Outdoor Spaces

By Madison Burnard, Tiffany Bass, Bianca Cannata, and Mae Vine





Introduction

- - - -

We are pleased to share our strategic plan with you.

Schreyer Honors College at Pennsylvania State University is one of the top honors programs in the nation. Our vision is to educate students who will have an important and ethical influence in the world, affecting academic, professional, civic, social, and business outcomes.

And, in order to do that, we need to make sure their health and wellness is a priority.

Our vision is to create outdoor areas for the Schreyer Honors College, where students can go outside and relax throughout their stressful semesters. Whether they want to do their homework at one of the tables or take a nap on the hammock, this will be an area that will meet the student's needs and be in a convenient location. We want to provide a community that supports students' success, well-being, wellness, and health.

Throughout the next five years, we have a goal to create two calming outdoor locales near each of the honors college dorms. We see this being vital to the students when the weather gets nice and they want a place to get work done or just to simply be at ease.

Mission Statement

Our mission is to enable honors students to work and study in a manner that is most beneficial to not only their learning and understanding, but also to their mental, social, and physical health and wellness.

Vision Statement

We want to provide an outdoor location for honor students that will support their success, well-being, wellness, and health.

Location

- - - -

Schreyer Honors College can create two outdoor locations near their residence halls, Atherton and Simmons, to give their students a place to spend time outside. Simmons has a courtyard near the main entrance, where the outdoor area would be located. It will be beneficial for the residents within the hall because of the close location. This location was chosen because of the large grass area that is underutilized, and this location is close to one of the main roads, Shortlidge Road, which will allow other students to be aware of the location and use it. Atherton is in a more private location compared to Simmons. The outdoor area will be located in the courtyard near its main entrance. Although Atherton's location is





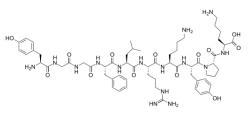
smaller than Simmons, this location was chosen because it will allow the entrance area to be more appealing and more easily accessible. There are currently benches located in this area of Atherton, but we want more students to have a place to sit and be productive in a location that many individuals will see. Additionally, both of these locations can be used by Schreyer Honors College to host events, like SHO Time, which is the Schreyer Honors Orientation. Additionally, we hope that Schreyer clubs utilize these locations to host meetings. The majority of students that live in Atherton and Simmons are Schreyer scholars, which will give them a location in their own backyard to provide a relaxing location to get their work done or enjoy the weather.

Mental Health Benefits

The use of outdoor spaces will enhance Schreyer's goal of providing scholars with a favorable environment to achieve both academic and personal success. More specifically, outdoor spaces can serve to help students' mental health and give them a change of scenery to boost morale. Outdoor environments have proven to be helpful in minimizing stress and anxiety (Thompson). An important aspect to consider is the immersion into nature, which is exactly what we propose with the addition of outdoor spaces. Research has found that there is a significant difference in the effectiveness of outdoor areas in comparison to indoor imitations (Pearson). For example, the relaxation room at Penn State brings nature indoors in the form of plants, light therapy boxes, and zen gardens. While this may be helpful for combatting anxiety and stress, research shows this is not the most effective method. There are many forms of depression and anxiety and seasonal affective disorder (SAD), which is certainly something worth mentioning considering Penn State's typical long and harsh winters. SAD is a form of depression relating to the change in seasons. It is most prominent during the change from fall into winter, which for Penn Staters is about five out of the nine months we attend school. This proposal strongly emphasizes the ability for these outdoor spaces to be utilized throughout the entirety of the fall, spring, and summer semesters. Over 41% of college students reported having significant anxiety and approximately 36% of college students nationwide struggle with depression (Mistler). Mental health of college students is a growing concern, and it would be nothing short of injustice to our students to ignore these alarming and continually increasing statistics.

