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From FAFSA to Facebook

*The Role of Technology in Navigating
the Financial Aid Process*

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INTRODUCTION

The evidence is clear: a college education is key to promoting economic mobility.[1] Yet, despite decades of financial aid policy, substantial gaps in college access by income level and race remain.[2] It is well known that a major impediment to increasing college enrollment among underrepresented and low-income students is the lack of information about actual college tuition levels, financial aid opportunities, and how to navigate the admission process.[3]

While research and policy have begun to address the need to streamline the financial aid application process, critical gaps in our knowledge about how the current financial aid regime affects students (and their families) remain, particularly those in community colleges. We know, from the work of researchers at MDRC, that low-income community college students are at particular risk of not persisting to earn a certificate or degree, often because of competing priorities, financial pressures, and inadequate academic preparation for college.[4]

What we do *not* know is the role technology plays in the financial aid process, or what role it could play if leveraged effectively to address the concerns above. Various Web sites, Web-based desktop tools, and Web-based and smartphone apps have recently emerged to connect students and their families with financial aid tools. Similarly, colleges and universities with limited resources are utilizing various technologies to reach as many students

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as possible. While these entrepreneurial efforts are a welcome sign, much less is known about how they are implemented within specific institutional contexts and how they impact students' ability to access and navigate the financial aid process.

The goal of this chapter is twofold. First, we discuss the role of technology in the process of accessing financial aid. We profile and discuss evolving efforts that use various technologies to enhance opportunities for community college students to communicate about and navigate the financial aid process. Second, we identify a specific social media intervention—Schools App—and analyze data to examine if and how it can effectively serve the needs of disadvantaged students.

Our chapter explores the ways technologies like social media, apps, and Web-based resources can be effective, yet challenges assumptions about their "power" as successful tools in financial aid reform. More specifically, we argue that reformers interested in leveraging technology to improve the financial aid process must ground those efforts in a clear understanding of students' (and their families') life circumstances and how these intersect with institutional contexts. Technology can play a role in improving access to financial aid, but it is no substitute for solving some of the structural issues that limit the effectiveness of aid programs, including the failure of application procedures and program requirements to reflect the needs of nontraditional students. As we argue below, technology-enhanced solutions are meant to supplement well-designed federal and state policies, not replace other needed meaningful reforms that can ease and improve existing processes.

HOW MIGHT TECHNOLOGY MATTER?

Higher education leaders, policy makers, and entrepreneurs have increasingly used technology to disseminate and deliver information to prospective and current students. From the reliance on institutional Web sites to the digitization of the FAFSA to new innovations in social media and mobile technology, more information about college-going, including financial aid, is flowing to students through these technologies.

In particular, social media has reshaped the way college students communicate generally and within their college community. Martínez-Alemán and Wartman describe how, beyond just transmitting information, college students use social media to connect with each other, to generate and consume

content, and thus to experience college in both real and virtual communities.[5] Also, the 2009 Community College Survey of Student Engagement found that the more students use social networking tools to communicate with other students, instructors, and college staff regarding coursework and other academic purposes, the higher their levels of engagement.[6]

Simultaneously, as documented in a recent survey, colleges have begun to embrace various technologies to communicate with students, potential students, alumni, and broader communities.[7] But while both students and institutions utilize various forms of technology more and more, we know less about how these new technologies affect student access and success, particularly for community colleges. For instance, very little is known about how community colleges find and allocate resources to develop coherent institutional strategies around social media, about how community colleges train staff and faculty to use these tools, and about the value and impact of social media on institutional processes and student outcomes (e.g., providing financial aid information, marketing, academic success, retention, and graduation).[8]

IS TECHNOLOGY THE SOLUTION?

Embracing technology as a solution to access and completion problems is built on fundamental assumptions that the technology

- may reduce the need to interact face-to-face;
- is a cost-effective tool;
- requires minimal resources from colleges to maintain it;
- provides accurate and accessible information to all; and
- will have willing students that are equally savvy users.

