



Special Olympics
Lions Clubs International
Opening Eyes®



Review Of Prevalence Of Vision Problems In Individuals With Intellectual Disability As Seen During The Opening Eyes Programs In 2012

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BACKGROUND AND AIMS

Vision is important to allow individuals with intellectual disability to function as independently as possible. Special Olympics (SO) Lions Clubs International Opening Eyes (Opening Eyes), a part of the Health Athletes program, has been working to improve the quality and access of eye care to this vulnerable population since 1995 with effort emphasis on treating uncorrected refractive error. During the past 18 years, a vision assessment program was created and offered at major SO events with the intention of providing corrections to athletes and exposing more eye care providers to the needs of these patients. The results from a standardized vision program that takes place all around the world has been entered into a central registry. A review of 2012 data is being reported.

What is Special Olympics?

The mission of Special Olympics is to provide year-round sports training and athletic competition in a variety of Olympic-type sports for children and adults with intellectual disabilities. We give them continuing opportunities to develop physical fitness, demonstrate courage, experience joy, and share personal skills, gifts of spirit, and friendship with their families, their fellow Special Olympics athletes, and the world.

What is Healthy Athletes?

For more than 15 years, healthcare professionals have provided health screenings, health education, services and referrals for follow-up care in 122 countries. Special Olympics is the world's largest public health organization for people with intellectual disabilities – a population that faces severe health issues and inadequate or non-existent care. Healthy Athletes currently offers health screenings in seven areas: Fit Feet (podiatry), FUNfitness (physical therapy), Health Promotion (better health and well-being), Healthy Hearing (audiology), MedFest (sports physical exam), Opening Eyes (vision) and Special Smiles (dentistry).

METHOD

Athletes are invited to participate in the Opening Eyes program. Consent is obtained before the event and assent is obtained when the athlete is invited to participate. Screening stations include visual acuity (far & near), stereopsis, color vision, cover test (far & near), autorefractometer, eye health, IOP and refractions, if needed. When an athlete needs a correction, refractions are conducted and new glasses provided. Recommendations including new glasses and referrals are recorded. Data from Opening Eyes screening forms that are completed as the athlete goes through the vision screening is entered into the HealthOne Global. The Opening Eyes data was then extracted and reviewed.

RESULTS

The data from the year 2012 was reviewed for this presentation. Only data that was entered is being addressed.

Athletes (17,682) from 49 countries were screened (63.3% male).