Other Benefits

Mental health is not the only benefit of having study spaces outside. According to Ashford University, there are several other benefits of studying outdoors, one of which is an increase in energy levels. Vitamin D is naturally provided to humans via sunlight, and can help



enhance your immune system, enhance your brain function, enhance your mood, and increase your energy levels. Having outdoor spaces that allow students to work in outdoor spaces, promotes their learning by keeping them healthy with a strong immune system. In college environments, it is easy for students to get sick frequently, as they live in close proximity and often do not have a lot of time for sleep, healthy eating, and exercise. Being able to work in an environment that can strengthen their immune system and enable their bodies to fight infections and viruses will ultimately enable them to be better students. Furthermore, working outside

enables students to be more productive through enhanced brain activity and energy levels. When one's brain is functioning more efficiently and they have increased energy levels, they are more able to focus on their work and utilize their problem-solving skills more accurately. In addition to this, it is very clear that honors students, and college students in general, have a lot of stress due to academics. This issue is especially evident in Penn State students. According to the Spring 2018 Penn State Student Health Assessment, "31% of Penn State students say stress affected their academic performance in the last 12 months" (Penn State Student Health Assessment Spring 2018). Going off of this, cortisol is a steroid hormone that increases in the body in response to stress. Studying outside has been found to decrease cortisol levels by 12% and increase relaxation levels by 55%. Being stressed can frequently serve as a distraction, especially when it comes to school work, so decreasing these levels while students study outside can enable them to be more productive. Lastly, sunlight increases the body's release of endorphins. Endorphins are a neurotransmitter that are released from the pituitary gland in the brain, and trigger a positive feeling or feeling of happiness in an individual. A release of endorphins in students while studying will enable them to be more encouraged, more motivated, and more ready to conquer their workload.

Background

While researching other Big Ten universities, it is evident that they all seem to have the common theme of lacking outdoor areas. The University of Wisconsin has the Memorial Union Terrace, which they say "the Terrace has remained a favorite spot for UW students, faculty, staff, Union members and anyone else looking to enjoy a sunny day or beautiful evening in the summer, spring or fall," but it is still not enough (Terrace at Memorial Union). We believe that this is due to the location of these universities because they have a range of different weather patterns and tend to be colder in the



winter. When looking at schools in warmer areas, they tend to have a lot more places for students to sit outside and socialize or get work done. For example, the University of Miami has many different outdoor areas, one of them called the Lakeside Patio, which links the Whitten University Center and the Shalala Student Center along Lake Osceola.

Although weather may seem to be a recurring issue, this should not discourage the University from providing students with outdoor spaces to facilitate their learning. While State College is notorious for having dark gloomy days and nonoptimal weather, there are often sunny, warm days that students would like to work or study outside, but are unable to due to a lack of spaces.

Additionally, thousands of students participate in the summer session annually, especially first year students in the program LEAP, but still lack spaces to study outdoors when the weather is warm and clear during this season.

What We Want to Put

Hammocks- Hammocks tend to serve as a source of relaxation for many, which is why we want



to include them in our outdoor space design. Although, Penn State is ceasing hammock use because of the damage being done to trees through policy AD57, we plan for the hammocks in these areas to be connected to metal chains, which will be hooked onto wooden poles. The reason hammocks are essential is that they can help reduce stress, which is something that many Penn State students suffer from. The natural swinging motion of hammock helps people relax, lower blood pressure, and reduce stress levels in the body. Whether students want to take a nap, read a book for pleasure, or study for an

exam, they can do it in one of the hammocks in these locations.

<u>Chairs/Tables</u>- Chairs and tables are both essential for students to get their work done. We are planning to offer a variety of seating arrangements for the students. There will be picnic tables, which can be utilized for groups to sit together and do work or play a board game. Additionally, we will have tables that are meant for singular use because some students prefer to work alone. These tables will offer a setting of isolation to complete work alone, which will allow them to focus on their personal academic needs. We will place Adirondack chairs throughout the empty areas to provide more locations for students to enjoy the outdoors.



Water Fountain- The intended purpose for including a water fountain is to create a calm and



tranquil space for students to interact and get work done. There are obviously many study areas for students across campus, however, study areas can typically become crowded and hectic. Studies have shown that workspaces often over stimulate us and distract us from our work, therefore, inducing more stress than it is minimizing (Reisinger). It has been found that listening to natural sounds, like water, help to reduce stress and induce a sense of relaxation (Thoma). Also, the addition of a water fountain may serve to attract

certain wildlife which would add to this soothing aesthetic we aim to create.

