Innovating Transfer Efficiency:

The MapMyPath Case Study

Introduction

In the quest for a "Talent Strong Texas," the Texas Higher Education Coordinating Board (THECB) has set ambitious goals, including ensuring that 60% of Texans ages 25-64 will hold a valuable postsecondary credential by 2030, and facilitating the completion of such credentials for 550,000 students annually. Central to these objectives is optimizing the transfer process—a system currently fraught with inefficiencies that, according to the Texas Transfer Efficiency Report (2021), result in an average of 9.8 credit hours wasted per transferring student. This impedes educational progress and represents a significant financial loss, averaging \$110 per credit hour—a substantial burden on Texas students.

In response to this challenge, THECB has spearheaded the development of MapMyPath (MMP), a pioneering platform designed to empower students by providing a clear, accessible pathway for transferring credits between institutions. MMP stands as a beacon of innovation aimed at preserving students' time, money, and effort, thereby contributing directly to the state's educational and economic vitality. By ensuring students can seamlessly map their educational journey, MMP is critical in realizing a more efficient, effective, and student-centered higher education landscape in Texas.

Background

In higher education, the transfer process between institutions has long been a labyrinthine challenge for students. The Texas Transfer Efficiency Report, alongside insights gathered from over 200 stakeholders—including adult transfer students, counselors, and registrar employees—has illuminated the core difficulties those navigating this terrain face.

The primary issues identified were:

- Lack of Clarity: Students often find themselves confused regarding course equivalencies between institutions.
- Inconsistent Processes: The absence of a standardized and transparent transfer process compounds the uncertainty and complexity.
- Limited Support: Accessible support and guidance are frequently unavailable until after enrollment, leaving prospective transfer students to navigate the preliminary stages of the process without institutional assistance.
- Restricted Autonomy: The discovery of new transfer pathways is hindered by a lack of empowerment for students, as many institutions handle credit transfers on an individual, case-by-case basis, often behind closed doors.

MapMyPath is poised to address these challenges head-on. By leveraging data that public institutions of higher education are mandated to provide, MMP introduces a new level of transparency. It allows students to visualize degree plans of interest and understand how their existing credits will apply to new institutions in real-time. This initiative promises to demystify the transfer process and empower students with the agency to chart their educational journeys with confidence and self-sufficiency.

Product Strategy

Our product strategy was meticulously crafted with the end-user in mind, aiming to alleviate the pain points identified through our comprehensive research. Recognizing the unique position of our state agency, we capitalized on the data that educational institutions are legally obliged to provide, turning it into a powerful tool for transparency and empowerment.

We initiated our strategy by developing detailed user personas for our key stakeholders: Advisors, Adult Learners, Secondary Students, and Transfer Students. Each group brought distinct perspectives and objectives yet shared common challenges in the transfer process. For instance, Adult Learners sought flexibility and clarity to balance education with life commitments, while Transfer

Students sought a precise and reliable roadmap to navigate the complexities of credit articulation.

Armed with these personas and a clear understanding of their unique challenges, we turned to the rich data at our disposal. This allowed us to envision a suite of features tailored to meet these needs—from ambitious, long-term goals to essential, immediate functionalities.

We meticulously prioritized these features in collaboration with Product Owners and Subject Matter Experts. This collaborative effort culminated in a "Now, Next, Later" product roadmap, ensuring a strategic launch with a robust Minimum Viable Product (MVP) while setting the stage for future enhancements. For example, the MVP focused on core functionalities like a comprehensive credit equivalency database, while later phases would introduce advanced predictive analytics for educational pathways.

This strategic approach ensured that we addressed the most critical needs first and laid a foundation for continuous improvement and adaptation to the evolving landscape of higher education.

Development Process

In our Agile development journey, we meticulously prioritized features that promised the most significant alleviation of our user's pain points, all within the operational parameters of a State agency. Utilizing the MoSCoW method—a prioritization technique that categorizes features into Must have, Should have, Could have, and Won't have—we actively engaged stakeholders in determining the placement of features within the "Now, Next, or Later" swim lanes of our Product Roadmap.

This method facilitated a democratic approach, ensuring that the most critical features were addressed promptly. Our sprints were meticulously organized across design, development, and testing phases to maximize efficiency and output.

