



Special Olympics
Washington
Health

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Findings from 2018 Health Initiatives

Table of Contents



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Global Comparison	4
General Population Comparison	5
Health Sumamry	6
Opening Eyes.....	7
Health Promotion	8
Healthy Hearing	9
Fit Feet	10
FUNfitness	11
Special Smiles	12
Strong Minds.....	13
Special Olympics USA Games.....	14
Healthy Communities	15
What to Expect in 2019	16

Global Comparison



Healthy Athletes exam results, 2008-2018

	Global		USA		SOWA	
	%	n	%	n	%	n
Special Smiles Total	100.0	240,767	100.0	107,062	100.0	769
Mouth Pain*	14.5	33,802	11.7	12,148	15.1	110
Untreated Tooth Decay*	36.7	83,643	25.4	25,591	24.2	166
Missing Teeth*	28.1	64,659	29.4	29,972	27.8	192
Gingival Signs*	46.0	105,001	46.5	95,957	46.6	321
Urgent Dental Referral*	14.2	32,287	9.0	9,157	8.4	58
Fit Feet Total	100.0	106,878	100.0	44,787	100.0	378
Gait Abnormalities	58.7	53,347	64.4	23,295	36.2	122
Bone Deformation	26.4	23,111	28.7	9,677	21.4	69
Skin/Nail Conditions	50.2	51,921	43.1	18,609	37.6	133
Opening Eyes Total	100.0	183,493	100.0	80,807	100.0	2,546
Never Had an Eye Exam*	21.2	28,426	3.9	2,387	3.3	66
Eye Disease	16.2	29,798	16.6	13,387	23.0	586
Needed new Rx	36.7	67,302	47.1	38,064	30.0	763
Healthy Hearing Total	100.0	107,671	100.0	52,477	100.0	339
Blocked or Partially Blocked Ear Canal	39.9	42,950	41.5	21,799	29.2	99
Failed PureTone Hearing Test	24.9	26,832	27.7	14,535	23.0	78
Permanent Hearing Loss	7.1	7,655	7.9	4,149	6.8	23
Health Promotion Total	100.0	143,761	100.0	50,297	100.0	305
Low Bone Density (adults)*	27.8	5,667	26.2	3,702	28.9	44
Obese (child)*	16.2	9,986	32.4	3,955	35.3	18
Overweight (child)*	14.7	9,087	17.4	2,128	13.7	7
Underweight (child)*	10.7	6,604	5.4	662	0.0	0
Obese (adult)*	32.2	22,056	46.2	14,700	51.5	120
Overweight (adult)*	27.9	19,137	28.1	8,925	26.6	61
Underweight (adult)*	5.0	3,436	2.6	830	1.0	1
Use Tobacco Products*	7.8	9,585	6.1	2,447	10.3	13
Exposure to Second Hand Smoke*	37.9	41,859	35.7	12,613	40.3	71
Fun Fitness Total	100.0	105,441	100.0	44,215	100.0	179
Flexibility Problems Identified*	62.0	65,364	70.9	31,344	78.2	140
Strength Problems Identified*	55.8	58,878	54.7	24,207	53.1	95
Balance Problems Identified*	66.6	70,246	72.8	32,192	64.2	115
Exercise Frequency						
3 or More Days Most Weeks	53.2	47,483	65.9	24,007	66.3	108
Less Than 3 Days Most Weeks	38.4	34,296	28.9	10,534	25.2	41
No Regular Exercise Program	8.4	7,452	5.2	1,908	2.5	4

n = number with each health condition

*Percentages based on number of athletes who completed particular test or answered particular question

For more information, please send an email to healthdata@specialolympics.org

General Population Comparison



When comparing the prevalence rates of a number of health indicators in Special Olympics athletes to those in the general population, disparities become evident. One of the largest discrepancies exists in obesity. In Special Olympics athletes, 31% of the adult population globally were obese compared to 13% of the general population. However, within the United States, a higher percentage of adult SO athletes were sufficiently active compared to the general population.