As technology has increasingly taken hold in higher education, researchers have had opportunities to unpack these assumptions. And although the literature on technology-enhanced solutions is scant, the idea of using technology to address the challenges of the financial aid process is not new. Kristan Venegas studied how policy makers, researchers, and practitioners were eager to use the Internet as a resource for financial aid processes.[9] It was expected the Internet would allow students to connect with financial aid and admission offices in a more proactive way. Similarly, EDUCAUSE described how federal and state governments also began to transition toward Web-based registration and application processes.[10]

In line with this early thinking, observers often assumed college Web sites presented a low-cost opportunity to effectively and efficiently provide thousands of students with essential information about colleges, programs, and financial aid. Moreover, evidence suggests that community college students want and expect college Web sites to provide such information.[11] However, the usability of community college Web sites remains a serious issue. Recent evidence suggests that community college students had a difficult time using the Web site to calculate cost of attendance; only one in ten students knew the approximate cost of full-time attendance.[12] Furthermore, although students could find standard information about tuition and programs offered, they often were unable to use this information to answer questions about program duration and how much college would actually cost.[13]

These usability problems are particularly troubling in light of how much students appear to rely on Web sites for information about financial aid. Data from a survey of 13,000 current college students and recent graduates of two- and four-year programs who received financial aid shows that the majority of these students receive information about financial aid primarily from college financial aid offices and Web sites.[14] Web sites that are poorly designed but widely used may cause students to miscalculate the duration and cost of college, which in turn may lead them to make inappropriate financial plans or erroneously decide that being a full-time student is not feasible.

Luckily, students today have more avenues to access information than institutional Web sites. Consequently, choosing an effective pathway to distribute financial aid information is essential to ensuring that it reaches today's college students.[15] But despite the attention paid to social media, new evidence suggests that only a small proportion of college students (16 percent) would prefer to receive financial aid information via social media. Actually, students showed interest in obtaining financial aid information through other technologies such as e-mail, grant/loan specific databases, and grant/loan specific Web sites.[16]

The financial aid access problem is more convoluted and multifaceted than current initiatives have acknowledged and has more layers than technological solutions alone can address. Serious efforts have been made to streamline the financial aid process. Though Bettinger and his colleagues find that some of these initiatives have shown some success,[17] the most successful efforts seem to involve *face-to-face* support for low-income individuals filling out their taxes and FAFSA form. Such evidence contradicts the assumption that technology alone presents a feasible solution.

Furthermore, technological solutions will likely prove inadequate to overcome structural problems in the financial aid process. There is a need to move beyond simplifying the FAFSA and reducing the time it takes to apply for and receive aid and enroll in college. Specifically, current and future efforts need to address several facets of the financial aid process that intersect with specific features of postsecondary institutions and policy, including limited and overworked advisors designated to guide students through the steps and to process the applications; the link between academic performance/progress and aid qualification; and the prioritizing of particular family forms embedded in financial aid criteria.

Though social media is certainly not a silver bullet, particularly in the absence of other reforms, it does differ from previous efforts to leverage technology: the interactional component of social media facilitates person-to-person contact and communication in ways that other technologies are not able to accomplish. Can the dynamic nature of social media, paired with policy/institutional reforms, better address some of these more interactional aspects of the financial aid "problem" discussed above? We think so, but caution that technology alone cannot compensate for the difficulties students face in navigating the financial aid process as a whole, especially if policies are not well designed. However, an often unrealized benefit of using social media is that it provides an opportunity to observe, or make visible, student interactions that reveal their struggles, which is an important tool to aid reform.

PROFILE OF TECHNOLOGICAL SOLUTIONS RELEVANT TO FINANCIAL AID

Fortunately, over the past four years, entrepreneurs have been actively building new technology-enhanced tools to help students navigate the college-going process, many of which focus specifically on the financial aid process. Tables 4.1 to 4.3 present information on various technologies—Web sites, Web-based desktop tools, games, and Web, mobile, and Facebook apps—that address, either directly or indirectly, some component of the financial aid process. More specifically, some solutions were built to provide various types of *users* (e.g., students, families, high school counselors) with concrete information on the cost of attending specific colleges. Such social media solutions are described in table 4.1. The solutions featured in table 4.2 are some that provide students (mainly targeting under-resourced and