<u>Garden/Greenery</u>- The main purpose for the greenery and garden aspect of our study areas is for aesthetic appeal. If students see an area that is visually pleasing, they will be more inclined to utilize the space. Additionally, trees and greenery in our



study space will provide it with a type of enclosed comfort, rather than just a grassy area which can also be appealing to students. Sources claim that there are psychological benefits of plants, many of which relate to work areas (Hillside). For example, plants and gardening have been found to improve moods, relieve stress and anxiety, and prolong attention span, all of which would allow students to work more effectively and efficiently in these spaces.

<u>Aromatherapy</u>- We will implement various plants in order to provide aromatherapy. One aromatic plant that we use in the study areas is lavender. Lavender thrives in areas that have warm summers, cold winters (but no colder than -20 Fahrenheit), and weather that is not overly



humid, all of which are criteria that State College weather fits (Zone 5 Lavender Plants – Growing Cold Hardy Lavender Varieties). The smell of lavender is known to reduce stress and anxiety levels, which would be beneficial in an outdoor study area (Bowman). Another aromatic plant that we would implement is gardening, which can grow and thrive in warm or cold areas, meaning it would be successful in all seasons in State College. Additionally, the smell of gardenia has been shown to reduce stress and depression, and improve

memory, which would both be effective in a study area (Lawson). As stated in the garden/greenery component, we plan to have several other plants in the study areas, but these would be the main two that would be used for aromatherapy purposes.

Throughout these green spaces, there will be little signs located in front of a specific plant or flower with the name on it. This will allow for people to learn more about the greenery and plants and provide an educational element to these areas.

In order to prevent stealing, we are going to nail down the chairs, tables, water fountain, and the poles for the hammocks. Additionally, students will have the option to rent out a hammock from an office inside the building where the area is located, or they can use their own. If the student rents out the hammock they will have to swipe their student ID, so there is a trail of who used it. They will need to return the hammock after they use it, and a Schreyer official will make sure to take it once they leave for the day. Even though students who don't have hammocks will only be able to utilize this during work hours, it will prevent damage and stealing of the hammocks.

Measuring Effectiveness

- - - -

In order to measure effectiveness, we believe that the most efficient mechanism would be to administer a survey at the initiation of and termination of the first school year that the outdoor spaces are available to students. A survey for this duration will be more effective than a

semester long survey because it would allow students to have experienced the areas in all seasons that it is offered.



We would plan to offer a survey to all Schreyer students living in Simmons/Atherton asking questions about their motivation, stress levels, mental health, and physical health. As mentioned in our research aspect of this strategic plan, we noted that outdoor study spaces have been proven to be effective in regards to student motivation, stress, and general health (mental, physical, etc.). By having a survey/assessment, similar to the Penn State Health

Assessment, for strictly honors students residing in the honors dorms, we will be able to measure whether our outdoor spaces had the effect on students that we intended then to have.

Additionally, we would anticipate a Schreyer staff member, or the Residence Life Coordinator of the respective buildings (Atherton and Simmons) to be responsible for monitoring the use of these spaces. A few times a week at various times, they could look outside or go outside and account for the number of students using it, and we would use this to determine at what times of the day and in what weather conditions the spaces are being used the most, or the use is consistent.

People Who We Would Meet With and Why

- - - -

In order to get a better understanding and help to complete our goal, we reached out to the Office of Physical Plant, a Master Gardener extension at Penn State, and the College of Agriculture Sciences.

The Office of Physical Plant (OPP) are experts in planning, design, and handling maintenance. OPP handles campus master planning, real estate, and space management. To achieve our goals, we will need to fill out multiple forms and understand policies.

The Building and Grounds division of OPP handles the maintenance, custodial, and landscaping needs at the University Park campus. In order for our outdoor space to be kept clean and working, we will need the service of maintenance. To put in hammocks, chairs, greenery, we will need grounds and equipment to provide specialty services, including Landscape Operations and Snow Removal.