Subjects

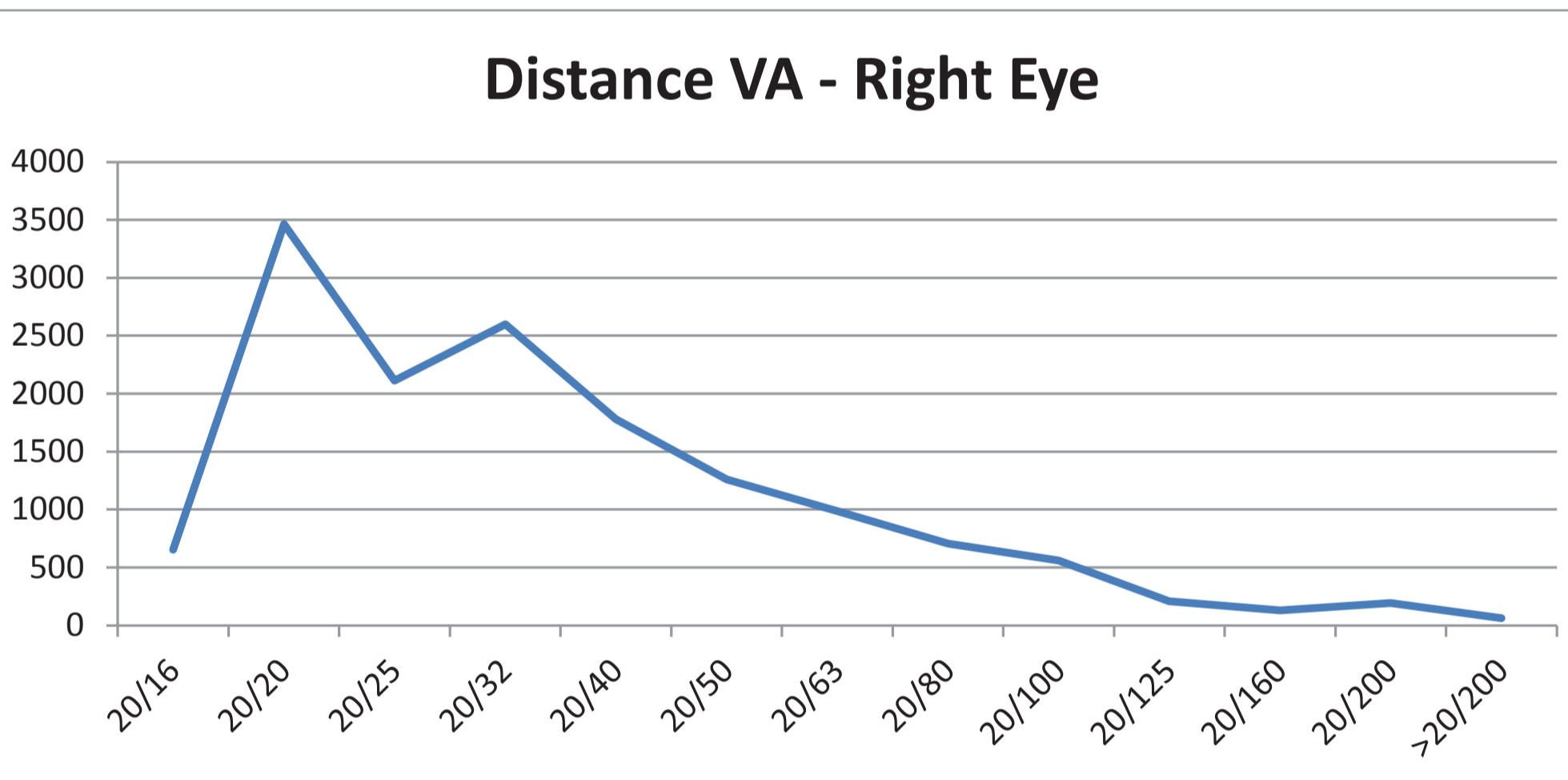
Sex	Frequency	Percent
Female	6,443	36.4%
Male	11,195	63.3%
Unknown	44	0.2%
Total	17,682	100.0

Mean Age – 23 years +/- 13 –Note: athletes can compete at age 8 years with no upper age limit