TABLE 4.1   Technological solutions for financial aid/college funding

Name	My College Dollars	FAFSA Community*	College Abacus*	Raise*	Studentaid.ed.gov
Type of technology	App/Web tool	Web site	Web site	Web app	Web site
Description	Facebook app and desktop tool designed to help match students' interests with available scholarships	Resource to improve the accessibility of federal financial aid to low-income and first-generation college students	Web-based tool that combines net-price calculators from more than 4,000 institutions into one easy-to-use system	Designed to help students (as early as 9th graders) to get scholarships to pursue higher education	Provides information to make it easier to acquire money for higher education
Founded/ Designed by	Get Schooled Foundation/College Board/MTV	NerdScholar	Whitney Haring-Smith and Abigail Seldin	Preston Silverman	U.S. Department of Education
Purpose	To make it easier to help students find money for college	To help students achieve their college goals by improving financial literacy, providing FAFSA tutorials, and offering guidance for students with special family circumstances and dependency overrides To provide an online community for parents and students to obtain support and information on the FAFSA, paying for college, student loans, and managing money	To help students and families learn about how much financial aid to expect from different schools, based on individual student circumstances, before students apply or any financial aid determination is made	To rethink and expand the way students earn scholarships for higher education through the provision of microscholarships based on achievements such as: perfect attendance, leadership, high engagement, community service, doing well on STEM courses, etc.	To provide information to make it easier to get money for higher education
Target user(s)	Students	Students, parents, and counselors	Students, families, and counselors	Students, families, and counselors	Students and families
Cost	Free	Free	Free	Free	Free

*Winner of the College Knowledge Challenge contest launched by the Bill & Melinda Gates Foundation and College Summit.

first-generation college students) with guidance in getting to college—to prepare and plan for college and to improve their college search and choice. Solutions featured in table 4.3 promote positive college-going and college persistence behaviors (e.g., rigorous coursework, high grades, engagement). Most of the tools in tables 4.2 and 4.3 incorporate financial aid aspects into their platforms. Below we discuss some of the advantages and challenges of these technologies.

Advantages of the Technological Solutions

First, most of these solutions target students, though some require or encourage parent or counselor participation (e.g., Raise Labs, FAFSA Community, College Abacus, Tractus Insight). Second, nearly all solutions are free to students and families, with costs absorbed by colleges or high schools (e.g., MyCoach, College Abacus, and Schools App). Third, these apps exploit different aspects of students' existing networks—for example, most were built either as Facebook apps or to enable login through Facebook or other social media, allowing students to share their activities with friends/peers and create ties of support (with counselors, teachers, and college advisors) that may help them acquire information and accomplish their goals.[18] Without access to counselors or other sources of high-quality financial aid information, poor students are less likely to apply for college or submit the FAFSA.[19] FAFSA Community, College Abacus, Raise Labs, Schools App, MyCoach, Tractus Insight, and Logrado have intentionally built a role for mentors/advisors/counselors into the technology.

Some of these solutions go beyond passive information dissemination to encourage and reward success behaviors. For instance, some apps (MyCoach, Raise Labs, GradGuru) include a system of incentives, known as badges, that reward behaviors like completing certain tasks on time and attending classes regularly—behaviors known to improve college enrollment and success. For example, through Raise Labs, high school students can set up an account and have opportunities to earn weekly microscholarships totaling anywhere from $1,000 to $15,000 over the course of their high school careers. These features provide incentives for students to engage in actual college preparation and planning behaviors.

Challenges of the Technological Solutions

First, all of these solutions require students (and, in some instances, their families) to have Internet access and, in some cases, Facebook accounts,

TABLE 4.2   Technological solutions to inform college preparation, planning, search, fit, and choice

Name	College Board	ConnectEDU: Connect! College and Career Planning Portal	CollegeGO*	PossibilityU*	Applyful*	Tractus Insight*
Type of technology	Web site	Web site + Webinars	Mobile app	Mobile/Web app	Web app	Web app
Description	Provides information about college testing, planning, and readiness, including how to "get help paying for college"	Allows educators, parents, and students to collaborate in developing an academic, financial, and future career plan that aligns with student aspirations	Interactive interface that presents 25 steps for lower-income, first-generation students to take in order to find, apply to, and attend the right college for them using game, video, and search features to help students plan their college journey	Designed to help students find the college that fits—academically, socially, and financially, including creation of a financial strategy	Designed for college applicants to collect and share information with one another on the road to choosing a college	Guides students through process of building strong college application lists; provides data about individual colleges such as need- and merit-based aid awards, average net price by income bracket, and convenient links to net price calculators
Founded/Designed by	College Board	ConnectEDU	College Board	Cambium Enterprises	Mikala Streeter and Tony Zanders	Lori McGlone and Mike McGlone