A Master Gardener can use their horticultural expertise to help us create the perfect green space. The Master Gardener extension provides educational training classes that are conducted by Penn State faculty and Extension staff. Using this resource will help us develop our green space and allows students to help maintain the garden.



Additionally, students from the Landscape Contracting Major in the College of Agriculture Science can assist in the design of these outdoor areas. This will allow for students to have an opinion on what is going in these spaces, as well as providing an educational experience for students within this field.

Timeline and Goals

After conducting a poll within the Presidential Leadership Academy, it was decided that Simmons would be the preferable area for the initiation of our project. So, within the first year of this process we would only implement this in the Simmons courtyard. This would give the student body an opportunity to experience the newly added amenities and form an opinion before expansion. After that, we would like to conduct a deliberation among the Schreyer Honors Students to encourage them to voice their opinions and let us know what they feel can be changed within outdoor areas. With this information, we will decide what could be added when we expand to Atherton within the next year or so. We hope to use this smaller scale expansion as a vessel to gain a more holistic understanding of what students want to gain from the outdoor spaces so that this could become a campus wide initiative. Ideally, we would hope to see the use of outdoor areas in many of our common areas across campus.



Conclusion

- - - -

Ultimately, we want these areas to benefit not only our students' academic performance, but their mental health as well. Whether it's a place to do a study group or sit alone, these locations will be disposable to them to use at their discretion. It's necessary to tend to the needs of our students, especially their success, health, wellness and well-being. We believe by providing these outdoor areas for our students, will allow them to have a better and healthier college experience.



Works Cited

- Bowman, Joe, and Deborah Weatherspoon. "What Lavender Can Do for You." *Healthline*, Healthline, 16 June 2016, www.healthline.com/health/what-lavender-can-do-for-you.
- Hillside. "Psychological Benefits of Plants & Horticulture Therapy." *Hillside*, 18 Oct. 2019, hside.org/plants-improve-mental-physical-health/.
- Lawson, Catherine. "Gardenia Essential Oil Benefits and Uses." *Wellness Aromas*, Wellness Aromas, 21 Dec. 2019, www.wellnessaromas.com/gardenia-essential-oil/.
- Mistler, Brian J, et al. "The Association for University and College Counseling Center Directors Annual Survey." *CMC Global*, files.cmcglobal.com/Monograph_2012_AUCCCD_Public.pdf.
- Pearson, David G, and Tony Craig. "The Great Outdoors? Exploring the Mental Health Benefits of Natural Environments." *Frontiers in Psychology*, Frontiers Media S.A., 21 Oct. 2014, www.ncbi.nlm.nih.gov/pmc/articles/PMC4204431/#B36.
- "Penn State Student Health Assessment Spring 2018." *Penn State Student Affairs*, studentaffairs.psu.edu/sites/default/files/PSSHA_2018_FINAL-28tfkde.pdf.
- Reisinger, Holger. "Why Bird Sounds Make Us More Productive." *Jabra Blog*, Jabra, 18 July 2019, www.jabra.com/blog/bird-sounds-make-us-productive/.
- "Terrace at Memorial Union." *Terrace at Memorial Union " Wisconsin Union*, union.wisc.edu/visit/terrace-at-the-memorial-union/.
- Thoma, Myriam Verena, et al. "Preliminary Evidence: the Stress-Reducing Effect of Listening to Water Sounds Depends on Somatic Complaints: A Randomized Trial." *Medicine*, Wolters Kluwer Health, Feb. 2018, www.ncbi.nlm.nih.gov/pmc/articles/PMC5842016/.
- Thompson, Catharine Ward, et al. "More Green Space Is Linked to Less Stress in Deprived Communities: Evidence from Salivary Cortisol Patterns." *Landscape and Urban Planning*, Elsevier, 20 Jan. 2012, www.sciencedirect.com/science/article/pii/S0169204611003665?via=ihub.
- "Zone 5 Lavender Plants Growing Cold Hardy Lavender Varieties." *Gardening Know How*, 4 Apr. 2018, www.gardeningknowhow.com/garden-how-to/gardening-by-zone/zone-5/zone-5-lavender-plants.htm.