Table A. Comparative health indicators for Special Olympics athletes and the general population (2008-2018)¹

Health Indicator	General Population, US (%)	Special Olympics Athletes, SOWA (%)	Special Olympics Athletes, US (%)
Untreated Tooth Decay	27.0 ²	24.2	25.4
Missing Teeth ²	52.0 ³	27.8	29.4
Obesity (BMI≥30) (20+)	30.4 ⁵	51.5	46.2
Sufficient Aerobic activity (3 or more days per week)	49.7 ⁶	66.3	65.9
Insufficient Aerobic activity (1-2 days per week)	19.9 ⁷	25.2	28.9
Inactive - Aerobic activity (No days per week)	30.4 ⁸	2.5	5.2
Balance Problems	35.4 ⁹	64.2	72.8
Skin/Nail Conditions	27.0 ¹⁰	37.6	43.1

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¹2008-2018 timeframe is for SO data and does not necessarily mean the general population data corresponds to the same time.

² SO athletes often have many missing teeth and it is possible the metrics for the general population may reflect more people with 1 or 2 missing teeth

Health Summary



Special Olympics
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Special Olympics Lions Clubs International **Opening Eyes®**



30.0% of athletes needed a new prescription

Special Olympics **Fit Feet**



37.6% of athletes have skin and nail conditions

Special Olympics **Health Promotion**



51.5% of adult athletes are obese

Special Olympics **FUNfitness**



78.2% of athletes have flexibility problems

Special Olympics **Healthy Hearing**



29.2% of athletes have blocked or partially blocked ear canals

Special Olympics **Special Smiles®**



46.6% of athletes have gingival signs

Special Olympics **Strong Minds**



134 athletes attended their first Strong Minds screening in 2018

534 Healthy Athletes
screenings completed in 2018.



51 athletes screened
in 2018

Screenings led by 3 Clinical Directors:
Erick Hartman, OD
Katie Hash, OD
Michelle Carle, MD

Goals

1. Increase access to eye care for Special Olympics athletes, as well as all people with intellectual disabilities.
2. Raise eye care professionals' awareness of vision and eye health concerns of people with special needs, including difficulties involved in accessing treatment.
3. Train healthcare professionals, students and others about the needs and care management of people with intellectual disabilities.
4. Develop a body of knowledge about vision and eye health of children and adults with special needs.

Through the global partnership of Special Olympics and Lions Clubs International Opening Eyes, Special Olympics athletes receive extensive vision and eye health tests, refraction for those requiring further exam, prescription eyeglasses, protective sports eyewear (either with a prescription or simply protective), and evaluation for referral for follow-up care through Opening Eyes.

Screening Results

- **3.3%** have never had an eye exam
- **23%** have an eye disease
- **30.0%** needed a new prescription

Special Olympics Health Promotion



140 athletes screened
in 2018

Screenings led by 4 Clinical Directors:
Susanna Block, MD, MPH
Jenny Pang, MD
Julie Larsen, RDN
Abby Pattison, RD

Goals

1. Encourage and enhance healthy behaviors, and reduce risky behaviors, related to chronic disease prevention, as well as locally-specific health issues; improve self-efficacy and self-advocacy of people with intellectual disabilities around health and wellness.
2. Provide training and educational opportunities through screening events for allied health providers to learn how to provide quality care and wellness programming to individual with intellectual disabilities.
3. Develop a body of knowledge about the overall health and wellness of children and adults with intellectual disabilities.

At Health Promotion, physicians, nurses, nutritionists and health educators provide clinical screenings in bone density, blood pressure, and BMI and provide education in areas such as nutrition, sun safety, and tobacco cessation, targeting the athletes' needs. Health Promotion is designed to convey and reinforce key concepts on healthy living, healthy lifestyle choices, and locally-specific health issues.

Screening Results

- **26.6%** of adults are overweight
- **51.5%** of adults are obese
- **28.9%** of adults have low bone density
- **13.7%** of children are overweight
- **35.3%** of children are obese
- **40.3%** are exposed to second hand smoke
- **10.3%** use tobacco products

Special Olympics Healthy Hearing



Screenings led by 5 Clinical Directors:

Susan Porter, AuD

Mihwa Kim, AuD

Leah Martin, AuD

Grace Kim, MD

Lisa Illich, MCSD

Healthy Hearing is designed to assess and report the prevalence of hearing loss among Special Olympics athletes as a means of focusing attention on the hearing needs of people with intellectual disabilities. Additionally, Healthy Hearing identifies athletes with hearing loss and ear health problems through hearing testing; notifies/counsels them about needed follow-up care; and whenever possible, provides follow-up care on site at Special Olympics events.