Purpose	Target user(s)	Cost
To ensure that every student has the opportunity to prepare for, enroll in, and graduate from college	Students and families	Free
To provide interactive Web tools for users to access cost calculators and understand key components of the college financial aid process To provide users with a budget plan tool that offers indebtedness scenarios for families to examine based on career choices after completion of a postsecondary degree	Students, families, educators	Free
To improve college access for underserved students and connect students to college opportunity and success	Students and families	Free
To personalize each student's search, to visualize important trade-offs in the process, and to persuade them to stay on time/on track	Students, parents, counselors	Free starter kit, then family or schools pay
To manage research during the application process, encourage informed decision-making, and develop peer groups	Students	Free
To provide innovative features that help students discover colleges that are a strong fit and keep them engaged in the college search	Students, families, and college advisors	Free 30 days, then 9.99/month; free to needy students

*Winner of the College Knowledge Challenge contest launched by the Bill & Melinda Gates Foundation and College Summit.

TABLE 4.3   Technological solutions to motivate college-going behaviors and persistence

Name	Collegeology: Mission Admission	Zombie College*	MyCoach*	Logrado*	GradGuru*	Schools App
Type of technology	Facebook app	Mobile/Web app	App	Mobile/Web app	Mobile app	Mobile/Web app
Description	Game designed to teach underserved students the process of getting into college and help them navigate the complex process of applying for college and financial aid	Game designed to help students "internalize" the steps needed to go to college, including requirements for course selection, attendance, standardized tests, financial planning, and more	Provides college students with automated alerts on their mobile devices and Facebook accounts to help them track deadlines; they are rewarded with badges for completion and mastery of tasks and skills, and are able to share progress with their support network	Provides a guidance system supporting students in accessing, persisting in and completing college; uses interactive missions that guide students through critical steps in preparing for college	Provides reminders to guide, motivate students to complete college; sends relevant, timely campus, transfer, state, and federal financial aid deadlines; sends college-knowledge tips and to-dos. Those who reach key milestones are issued badges and cash rewards.	Creates a private community for college students that allows them to meet their classmates, ask questions, and share interests
Founded/Designed by	University of Southern California	Get Schooled Foundation	Beyond 12	Brian Co	Catalina Ruiz-Healy	Uversity (formerly Inigral)

Purpose	To develop, operate, and evaluate a set of fun, inspiring, and educational games that will increase the number of low-income youth preparing for, applying to, and finding success in the nation's four-year college programs	To engage and motivate students through an interactive game that takes students through the key steps involved in going to college while incorporating the media, technology, and popular culture	To bridge the "information gap" and to help students master the activities, behaviors, and habits that increase their success in college and beyond	To enable schools and college access programs to improve the quality and scale of guidance, communication, and individualized support for low-income and first-generation students	To give the right kind of information at the right time so students can make the right decisions to reduce drop-out rates and accelerate college completion	To improve enrollment and retention through the creation of a private social network that increases student engagement and sense of belonging to the college
Target user(s)	Students	Students	Students and counselors	Students, families, and counselors	Community college students	Students, staff, and faculty
Cost	Free	Free	Free, but students have to be members of a Beyond 12 partner organization	Free for students; colleges/universities pay	Free for students; subscription service for colleges	Colleges and universities pay

*Winner of the College Knowledge Challenge contest launched by the Bill & Melinda Gates Foundation and College Summit.

which some of them may not be utilizing. In addition, many low-income communities still have inadequate Internet service (especially American Indian communities). Second, we think adoption of the technology is a major roadblock for these technological solutions, which require users (students, families, counselors, and/or professional staff) to know about the product, understand its value, and know how to use it. In other instances, the solutions require educational institutions to buy the services, thus limiting access to the apps.

Third, despite the proliferation of new social media and other technologies, no research has yet been published on how students experience or navigate the financial aid process using these resources. The only available existing research relates Facebook use with multiple outcomes, such as increased social capital, student engagement, and college persistence. Some preliminary results indicate these new solutions are "working," but what that means exactly is up for debate. How many students are being served with these technologies? Who is being served? How effective are these tools? How is success defined, and do those definitions of success include financial aid access in particular institutional contexts? These questions raise important issues that have not yet been addressed.