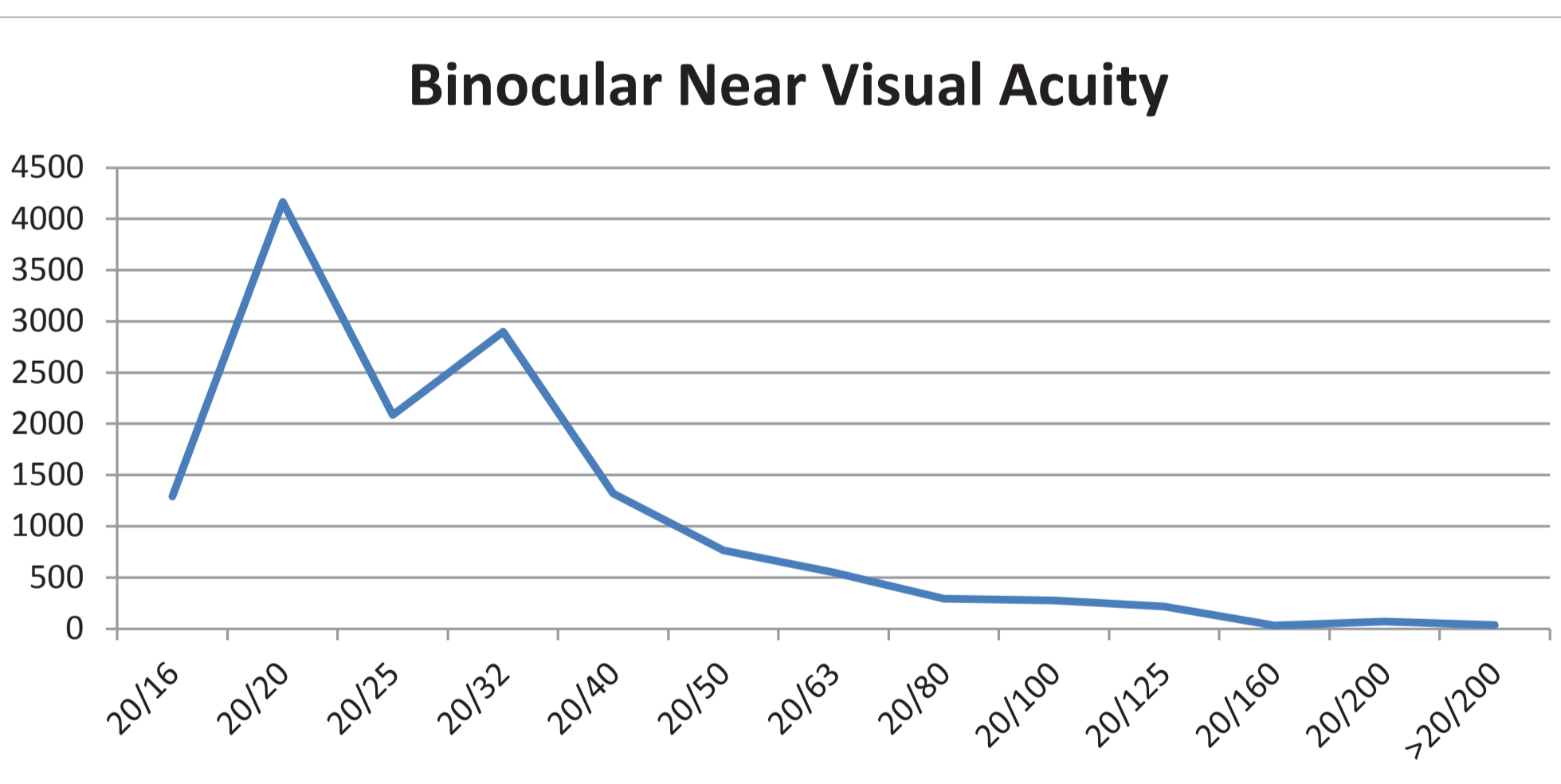
When was your last eye exam?

	Frequency	Percent
Less than 1 year	3817	21.6
Between 1-3 years	5062	28.6
Greater than 3 years	1473	8.3
Never	2550	14.4
Unknown	2469	14.0
Missing data	2311	13.1

Visual Acuity



Unstable – 1007 (5.7%), Missing data – 1616 (9.1%)