Goals

1. Increase access to ear and hearing care for Special Olympics athletes, as well as all people with intellectual disabilities.
2. Raise hearing health professionals' awareness of the ear and hearing concerns of people with special needs, including difficulties involved in accessing care.
3. When possible, provide a list of regional hearing health professionals who care for people with special needs to all athletes who participate in Healthy Hearing.
4. Develop a body of knowledge about the ear canal hygiene of children and adults with intellectual disabilities.
5. Train healthcare professionals, students and others about the needs and care management of people with intellectual disabilities.

Screening Results

- **29.2%** have a blocked or partially blocked ear canal
- **23.0%** failed PureTone hearing test
- **6.8%** have permanent hearing loss



63 athletes screened
in 2018

Screenings led by 2 Clinical Directors:
Vinai Prakash, DPM
Jeffrey Pentek, DPM

Goals

1. Increase access to foot care for Special Olympics athletes, as well as all people with intellectual disabilities.
2. Raise foot care specialists' awareness of foot concerns of people with special needs, including difficulties involved in accessing treatment.
3. Provide a list of regional foot care specialists who care for people with special needs to all athletes who participate in the Special Olympics Fit Feet program.
4. Develop a body of knowledge about proper foot care of children and adults with special needs.
5. Insure appropriate footwear with regards to the sport in which an athlete is participating as well as fit and comfort.
6. Train healthcare professionals, students, and others about the needs and care management of people with intellectual disabilities.

Special Olympics developed the Fit Feet discipline to evaluate foot and ankle deformities. Athletes receive foot and ankle screenings, are checked for proper shoes and socks, and receive education in proper footwear and care of the feet and toes.

Screening Results

- **36.2%** have gait abnormalities
- **37.6%** have skin or nail conditions
- **21.4%** have bone deformation



25 athletes screened
in 2018

Screenings led by 6 Clinical Directors:

Natasja Ysambart, DPT

Pam Rock, PT

Matt Harnpadoungsataya, DPT

Laura Johnstone, MPT

Penny Coyner, PT, MPT, PCS

Dustin Ellzey, PT

Goals

1. Improve athletes' ability to train and compete in Special Olympics and improve the overall fitness of people with intellectual disabilities.
2. Train healthcare professionals, students and others about the needs and care management of people with intellectual disabilities.
3. Collect, analyze and disseminate data on the health and fitness status and needs of people with intellectual disabilities.
4. Advocate for improved health and wellness policies and programs for people with intellectual disabilities.

FUNfitness provides fitness screenings and education services. FUNfitness, developed in collaboration with the American Physical Therapy Association, provides an assessment of: flexibility of hamstring, calf, shoulder rotator and hip flexor muscles; strength of the abdominal, lower and upper extremity muscles; static and dynamic balance; and aerobic fitness.

Screening Results

- **78.2%** have flexibility problems
- **64.2%** have balance problems
- **53.1%** have strength problems
- **66.3%** exercise 3 or more days most weeks
- **25.2%** exercise less than 3 days most weeks
- **2.5%** have no regular exercise program



121 athletes screened
in 2018

Screenings led by 9 Clinical Directors:

Jessica DeBord, DDS
Travis Nelson, DDS, MSD, MPH
Donna Quinby, DMD, MSD
Aarika Anderson-Elter, DMD
Ashland Doomes, DMD
Kari Sims, DDS, MSD
Ara Greer, DDS
Kim Espinoza, DDS
Takish Ziad, DDS

Goals

1. Increase access to dental care for Special Olympics athletes, as well as all people with intellectual disabilities.
2. Raise dental professionals' awareness of the oral health concerns of people with special needs, including difficulties involved in accessing care.
3. Train healthcare professionals, students and others about the needs and care management of people with intellectual disabilities.
4. Develop a body of knowledge about the oral healthcare needs of children and adults with intellectual disabilities.
5. Provide a list of regional dental professionals who care for people with special needs to all athletes who participate in Special Smiles.

Special Smiles provides Special Olympics athletes with an oral health screening, education about the importance of good oral hygiene habits, instructions in correct tooth brushing and flossing methods, and refers athletes to potential sources of treatment and follow-up care.

