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The Need for Adaptive Sports in Society

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Abstract

This capstone project presents an exploration and understanding of the perceived benefits of adaptive sports for individuals with disabilities. The exploration has assessed three main types of benefits of adaptive sports (i.e., social, physical, and psychological) as a basis for why adaptive sport should be necessary in society. Research studies done to assess benefits of adaptive sport are also discussed which aid in understanding the findings explored in the project. The project also explores and discusses the gaps and limitations in the research and literature that is available. A major finding from this exploration was that there is less research into the social benefits of exercise and adaptive sports for participants as there is research for the psychological aspects.

Key Words: Athletes, adaptive sports, disabilities

Introduction

According to Townsend (2020), adaptive sport is any modification done to a sport or activity to allow various ability levels that an individual with a disability may have to participate. Additionally, according to Miller and Kaitz (2014), the beginnings of adaptive sports started in the 20th century as a tool for helping to reintegrate injured war veterans back into society.

Reports from individuals including those with disabilities, activities, recreation, leisure, and sport were identified as fundamental rights to all individuals. Additionally, adaptive sport has the potential to shape perceptions and reverse the negative attitudes towards individuals with disabilities (Townsend, 2020). According to Ryan (2014), individuals with severe disabilities are at risk for obesity because they are less to exercise or participate in sports. Similar health concerns have been reported in individuals with cerebral palsy, down syndrome, and autism spectrum disorder. Additionally, adaptive sports promote universal growth and achievement by addressing factors such as teamwork, promoting a sense of belonging and community through peer support, creating opportunities to be celebrated and recognized for achievements, and a strengthened rehabilitation process (Adaptive Sports, 2021). This exploration of adaptive sports is to create an academic paper to demonstrate the benefits of adaptive sport and identify gaps and limitations in the research and literature available. While doing research, three core components stood out. The three core concepts that are explored in this paper are the benefits to those who participate in adaptive sports: social, physical, and psychological. These benefits intertwine to create the experience that an individual has during the sport and the desire to continue to participate in the sport.

Social Benefits to Participation

The first main point that was found in the research was related to the social benefits that participation in adaptive sports has for the individuals. In an article written by Watts in 2011, some of the positive benefits of exercising may be due to the interactions with others when exercising (Plante et al., 2003). Additional social benefits in sporting activities may involve being a part of a team, class, or club which strengthens the social interactions during the event. This was closely related to an article written by Pearsall in 2019, that stated that a sense of community in sports leads to an enhanced sense of well-being and belonging, including for those with diverse and different backgrounds. These two factors indicated that participating in these sports involved working with others which increased their social participation. Additionally, an article written by Napolitano (2011), discussed the benefits seen in sled hockey for those who had disabilities. The article stated that participants indicated that benefits were having fun practicing a sport they love, building a community with others who had similar capabilities and disabilities, and feeling included in the activities (Napolitano, 2011). This relates directly with quotes about social benefits because it continues to discuss the benefits socially that sports have for individuals with disabilities. It also connects the concept that being able to play on a team allows for more diversity in the sport while keeping the capabilities on a level playing field so that all the participants do not feel excluded in the sport.

Another article on social benefits of participation in adaptive sports stated that Valliant, Bezzubek, Daley, Asu (1985) found that athletes who had disabilities reported higher self-esteem, higher satisfaction in life, and were happier than individuals with disabilities who were not athletes (Pryor, 2019). This article talked about how individuals with disabilities who participated in athletics were more likely to feel like they had a purpose and were happier because they felt that they had a group that they fit in with. In addition, there was an article that

discussed how sport was seen as a potential way to combat how disability is seen in society (Townsend, 2020). This article relates to the other article about Pryor's points because as society changes the view of disability through athletics, those who are impacted by a disability are more socially accepted in the realm of athletics.

