Animal Assisted Interventions on a College Campus to Improve Wellness: Adventures with the NMU Wildpups

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INTRODUCTION

• The prevalence of anxiety and stress among university students is well established (Mofatteh, 2020).

There are limited studies documenting the impact of Animal Assisted Interventions (AAI) on a college campus. With the emergence of the COVID-19 pandemic, 71% of college students across the United States reported an increase in perceived stress and anxiety (Son et al., 2020)

Nursing faculty at Northern Michigan University (NMU) implemented an AAI program in Fall 2021 to address the mental health needs of the campus.

BACKGROUND & LITERATURE REVIEW

• AAs involve a human (handler)–animal team that has specialized training in their field.

• AAs are intended to aid in the improvement of others’ physical, cognitive, and psychosocial functioning (Winkle, 2018).

• AAI is a broad umbrella consisting of three sub-types of interventions that animals can provide: animal-assisted activity, animal-assisted education, and animal-assisted therapy, which differ from service and emotional support animals (Winkle, 2018).

• Animal-assisted therapy is offered in a formal therapeutic capacity when a handler-animal team is qualified to provide a professional service such as physical, cognitive, or psychosocial therapies (Winkle, 2018).

• Animal-assisted education involves volunteers who provide educational opportunities to enhance the quality of life of others and include informal general therapy visits (Winkle, 2018).

• Animal-assisted education entails a handler-animal team is qualified to provide educational services on AAI (Winkle, 2018).

• Animal therapy has shown to reduce self-reported and physiological characteristics of stress and anxiety via a decrease in heart rate, self-reported anxiety, and stress levels with no effect noted in blood pressure readings (Em, et al., 2018).

• AAI programs can reduce loneliness, reduce stress and anxiety, decrease depression, and improve self-satisfaction (Blinn et al., 2016; Finc, 2019; House et al., 2018).

• AAI programs help with the retention and socialization of students (Benefit et al., 2018).

• Animal-assisted AAI programs, including support for faculty members to become part of the therapy team, increase the longevity of the program (Blinn & Pousman, 2016).

NEEDS ASSESSMENT

• Before the COVID-19 pandemic, college students generally had increased levels of depression, stress, and anxiety (Mehmood et al., 2012).

• One university reported that 59% of the students on their campus visited the counseling center in the previous 12 months (Eubank & DeVita, 2021).

• Prolonged levels of stress and anxiety may lead to depression, which is a known barrier to student success (Beiter et al., 2020).

• 28% of college students report feeling high levels of stress and 49% of college students feel moderately stressed (American College Health Association, 2020).

• NMU assessed the mental health of its students using the Healthy Minds Study, a national survey that assesses the mental wellness, attitudes, and behaviors of students and compares this data to national findings.

• The results demonstrated:

  • 70% of respondents had a perceived need for help for “emotional or mental health problems” in the previous 12 months.
  • 65% of respondents indicated a current need (at the time of the survey) for help with “emotional or mental health problems”.
  • 40% of respondents said they suffered “academic impairment from mental health” issues on 6 or more days in the previous 4 weeks. This is 13 percentage points higher than the national average (Northern Michigan University, 2021).

RESEARCH QUESTIONS

1. How does participation in an AAI program impact perceived stress and anxiety levels on a rural college campus?

2. How does participation in an AAI program on a rural college campus impact objective signs of stress i.e. blood pressure, respiratory rate, and pulse?

IMPLEMENTATION

• Faculty applied for and received internal NMU grant funding that supported dog therapy training, therapy team registrations, and other supplies needed to create, implement, and sustain an embedded AAI program.

• Faculty worked with other NMU departments to ensure program safety, quality, and sustainability.

• Free nursing faculty worked to prepare their dogs and became registered therapy animals through Pet Partners International.

• Seven events each semester that would take place in the NMU Lydia Olson Library at various times and dates in the hope of accommodating diverse schedules.

• Events times ranged from one-and-a-half hours to two hours in length.

• The program also received the support of community therapy dog teams from the local SuperiorLand Pet Partners chapter.

• A research project to assess the impact of AAI on campus was initiated.

• The goal of the “Wildpups” program was to allow for increased availability of AAI on campus.

RESULTS

• A paired-t test was utilized to compare vital signs prior to and after interacting with the therapy teams.

• The Wilcoxon Signed Rank Test was used to compare pre-intervention and post-intervention survey results.

DISCUSSION & RECOMMENDATIONS

• Mean vital-sign (blood pressure, heart rate, and respiration rate) measurements taken before and after the intervention were within healthy limits as the population assessed were young college students. Yet, a statistically significant decrease was found in the mean values after the subjects interacted with therapy dogs.

• The generalizability of the results is limited secondary to the demographic characteristics of the participants and only being studied on a college campus in a rural location.

• Future recommendations include engaging a more diverse population as the most numerous respondents were Caucasian females aged 18-25 years.

• There was limited faculty and staff member participation, strategizing how to increase faculty and staff engagement would be beneficial in the future.

• There were participants who completed a pre-survey but not a post-survey. In the future, ways to increase survey completion after the events would be beneficial.

• In the qualitative data, a few participants mentioned that the large crowds visiting the Wildpups increased their anxiety, using a larger space would be recommended for events.

• The area used for events was expanded to facilitate the number of participants and increased the number of canine teams as the events were crowded.

• Participants may have attended multiple events they could have completed the survey several times; it is recommended that future research track the number of times an individual participates in the survey.

• As the Wildpups program has become very popular on campus, there is a need for more therapy teams on campus.

• To expand the program to include other species (cats, rabbits).

• The Wildpups program hopes to expand to other areas of AAs.

• Participate in animal-assisted therapy within the counseling center.

• As the program has been embedded on NMU, there is an opportunity to provide animal-assisted education.

• Future research efforts plan to assess how animal therapy impacts retention, resilience, and admission rates.

• Future research can assess the stress cues in the therapy dogs and the stress of the handlers during events.