Screening Results

- **15.1%** have mouth pain
- **24.2%** have untreated tooth decay
- **27.8%** have missing teeth
- **46.6%** have gingival signs
- **8.4%** received an urgent dental referral

Special Olympics Strong Minds



134 athletes screened
in 2018

Screenings led by 2 Clinical Directors:
Megan Gary, MD
Kara Rice, LICSW

Goals

1. Increase athlete awareness of active coping strategies that can be used in competition and in life.
2. Help athletes to identify ways to manage stress during competition and in daily life.
3. Provide resources on good coping for athletes, coaches & caregivers.
4. Start conversations about stress, coping and emotional wellness.
5. Provide training and experiences for health student and
6. professionals to discuss emotional well-being with individuals with Intellectual Disabilities.

Strong Minds is an interactive learning activity focused on developing adaptive coping skills. Competition provides a natural opportunity to develop active strategies for maintaining emotional wellness under stress, such as: thinking positive thoughts, releasing stress and connecting with others. Athletes learn about and try a few different active coping strategies as they move through the stations. Before exiting, athletes identify the strategies they like best and volunteers provide them with visual reminders to use these tools in competition and in daily life.

National Screening Results

- 75% have been screened
- 85% of athletes have been screened
- 21.4% use active coping strategies

Special Olympics USA Games



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In July of 2018, Seattle hosted the 2018 Special Olympics USA Games. Special Olympics Washington's Clinical Directors advised and led each discipline at Healthy Athletes at USA Games, where 1,770 athletes participated in a total of 5,997 screenings.

Team Washington's delegation of 137 athletes had a 100% attendance rate at Healthy Athletes at USA Games, completing a total of 504 screenings.



In preparation for USA Games, Team Washington athletes participated in Special Olympics Washington's Fit 5 program to improve their health and athletic performance. Team Washington athletes lost on average nearly 10 pounds while participating in the Fit 5 program from February to July of 2018. Team Washington athletes also saw improvements in blood pressure, which is especially significant to note given the short period of time that athletes were participating in Fit 5. Additionally, Team Washington athletes who started Fit 5 with "high risk" blood pressure levels saw an even greater improvement in their blood pressure by July of 2018. Nationally, all USA Games athletes participating in a fitness program showed an increase in fruit and vegetable consumption, daily water intake and weekly exercise frequency.



Pre- and Post- Average Frequencies of Lifestyle Behaviors

Fruit/Vegetables
(servings per day)

3.2 → 3.6

Water
(bottles per day)

2.7 → 3.1

Physical Activity
(days per week)

4.0 → 4.6

Average of **10**
pounds lost

1.6% of athletes
saw BP move to
normative range

29.2% of
athletes saw
improvements in
hypertensive BP



269

athletes participating in 8 weeks of fitness and nutrition programming



Fit 5

Fit 5 is implemented weekly at team practice. Athletes have three simple goals: drink 5 bottles of water a day, eat 5 servings of fruits and vegetables a day, and exercise 5 times a week.



SOfit

SOfit is implemented weekly at school or in a club. The program focuses on four kinds of wellness: nutritional, physical, emotional, and social. Each session of SOfit includes educational activities and physical activity.



TeamBuilder

TeamBuilder is designed for individual athletes that are looking for sport specific training plans to build strength, endurance, and speed.

191

clinical and wellness professionals trained on providing care and education to people with intellectual disabilities through volunteering

What to Expect in 2019



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Healthy Athletes Screenings



Date	Location	Discipline
Saturday, March 2 nd	Wenatchee	FUNfitness Health Promotion Special Smiles Fit Feet
Saturday, April 20 th	Shoreline	Health Promotion
Saturday, April 27 th	Yakima	Health Promotion
Friday, May 3 rd	Spokane	Health Promotion
Saturday, June 1 st	Tacoma	FUNfitness Healthy Hearing Special Smiles Strong Minds
Saturday, July 27 th	Olympia	Special Smiles
Saturday, August 17 th	Everett	FUNfitness Healthy Hearing Opening Eyes Special Smiles Strong Minds Health Promotion
Saturday, November 30 th	Tri - Cities	Opening Eyes Special Smiles Fit Feet



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