A Study on the Future of Work: The Right Technology in the Right Places at NYU SPS

White Paper

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Introduction

Background

The rapid advancement of technology has transformed the way people work and learn, and the recent global pandemic has further accelerated this shift. As educational institutions adapt to these changes, they must ensure that their technology infrastructure supports the evolving needs of students, faculty, and staff. New York University's School of Professional Studies (NYU SPS) has a network of workstations across its locations, providing students with access to various software applications and resources. However, due to the changing nature of work and study patterns, there is a growing need to reassess the effectiveness of these workstations and the technology infrastructure at NYU SPS.

Objectives of the Study (Survey)

The primary goal of this study is to understand the current technology needs and preferences of NYU SPS students, faculty, and administration, and to propose a technology plan that optimally supports learning and working experiences at various SPS locations. The specific objectives are as follows:

1. Identify the factors influencing students' usage of school workstations and their preferences for study locations.
2. Assess the software and technology requirements of students and faculty, including the use of personal devices and school lab computers.
3. Evaluate the effectiveness of the existing technology infrastructure at NYU SPS and identify potential areas for improvement.

4. Develop a comprehensive technology plan that addresses the needs of stakeholders and aligns with the changing nature of work and learning environments.

Scope of the Study

The study focuses on the technology needs and preferences of students, faculty, and administration at NYU SPS, primarily addressing the use of workstations, software, and other technology resources. To achieve this, a comprehensive survey was conducted, targeting students, faculty, and staff at NYU SPS. The collected data was analyzed to identify trends and patterns, which were then used to develop recommendations for an updated technology plan.

The study does not cover the technology needs of other NYU schools, nor does it delve into the broader aspects of remote learning, such as curriculum design or pedagogical approaches. Instead, the focus is primarily on the technology infrastructure and resources that support learning and work at NYU SPS locations.

Methodology

Survey Design

The survey included questions pertaining to the students' academic programs, gender, study habits, and technology usage. The questions were as follows:

- What degree program, course, or certificate are you currently enrolled in?
- What is your gender?
- Where do you usually do MOST of your studying?
- What computer do you usually use for MOST of your studying?
- What is the reason you use school computers when you do? (select all that apply)
- What is the reason you DON'T use school computers? (select all that apply)
- The software/technologies used for your study, do you use them on your own computer or does it have to be run on a school lab computer?

Data Collection

The survey was distributed to a diverse sample of NYU SPS students to ensure representation from different academic programs and demographic backgrounds. The survey was conducted online, allowing for efficient data collection and easy access for participants.

Data Analysis

Once the survey responses were collected, the data was analyzed using descriptive statistics to identify trends and patterns in students' technology usage and preferences. This

involved calculating percentages, averages, and other relevant metrics to better understand the needs and habits of the student population.

Technology Proposal Development

Based on the insights obtained from the survey data analysis, a technology plan was developed to address the identified needs and preferences of NYU SPS students. This proposal aimed to optimize the allocation of workstations, provide access to specialized software, and incorporate hoteling or hot seating concepts, among other recommendations.

The approach and methodology employed in this project allowed for a comprehensive understanding of the technology needs and preferences of NYU SPS students. By conducting a well-designed survey and analyzing the data, valuable insights were gained, which were used to develop a technology plan tailored to the specific requirements of the student population. The proposed technology plan aims to enhance the learning experience at NYU SPS and ensure the institution remains adaptive to the changing landscape of education and technology.

Results

In the survey, 49% of participating students were majoring in Management and Systems, while 27.5% were in Integrated Marketing, 3.9% in Human Resources Management, and 2.0% in Project Management. Additionally, 17.6% of the students didn't specify their major. Of the survey participants, 68.6% were female, and 31.4% were male. 98% of participants reported that they usually use their own laptops for most of their studying, while only 2% relied on school computers.