Physical Benefits to Participation

The second main point is the physical benefit that participation in adaptive athletics has for individuals. Research indicated that people with disabilities who participate in adaptive sport, have physical benefits such as fewer days of pain due to being more active, reductions in depression and anxiety, and can increase their life expectancy due to lowering health risks through activity (Krause, Kjorsivg, 1992). Meaning that participation in adaptive sports allows the participants to be able to increase their physical activity which decreases depression and anxiety from not participating in meaningful activities and decreases joint pain from inactivity. Additionally, physical benefits include increased muscular strength, flexibility, cardiovascular endurance, and mobility, (Wall 2017), which is associated with an increase in physical activity and exercise (US Department of Health and Human Services, 1996). Moreover, an increase in physical activity can decrease health risks such as diabetes (Ryan, 2014). In an additional article, there is a correlation between physical fitness and improvements in body composition. Where physical activities such as mixed aerobics and walking showed a significant improvement in almost all measures of body composition (Ryan, 2014). Additionally, this article also discussed how physical activity and sports participation helped to reduce the levels of stress, anxiety, and depression for children (Fox, 2000).

According to Ryan (2014), individuals with disabilities, because of their sedentary lifestyle, are at an increased risk for health issues including obesity. Additionally, this article

talks about how studies have shown significant improvements in body composition and fitness levels. This is similar to an article by Pryor (2019) which stated that people who are physically active have fewer days of pain and can even increase their life expectancy. In addition, Ryan (2014) also states that physical training for individuals with disabilities has the same effects that nondisabled individuals have when they train. The article also discussed that regular training improves heart functions and cardiovascular fitness levels equally when compared between individuals with disabilities and those who do not have disabilities. Comparing these two articles, both Pryor and Ryan point out that the biggest benefits to physical health of individuals with disability is that it keeps individuals with disabilities active which reduces the risks of obesity that come from a sedentary lifestyle that is possible for individuals with disabilities.

Psychological Benefits to Participation

The third, and final, point that this exploration talks about is the psychological benefit that adaptive sport has. Research suggests that individuals who have disabilities and are more physically active have an increased satisfaction with life and are more adjusted in society (Krause & Kjorsvig, 1992). Additionally, athletes with disabilities who participate in sports have reported an increase in self-confidence, social skills, problem solving skills, and reductions in stress and anxiety (Collingwood & Willet, 1971).

There are also benefits psychologically related to mood and emotion. Emotional benefits are defined as activities that increase an individual's overall state of being. These benefits may include better mood, a more defined self-identity, increased self-esteem, and a better sense of accomplishment (Wall, 2017). Additionally, Watts (2011) suggests that positive psychological benefits can involve working with a team, class, or club to accomplish a goal. Ryan (2014) also

suggests that physical activity can lead to a decrease in depression and anxiety, an increase in positive mood, and overall improved psychological well-being.

Additionally, a study was done in 2011 to understand the benefits that sport had psychologically. It was found that there were significant reductions in mood swings experienced by the participants after taking part in the adaptive sport program. The data stated that there was a 0.01% chance that this outcome was by accident (Lundberg & Smith, 2011). This means that participation in the program truly reduced the participants mood issues, leading to the conclusion that adaptive sport programs are beneficial for participants. A second study done by Walter, indicated similar results in that the findings showed the depression, anxiety, and the positive and negative affects participants experienced significantly improved from pre to post program involvement (Walter, 2021).

Limitations, Gaps in the Research, Questions

While doing research into the benefits of adaptive sports, there were several different quotes that left questions of what more could be explored to understand the benefits of activities, sports, and programs that are available. There were also some research studies that investigated further ways to research and understand why adaptive sports impact participants the way they do.

One of the biggest future research study questions that came up, was found in a study done by Walter on the impact that adaptive sport programs had for veterans. Walter (2021) states that there were significant changes in the physiological outcomes among the veteran participants in immediate and short-term periods, but these gains were not maintained long term after the completion of the program. This led to questions about why the changes were only effective for short term periods of time. Seeing as though some of the research found through this project indicated that individuals with disabilities are at less risk by participating in sports and physical

activities, this study did not investigate the longer-term effects that participants may have experienced if the study was longer. Additionally, questions of what could be done in order to further explore the potential for longer-term maintenance of these benefits came up. This specific study also suggested that follow-up engagement was most likely necessary for continued benefit of the participants (Walter, 2021). This led to questions about why this follow up was not initially part of the study, and why the study had not attempted to increase follow up activity upon realization that increased follow up engagement may be necessary. This study also indicated the future research for studies like this one should include control groups to provide greater clarity and understanding (Walter, 2021). This led to more questions about why there was not a control group when this study was created as it might have been a necessary component in the study to help determine true outcomes of participation in the study.