We honed in on features that leveraged our access to public institutional data, focusing on how to present this information user-friendly. This included integrating degree plans, institutional metrics such as graduation rates and

enrollment numbers, and detailed credit equivalency information—all aimed at empowering students with the knowledge to make informed decisions about their educational futures.

Our Agile cadence consisted of 2-week sprints, with design reviews conducted twice weekly to ensure continuous alignment with stakeholder vision and user needs. User testing sessions were held once per sprint, providing invaluable feedback integrated into the subsequent sprint's focus. Development and testing phases were staggered; as the development team implemented the designs, the testing team conducted qualitative assessments of the previous sprint's output concurrently.

The culmination of each feature's journey was a rigorous User Acceptance Testing (UAT) phase, where stakeholders and our team ensured that the functionality met the established criteria. Any issues identified during UAT were promptly addressed, ensuring that each feature met our high quality and user satisfaction standards before its release.

Challenges and Solutions

One of the most significant hurdles we encountered was the accuracy of course sequences within the degree plans provided by institutions. The integrity of these sequences was paramount, as any discrepancies could lead to misinformation and undermine the trust in MapMyPath. Upon meticulously reviewing the institutional data, we identified inconsistencies that required resolution at the source—by the institutions themselves.

To tackle this, we spearheaded a collaborative effort, bringing together stakeholders from the Data, Development, and Advising teams and representatives from the institutions. Our collective endeavor led to creating a standardized template to streamline the data correction process, addressing a broad spectrum of concerns.

We piloted this template with a select group of institutions, serving as a model for others. This initiative evolved into a systematic, recurring submission cycle, ensuring that degree plans and course information remained current and accurate.

While this strategy laid the groundwork for a sustainable long-term solution, it was not immediately conducive to our MVP launch timeline. After extensive deliberation with stakeholders, we decided to refine the scope of data included in the MVP. We concentrated our efforts on two key regions, aligning with established feeder patterns and ensuring a robust dataset for those areas. This regional focus allowed us to provide a reliable transfer tool for the MVP, setting a precedent for quality and laying the foundation for statewide expansion.

Initially targeting these regions, we could analyze user interactions and transfer patterns intensively, gaining valuable insights that would inform the subsequent phases of MapMyPath's development. This strategic decision ensured that we launched with a functional and trustworthy product, setting the stage for future growth and refinement.

Lessons Learned

Reflecting on the MapMyPath project, one of the most salient lessons I absorbed was the importance of data integrity in a product's lifecycle. As a state agency representative, the imperative to present accurate and complete data is heightened by the profound impact this information may have on users' educational and career trajectories. This experience has underscored the necessity of a deep understanding of the data we work with and the development of robust strategies to address any discrepancies from the outset.

Furthermore, the project crystallized the value of stakeholder engagement in risk assessment and management. While optimism is a common starting point for new initiatives, it is crucial to temper this with the pragmatic insights of a diverse group of stakeholders. Ensuring that the right people are at the table from the beginning can provide a multifaceted understanding of potential risks and their implications for the product.

Moving forward, these insights will be integral to my approach to product management. I plan to institute rigorous data validation protocols and foster an environment where stakeholder input is not only sought but is also a cornerstone of the decision-making process. By doing so, I aim to mitigate risks more effectively and deliver products that meet the high standards of our users and our agency.

Conclusion

The journey of developing MapMyPath has been a testament to the transformative power of data-driven solutions in addressing complex educational challenges. As we reflect on the process from conception to deployment, the lessons learned extend far beyond the technical aspects of product development —they touch on the core of our mission to foster a "Talent Strong Texas."

Through the collaborative efforts of the Texas Higher Education Coordinating Board (THECB) and many stakeholders, we have created a tool and sparked a movement towards a more transparent, efficient, and student-centric higher education system. MapMyPath stands as a beacon of this change, embodying the potential for technology to bridge gaps and forge pathways to student success across the state.

As we look to the future, the insights gained from this endeavor will inform our approach to innovation. The emphasis on data integrity and stakeholder collaboration will remain cornerstones of our methodology, ensuring that every product we develop meets our users' exacting needs and upholds our agency's integrity.

The path ahead is promising, and with the foundation laid by MapMyPath, we are poised to continue our pursuit of educational excellence and accessibility. Our commitment to improving the transfer process is unwavering, and we are confident that the strides made with MapMyPath will resonate throughout the educational landscape, inspiring further advancements and, ultimately, contributing to the achievement of a "Talent Strong Texas."

Sources Cited

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