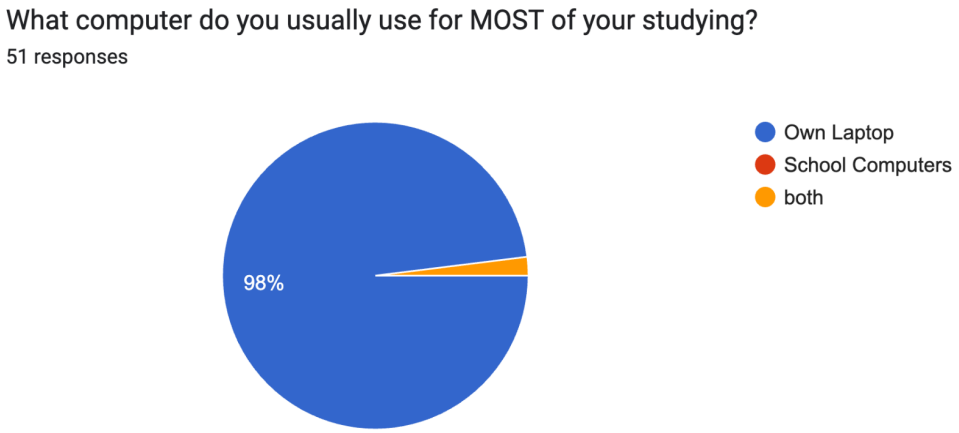

Figure 1

The survey asked participants about their preferred location for doing most of their studying. The majority of respondents, 72.5%, indicated that they usually study at home. Meanwhile, 13.7% of the participants preferred to study at the Midtown Center, 9.8% chose Bobst Library, and 3.9% opted for Washington Square as their primary study location.

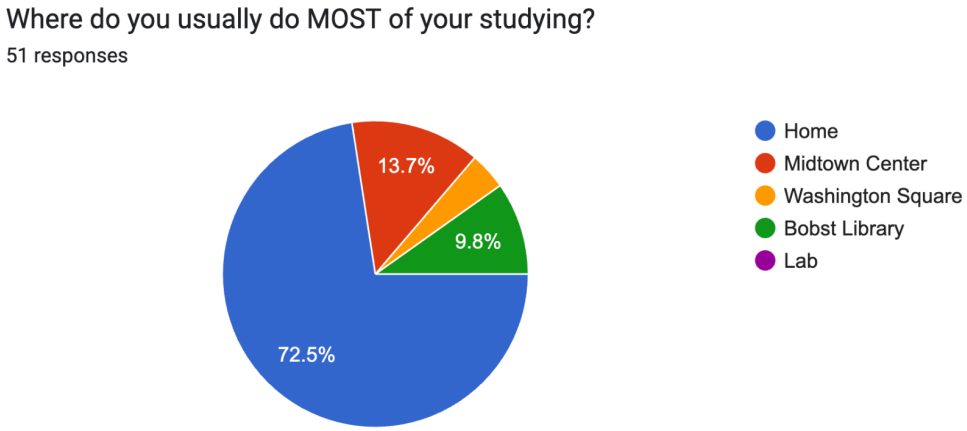

Figure 2

The survey participants were asked about their reasons for using school computers when they do. Among the respondents, 54.9% reported using school computers due to the availability of specific software required for their coursework, which was not accessible on their personal devices. A stable internet connection was the reason for 17.6% of participants, while 13.7% used school computers because they were faster than their personal devices. Additionally, 27.5% of the respondents preferred the environment or setting of the school computer lab. On the other hand, 4% of participants did not use school computers at all. A small percentage of students, 2%, used school computers because they forgot to bring their personal laptops, and another 2% used them for printing purposes.

The survey participants were asked about their reasons for not using school computers. The majority, 80.4%, expressed a preference for using their own laptops. Other reasons included school computers being too slow (15.7%), the need to use specific software not available on school computers (17.6%), insufficient PC/Mac availability (9.8%), and a preference for studying from home (23%).

The survey participants were asked about their use of software and technologies for their studies, specifically whether they use them on their own computers or need to run them on a school lab computer. The majority, 82.4%, reported using software and technologies on their own computers. However, 5.9% of respondents mentioned that they had to run certain software or technologies on school lab computers. Lastly, 11.8% of participants indicated that their choice depended on the specific software or technology in question.