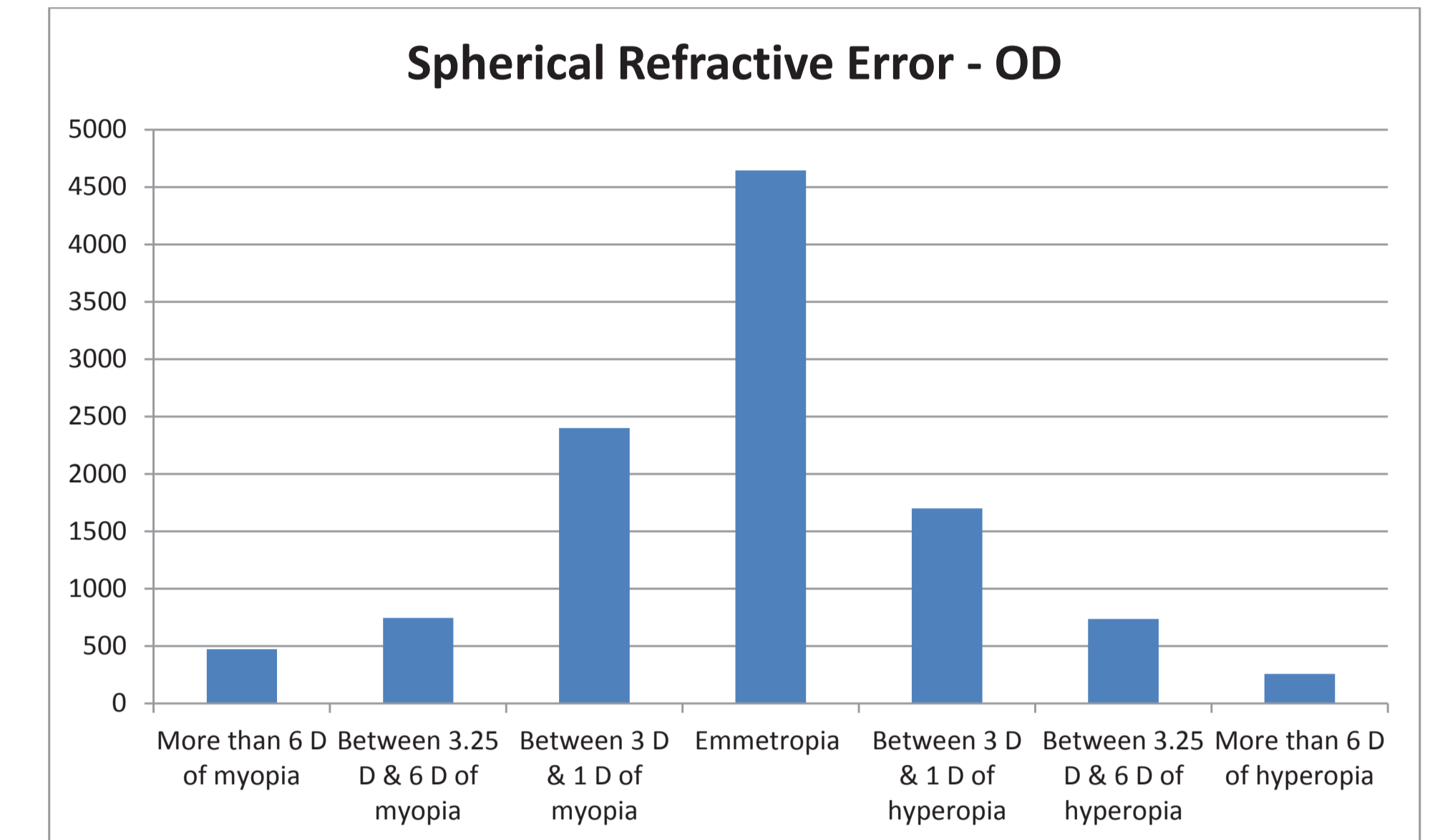
Unstable – 926 (5.2%), Missing data – 2752 (15.6%)

Strabismus

	Far		Near	
	Frequency	%	Frequency	%
No strabismus	11484	64.90%	10929	61.8%
Strabismus	1848	10.50%	1878	10.6%
Unable to test	995	5.60%	983	5.6%
Missing	3355	19%	3892	22.0%
Missing data	2311	13.1%		



Refractive Error



Astigmatism – 40.2% had > 1.25 diopters of cylinder

Refractive error (spherical equivalent) showed a wide range (-35D to +30D) with a mean of -0.35D +/- 3.55 sphere and -1.40D +/- 1.62 cylinder.

Eye Health

Eye health problems were found in 14.5% of the athletes. The table shows the distribution of eye health problems that were documented for the right eye only.

normal	13847
lids/lashes – blepharitis, lid anomalies	690
Cornea – scar, infections, etc.	730
anterior chamber	7
Iris – colobomas, other abnormalities	20
Pupil anomalies	6
cataracts	50
optic nerve anomalies	1
sclera	5
nystagmus	1
microphthalmia	1
phthisis	1
proptosis	1
blind	1
missing	2392
	17753

CONCLUSIONS

The data represents the results of vision screening during 2012 for Special Olympic athletes with around the world. The percentages of problems are significant, however, are reduced from previous studies of this population. There are some barriers that do impact the data that is reported in this presentation. Some challenges exist with respect to quality of the data collected and completeness. In addition, the data is often entered by a non-eyecare provider and may not be done correctly. In addition, Special Olympics is a no-profit program with limited resources that may preclude someone entering any data due to manpower limitations or access to the internet. These issues can lead to potentially under reporting actual prevalence of vision problems.

The Opening Eyes program only gathers data from Special Olympics Lions Clubs International Opening Eyes events. The fact that the numbers of athletes who have not accessed eye care has decreased, it is hoped that the program is having a positive impact on access to eye care for persons with Intellectual Disability.



CONTACT INFORMATION

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