PIT. The evaluation will require the participation of facility line supervision, medical, and safety personnel and should follow the guidance contained in the Celanese-American with Disabilities Act guidebook.

III. The **Medical Director** will be responsible for final medical determination of employee's status as "fit for duty."

IV. Sources:

- OSHA 29 CFR 1910.178(1),
- DBJ 007.91, dated January 25, 1991
- **Celanese Professional Practice Standard for Powered Industrial Trucks.**

Reply from OSHA

Your letter refers to our standard 1910.178(a)(2). This paragraph deals with design and construction requirements for powered industrial trucks, not with operator qualifications.

~~Our standards contain only minor reference to operator qualifications. In [1910.178(l)(1)(i)] you will read, "Only trained and authorized operators shall be permitted to operate a powered industrial truck."~~ (Correction 02/16/99) ["The employer shall ensure that each power industrial truck operator is competent to operate a powered industrial truck safely, as demonstrated by the successful completion of the training and evaluation specified in this paragraph (l)."] No mention

is made of vision requirements. The ANSI Standard B56.1-1969 in Section 6 reads, "Operators of powered industrial trucks shall be physically qualified. An examination should be made on an annual basis and include such things as field of vision, hearing, depth perception, and reaction timing."

[This document was edited on 12/22/00 to strike information that no longer reflects current OSHA policy.]

While OSHA did not adopt this requirement, it merits your consideration. People with only one eye do not generally have good depth perception; this could be a most important and critical matter in some industrial operations. You, as an employer, must determine if full vision is mandatory in your operations. We suggest you consult with your company's medical department.

In closing we remind you that the standard does not apply to vehicles intended primarily for earth moving or over-the-road hauling. Please contact us if we can be of further service.

Very truly yours,

Nicholas DiArchangel

Acting Regional Administrator

for Occupational Safety and Health

cc: Wash., D.C.