To fill in these gaps, we need rigorous research that examines both the impact and limitations of these technologies. The good news is, plenty of data will emerge from the use of these technological platforms. But data availability is only part of the equation; we also need to update our theoretical understanding of how financial aid works in light of new students and new technologies. In fact, we know little about the mechanisms contributing to the impact of financial aid on student success as it is, let alone how rapidly advancing developments in technology might affect these mechanisms.[20] We should examine in more depth the role various forms of technology play in the financial aid process for both students (and their families) and educational institutions. We should also examine in more depth the creation, meaning, and value of online ties. Students (and families) engage in multiple networks (both on- and offline) and we need better conceptual and methodological tools to examine how these networks function in the financial aid process.

In the following section we identify a specific social media–based technological intervention—Schools App—and analyze data to examine if and how it can effectively serve the needs of disadvantaged students. Specifically, we

explore the ways Schools App can be effective, yet we challenge assumptions about the "power" of social media as a successful tool in financial aid reform.

SCHOOLS APP: A CASE STUDY OF COMMUNITY COLLEGES AND SOCIAL MEDIA

Our case study relies on multiple sources of data from Getting Connected, a three-year study of the role of social media in the success of community college students.[21] Beginning in fall 2011, nine community colleges (see table 4.4) were selected to adopt a closed Facebook-based application for use by invited students, staff, faculty, and administrators. Schools App, developed by Uversity, is purposefully designed to host, manage, and facilitate *social* engagement for newly admitted students.[22] Schools App creates a private proprietary community for students attending a specific college, inviting

TABLE 4.4   Main characteristics of community colleges in Getting Connected study

Institution	Enrollment	Location	Enrollment by student race/ethnicity
CC #1, California	15,734	City Large	6% White, 52% Hispanic, 27% African American
CC #2, Arkansas	8,365	City Small	77% White, 11% Hispanic, 2% African American
CC #3, Ohio	31,250	City Large	54% White, 4% Hispanic, 33% African American
CC #4, Arizona	13,000	City Large	33% White, 33% Hispanic, 11% African American
CC #5, Arizona	12,296	Suburban Large	60% White, 18% Hispanic, 4% African American
CC #6, New York	11,783	Suburban Large	73% White, 3% Hispanic, 10% African American
CC #7, Texas	28,549	City Large	38% White, 41% Hispanic, 10% African American
CC #8, Wisconsin	5,573	Rural Medium	89% White, 1% Hispanic, 2% African American
CC #9, Wyoming	4,905	Rural Medium	83% White, 7% Hispanic, 3% African American

Source: Based on information from IPEDS and the Cargnegie Classification 2010.

them to join via e-mail invitation, then allowing them to make friends, ask questions, share interests, seek advice and information, create their own self-defined "communities," and get involved by organizing "meet-ups" for social or other activities offline. The goal is to connect students to a virtual campus community, providing a space for the social, academic, and socio-academic integration identified by many scholars to be so valuable in prior models of college persistence.[23] For commuting, predominantly nontraditional-age, working, lower-SES and/or part-time students attending community colleges, Schools App aims to function as a virtual social media alternative to more traditional opportunities for student engagement known to benefit residential students.

Data we present in this chapter comes from two primary sources: text data collected from the "school feed" of Schools App at eight of the community colleges, and interview data from 372 interviews, 24 focus groups, and field notes from 9 site visits conducted during the spring 2012 semester.[24] In total, we had access to app data from 18,826 college students who joined the social media application since launch. Social media analysis used text mining techniques to reveal complex patterns and trends hidden in the posts.[25] The data was preprocessed by removing numbers, punctuation, and common "stop-words." Once precleaned, we quantified the frequency of words per college as they appeared in the text, allowing us to generate the final graphic wordcloud representations.[26] Figure 4.1 provides the wordcloud for the California college. Note the prominence—indicated by size and centrality—of the words "financial," "aid," "money," "office," and "check" (circled). After wordclouds were produced, posts were loaded into Nvivo—a qualitative research tool—and then coded and analyzed for content. Specifically, we examined the topics of "conversations" within which these frequent words appeared and the purpose of these posts and comments. Interview and focus group data were also coded and analyzed using Nvivo.