An additional article that was found in the research stated that very little research had been conducted on the relationship between mental health and its relation to social aspects of exercise (Watts, 2011). An initial question that came up with this was what could possibly lead to more research in this field. Since there is a lot of information available about the benefits of exercise psychologically and physically, are there additionally ways to increase or explore the social benefits of exercise and adaptive sports for individuals with disabilities?

However, in the research, there are limitations in what was available about social benefits of adaptive sports. This led to additional questions about why there was a lack of research in social benefits of exercise and adaptive sport when organized clubs and sports such as running clubs and special Olympics exist, with the mission to integrate sports with social concepts such as team work and inclusion of all individuals regardless of ability. Additionally, Special Olympics is an excellent example of how to integrate sports into the disability community. This

organization creates sporting events for individuals with disabilities and allows the individuals to work as a team and compete in sporting events of their choosing, while also allowing individuals without disabilities to come and cheer them on which increases the social benefits of adaptive sport.

Additionally, there was also a lot of information about barriers that individuals who have disabilities face. Ryan (2014) stated that, limited opportunities for children with disabilities to engage in recreation or athletic activities aggravates the matter further. Meaning without these opportunities to engage in activities, children with disabilities will continue to experience barriers and may potentially have an increase in health risks due to inactivity starting at a young age that may continue into adulthood. Additionally, Napolitano (2021) stated that physical disabilities may encounter more barriers than mental or psychological disabilities which increases the limited access to the benefits that adaptive sports have for participants. Why as a society, haven't there been any changes to allow individuals to participate more fully in sport is one of the questions that comes up from this information. Additionally, with there being an immense amount of research on the benefits to participating in physical activity and adaptive sports, why are there more barriers to participation for individuals with disabilities. An additional question to be answered is what can be done to create more awareness for individuals with disabilities so that those who are able-bodied are more aware of the barriers that others face so that every individual is included in the activity.

Modifying a sport to include all individuals regardless of ability is not a hard task to complete, so why has there not been a shift to make sure all individuals are allowed to participate in the sport which would reduce the barriers individuals with disabilities may experience.

Furthermore, research confirms that there is a broad lack of awareness when it comes to fully including and integrating students with disabilities at universities. With the high levels of participation in youth and professional adaptive sports, there is a concerning lack of college-level competitive adaptive sports (McGinniss, 2020). The decline of activity between youth and professional level sports is extremely concerning as a large portion of individuals who acquire a disability are college age students. This adds additional questions to the previous paragraph of how to create more accessibility and awareness of adaptive sport programs that can be offered for individuals. In addition, there is also a desire to know what caused there be such a large gap between youth adaptive sports and professional adaptive sports. This is something that could have been assumed to have a timeline of sorts to ensure that the programs were made available to the individuals as they grew and developed in life. Furthermore, questions arose about what colleges could do to increase adaptive sport program awareness. There are councils that back colleges and universities to help increase awareness of programs that are available for individuals with disabilities in college and help them to be able to participate in sports on campus and in the area. However, these councils are not always well known which leads to more questions about how to help these types of organizations become more known and common in society to help integrate and include individuals of all abilities.

Conclusion

In closing, there are three core benefits for participants in adaptive sports. They are social, physical, and psychological. These benefits intertwine to create the experience that an individual has during the sport and can create a reason for why these individuals continue to participate in the sport. Additionally, the literature reviews and research, have left many questions to still be answered in regard to the long-term benefits and better ways to conduct

research to understand these benefits. There were also several other studies found that could be replicated or redone with more variables such as control groups and longer periods of time, to study the longer-term effects that adaptive sport has on individuals with disabilities. Adaptive sport has the ability to change the way in which individuals see themselves, interact with others, and can be used to help relieve stress and anxiety for the participant. This type of activity has the potential to change the way society views individuals with disabilities, especially as this type of sport continues to attract individuals who want to participate or have an interest in sports but may be impacted by a disability.

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