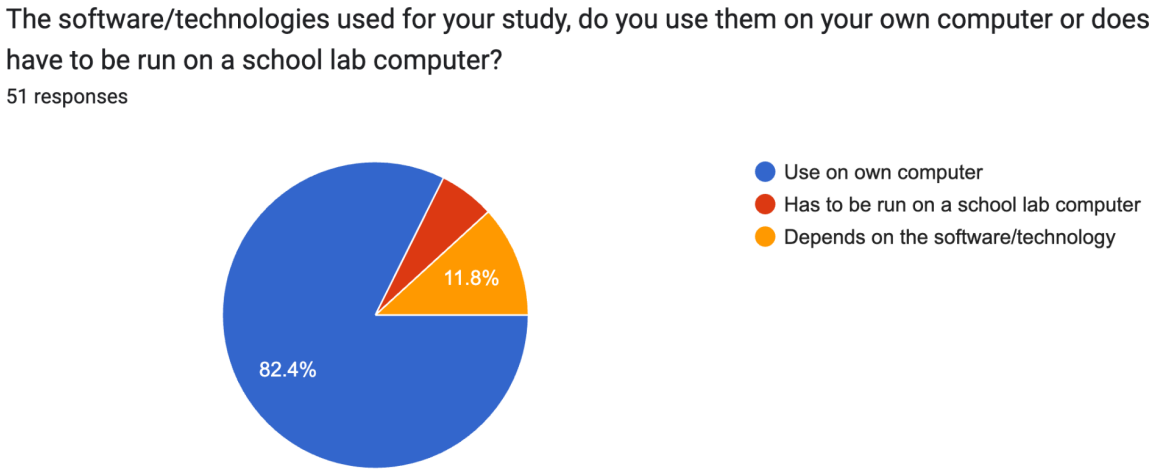

Figure 3

Repository of Data Sets and documents

The survey data collected for the project may be found at:
https://github.com/YimingWang6258/applied_project/blob/main/The%20Right%20Technology%20in%20the%20Right%20Places%20at%20NYU%20SPS%20%20%20(Responses).xlsx

The full data visualization may be found at:
https://github.com/YimingWang6258/applied_project/blob/main/survey_data_visualization.pdf

The survey may be found at:
https://docs.google.com/forms/d/e/1FAIpQLSeMbVhe7ExgbYSfdkl_L6NFgI7WJ-2HpLD3bf3pgwGm8T8XTg/viewform?usp=sf_link

The white paper may be found at:
https://docs.google.com/document/d/1W9KPsF7_yE8ToDAUYOo2xvhBOcJNXjHWr3AVs5FaD0E/edit?usp=sharing

The technology plan may be found at:
https://docs.google.com/document/d/1j_vMYnU-8zCB3gQc7Rp7Of1hgTppBMEXUqHaCbAxGYU/edit?usp=sharing

Recommendations

Based on the survey findings and data analysis, the following recommendations are proposed to enhance the technology infrastructure and support for students, faculty, and administration at NYU SPS locations:

Personal Device Support

Since the majority of students (98%) reported using their personal devices for studying, it is crucial to ensure that the university's technology infrastructure supports the seamless integration of personal devices. This includes providing reliable Wi-Fi connectivity, sufficient power outlets, and secure access to university resources.

Software Accessibility

The primary reason students cited for using school computers was the availability of specific software required for coursework (54.9%). To accommodate this need, NYU SPS should invest in providing remote access to specialized software applications, enabling students to access and use these tools from their personal devices, regardless of their study location.

Optimize Workstation Availability and Configuration

Addressing the concerns of students who found school computers too slow (15.7%) or insufficient in availability (9.8%), it is recommended that NYU SPS reassess its workstation offerings. This can include upgrading hardware components, optimizing software configurations, and ensuring an adequate number of workstations are available in computer labs.

Flexible Learning Spaces

With 72.5% of students preferring to study at home, it is essential to create flexible learning spaces on campus that cater to diverse learning preferences. This could include providing quiet study areas, collaborative workspaces, and various seating options to accommodate different study styles and preferences.

Online Resources and Collaboration Tools

To support remote learning and collaboration, NYU SPS should continue investing in online resources and tools that facilitate communication, file-sharing, and project management. This includes providing access to cloud storage services, video conferencing platforms, and collaborative software applications.

Training and Support

To ensure that students, faculty, and administration can effectively utilize the available technology resources, it is recommended that NYU SPS offer training sessions and support materials on software applications, online tools, and technology best practices. This can include workshops, webinars, and online resources such as tutorials and guides.

Continuous Feedback and Improvement

To stay informed about the evolving technology needs of the NYU SPS community, it is vital to regularly solicit feedback from students, faculty, and administration. This can be achieved through periodic surveys, focus groups, or suggestion boxes. The gathered feedback

should be used to inform ongoing improvements and updates to the university's technology infrastructure and support.

By implementing these recommendations, NYU SPS can better support the technology needs of its students, faculty, and administration, ultimately enhancing the overall learning and working experiences at various SPS locations.

Conclusion

This study aimed to assess the technology needs of students, faculty, and administration at NYU SPS locations. By conducting a comprehensive survey and analyzing the gathered data, valuable insights were obtained on the preferences and requirements of the NYU SPS community in terms of technology infrastructure and support.

The study revealed that the majority of students prefer to use their personal devices for studying and have diverse preferences in terms of study locations. It also identified the importance of software accessibility, workstation performance and availability, and the need for flexible learning spaces. Based on these findings, a series of recommendations were proposed to optimize technology resources and better address the needs of the NYU SPS community.

Implementing the suggested recommendations will help NYU SPS create a more supportive and adaptive technology environment for its students, faculty, and administration. This, in turn, will enhance the learning and working experiences at various SPS locations, ultimately contributing to the success of the university and its community.

By regularly reviewing and updating its technology infrastructure based on feedback and evolving needs, NYU SPS can continue to adapt to the changing landscape of work and education, ensuring that it remains at the forefront of providing an exceptional educational experience for its students.