FINANCIAL AID FINDINGS FROM TEXT ANALYSES AND INTERVIEWS

Although Schools App is marketed primarily as a social space and is not specifically designed to address the financial aid process, at the community colleges in the study, financial aid content emerged as a prominent topic in students' posts and in the interviews.
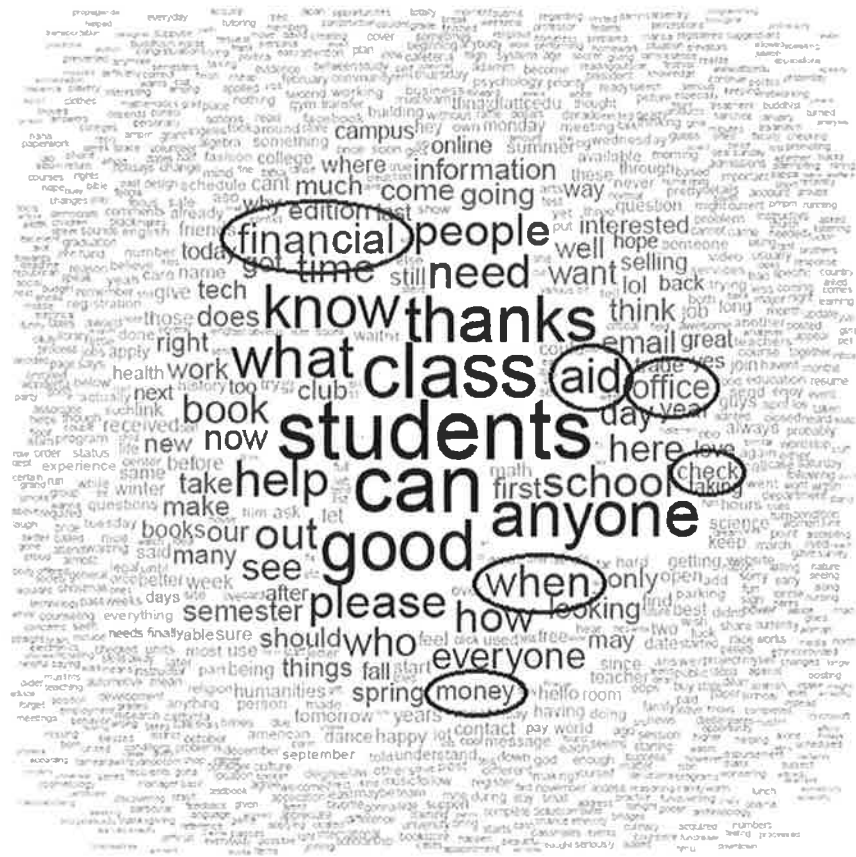
FIGURE 4.1   California community college wordcloud

Successful Features of Schools App Relevant to Financial Aid

In our analysis, the most frequently posted comments focused on "procedural" matters, things like academic and class-related issues, enrollment and course-taking, and financial aid. The most frequent topics in financial aid exchanges fell into several categories. The first involved students attempting to clarify financial aid disbursement timelines and distribution guidelines. For example, "Does anyone know how long it takes to receive financial aid once it shows in the student information system?" and "When does our excess financial aid usually get refunded?" The high frequency of the word "when" in our analyses was embedded in these types of inquiries.

The second category included attempts to clarify income and academic stipulations for qualifying for, maintaining, or losing aid. The following post is a good example:

> Can someone help explain this to me? I get the Pell Grant for school. I got an email tonight saying that there had been financial aid activity on my account. I go online and the Pell Grant reward had been taken off so I now owe a balance? I have all A's, have been to all my classes, and have no "red flags" on my account . . . my income hasn't changed and I already did my FAFSA (which didn't change) for next year . . . what's going on? I am FREAKING OUT . . .

Schools App provided opportunities to discuss these topics, and it was heartening to see so many students (and staff) willing to use the space in an effort to offer help, assistance, and advice. Many students were confused or anxious about receiving their financial aid refunds or disbursements, and others offered their knowledge or experience on the topic. This interaction was typical:

> *Esteban:* Anyone know when financial aid is coming out?
> *Carla:* No later than the 30th, but I'd check everyday starting Monday if I were you :) last semester they were disbursed about a week earlier than the date they estimated.

Another recurrent concern was the loss of aid due to dropping classes. For instance, a staff member at the Texas college jumped into a student exchange about the impact of dropping classes on financial aid:

> You can still drop a class, but it could affect your financial aid depending on how many hours are required for your aid. Please talk to a financial aid advisor before dropping the class.

