USA Games Evaluation

From January to June 2018, twelve Special Olympics programs incorporated fitness programming into their trainings for the USA Games. Data were collected from athletes, coaches, and partners to quantify changes in health indicators from before to after the competition. In total, 769 athletes (72.1%) and 298 non-athletes (27.8%) participated, of which 67.8% identified as male and 32.2% as female. Approximately 69% were adults (ages 20+) and 31% were youth (ages 8-19).

**Weight Loss**

Weight loss did not occur among all participants, but there were significant changes among adults. On average, adult weight after the USA Games was 0.8 kg lower compared to before the Games (p=0.02). Adult *athletes* lost 1.0 kg (p=0.0032), while adult athletes who were *hypertensive or obese at baseline* lost an average of 1.5 kg (p=0.0058, p=0.0007).

**Blood Pressure**

Interestingly, hypertension among athletes increased. On average, systolic blood pressure was 2.7 mmHg higher after the USA Games (p=0.001). Despite these findings, many participants who were *hypertensive prior* to the USA Games improved their blood pressure. Overall, average diastolic blood pressure decreased by 1.5 mmHg among all hypertensive participants (p=0.0327), and as much as 3.1 mmHg among hypertensive youth (p=0.0246).

**Lifestyle**

Among athletes and non-athletes, the average intake of fruits and vegetables increased from 2.7 to 3.1 servings per day (p=0.0014). Daily water intake also increased from 3.2 to 3.6 bottles per day (p=0.0023), and weekly exercise frequency increased from 4.0 to 4.6 days per week (p=0.0003). Many participants who made 1 or 2 improvements in lifestyle behaviors also improved their blood pressure. Of the 139 participants who were matched on pre- and post- health and lifestyle data, 85 individuals (61%) improved in at least 1 of the 3 lifestyle behaviors. *More than half* of those who improved in 1 behavior improved their blood pressure by at least 3 mmHg.

**Movband**

From February 1 to June 30, 2018, Special Olympics launched a USA Games Fitness Challenge – athletes and non-athletes were challenged to walk a total of 1 million steps before the USA Games competition, which is equivalent to 7,000 steps per day. Overall, the average step count among participants in this evaluation was 5,965 steps per day. Participants who lost 1 to 5 kg walked an average of 7,616 steps per day, while those who lost at least 5 kg or more had an average of 7,192 steps per day. Participants who improved their blood pressure by at least 3 mmHg walked an average of 6,819 steps per day.