The ability of school staff to use Schools App to systematically respond to student requests for financial aid information was particularly impressive, especially the efforts of the college with the highest rates of student poverty (the California college). Here, the director of financial aid responded actively to student questions, and eventually the financial aid office created a "profile" for the entire office so any particular financial aid advisor could receive e-mail alerts whenever words pertaining to financial aid were posted, allowing any of several staff members attached to that profile to respond quickly on the school feed to student questions, offer advice, or disseminate

information about procedures or deadlines. For example, one student posted his confusion regarding why he was ineligible for aid, providing enough detail for a financial aid advisor to post this reply:

> You need to log onto the SIS portal and change your goal. Go to online forms . . . update your educational goal . . . select [name of college] as your school . . . click where it says "Click here to confirm and/or update your educational goal." You will need to pick a goal that is financial aid eligible and submit it.

If more specific information was needed to contend with a student's individual case, then an advisor replied to the student's post by providing a phone number and e-mail to contact the office directly. Such interactions resulted in an increase in e-mail exchanges (from about twenty to over two hundred per term), reduced lines at the financial aid office, a decrease in the time it took to resolve individual financial aid problems, and significantly less frustration.

Components of Successful Implementation

Our observations of each college's attempt to implement Schools App led us to three aspects of successful implementation that were underdeveloped: exposure to the technology, awareness of its value, and routine engagement.

Student Exposure to the Technology

The impact of the Schools App was restricted by gaps in students' exposure to it. Many who had not joined the app admitted in interviews that they were not even aware it existed. We observed all colleges make efforts to increase the number of app members. However, given the low persistence and high stop-out rates at community colleges, the students actually enrolled could change drastically each semester. This necessitates a more pervasive and continuous digital promotion. Digitally, in print, and physically on campus, Schools App was not consistently visible in more than one or two obscure places. There were not enough ways for students to become aware of how to become members. The primary means through which students are made aware is an e-mail invitation to their college e-mail account. This is problematic because many students, having not been warned they would receive it or informed of what Schools App was for, regarded the invitation as spam or irrelevant. Some schools provided a link to the app from their school's Facebook page, but the link was not evident on the mobile version of the page. These seemingly minor issues constrained the spread of Schools App.

Student Awareness of the Technology's Value

Uversity describes its technology as a "private Facebook community" that is "exclusive to students" at the particular college. This might be appealing, even exciting, for traditional-aged students attending residential colleges. However, for nontraditional college-goers, the social component may not seem as attractive. Yet, while some students were excited to join and participate, others failed to recognize its purpose and value.

Neither Uversity nor the colleges had the foresight to define the multiple purposes the app could serve to meet various community college needs, such as the potential to create a socio-academic, financial, and procedural help-seeking community that students needed and desired—essentially a community to acquire "campus capital," as defined by Ana Martínez-Alemán and her colleagues.[27] Since this was not a thrust of the marketing campaign, many students we spoke with failed to understand how this tool could serve them. Based on their personal experiences with Facebook, they assumed Schools App was a space to socialize with other students, and they thought, "It didn't pertain to me." As one Ohio student stated, and many others echoed in their interviews, "I need to have a reason to go to it." In interviews and focus groups, students noted they would be excited to join if it provided a space to engage with others across similar classes or program/career trajectories, in ways that differ from traditional course management systems, which function more like listservers than spaces to interact with classmates individually.

Consistent, Routine Engagement

We found that ensuring ongoing levels of engagement is another key component of successful implementation. In some of the colleges, the relatively low proportion of active users limited the routine engagement of the other students. Interviewed students said, "I don't think people are using it." Schools App relies heavily on the social component of social media; in order for a single user to reap benefits, other college users must be present for social interactions to occur. It relies to a greater degree on widespread use by an entire school, college, or community.

The colleges in our study managed a relatively high take-up rate ranging from almost 10 percent to a third of all enrolled students. They offered incentives to join—often a chance to win giveaways, such as college bookstore gift cards, iPads, and so forth. However, student willingness to engage

after joining seems to depend in part on the extent and frequency of engagement of other students within the college.

The importance of the level of engagement extends into another aspect of implementation to consider: not all users have to be active users. This is perhaps a benefit specific to *social* media, which allow for two-way engagement observable by other users who are involved but not actively communicating, just watching. Indeed, we found that both active users (i.e., members who spent time on the app commenting/posting) and passive users (members who spent time only observing others comments/posts) were significantly more likely to re-enroll to college (28 percent and 35 percent, respectively) compared to nonmembers.

Addressing Needs Within Limits

Studying the attempt to implement a specific technology within the context of community colleges brings to light not just the benefits but also the challenges of such efforts. In this section, we consider how Schools App provides some inroads toward addressing contextual realities, but also consider how simply layering technology on top of existing structural issues is extremely limited in its ability to offer comprehensive solutions.

Limited and Overworked Staff/Advisors to Guide Students and Process Applications

Student after student discussed long and arduous attempts to secure staff help with the often nontransparent financial aid process, particularly in the post-application stage, or in the reapplication stage that needs to occur year after year. Students' frustrations reflect a combination of the overwhelming complexity of the decentralized, bureaucratically segmented system paired with the lack of directed guidance from a single source. As Thomas described, "Financial aid is a very frustrating process, and there's not enough people . . . to take care of the number of students. I sat for three hours in line a week before school." Wanda, a returning adult student, summed it up succinctly: "I would make six trips to financial aid . . . Pulling my hair out." Wanda is a straight-A student; she is a work-study Student Ambassador and works at the college's newly formed one-stop enrollment center. "Before we had this one-stop center, it was go here, go there . . . and if you didn't know and weren't assertive enough to ask questions or think about it, not so good, wasn't so good."

Schools App provides students like Wanda the opportunity to help other students quickly and on a massive scale. Her activity on the app includes continual procedural and financial aid information, routinely offering posts like this one:

> HEY STEM students—registration for Fall 2013 opened TODAY. Register for classes ASAP! Why? To get the best teachers and times. MORE importantly it helps your financial aid (book advance) get paid BEFORE you need it!! REGISTER PRONTO!!!

Systematizing such posts routinely as a small part of the responsibilities of multiple staff or work-study positions like Wanda's would be optimal if embedded in more streamlined financial aid services integrated with registration and enrollment services. Two other colleges now have such one-stop services all in one place for students—Wyoming and New York—and we came across fewer frustrated and confused students at these two colleges.

Understaffing relates not only to the access students have to guidance and assistance but also to the processing of paperwork and awards. At the Ohio college, a staff of five processes aid applications for the more than 30,000 students who enroll each year. The Texas college has six staff processing nearly 30,000 students. The lack of assistance with applying for aid combined with processing delays inevitably leads to an even longer wait time for students. Social media, particularly Schools App, makes students' financial aid frustrations evident and available on the school feed. Colleges can use this as a mechanism for troubleshooting and making decisions about where to allocate resources.

Accuracy of information was also an issue. In interviews, students were often frustrated at being given incorrect or changing information. Schools App posts mirrored this same frustration, presenting yet another opportunity for institutions to use such "data" to identify areas for improvement:

> I called financial aid today . . . I had a class that was a late start . . . started feb 20th. She told me I'd get my refund late . . . like another 2 weeks she thinks . . . and classes that start in march will get refund mid april . . . she thinks. I don't know if they even know. Ridiculous.

<p style="text-align:center">*   *   *</p>

> I am in the same boat as you. I still have yet to get my money, patiently waiting and all they can say is "It's coming" They have absolutely no clue

what they are doing down there and it is very frustrating. I cannot even register for summer classes or see my midterm grades because I have a financial hold on my record . . . its just so aggrevatingggg

A final important point is that financial aid and other student services staff generally resisted turning to social media as a tool. In our interviews they revealed several reasons for this. One of them was precisely that they were limited and overworked—they did not have enough time to add one more thing to their list of tasks, ruling out spending time responding to student questions on a social media platform. Yes, the California college engaged enthusiastically, but they were an exception to the rule in their responsiveness, and the direct involvement of upper-level administrators was necessary to get staff fully engaged.

The Link Between Academic Performance/Progress and Aid Qualification

The "Satisfactory Academic Progress" standard is a federal requirement that dogs community college students. Under its rules there are several ways students can lose their aid and end up having to repay part or all of the aid that has already been disbursed, or lose their access to financial aid for the following semester. They could be in this situation if they withdraw from classes after the official withdrawal deadline and therefore receive F grades, if they fall below a C average, or if they fail to complete at least 67 percent of their credits attempted.

Unfortunately, community college students are among those most likely to be dealing with poverty, financial instability, and related life crises—all of which can, at any point, threaten their academic performance or ability to continue in college. They are also more likely to be academically underprepared, further exacerbating the threat of financial aid loss. Many students we interviewed lived in fear or had suffered from loss of aid due to academic struggles. Schools App posts were riddled with student concerns about this and their attempts to avoid loss of their financial aid:

Has anyone ever had to appeal a financial aid exclusion? My completion rate will only be 50% and I was placed on warning at the beginning of the semester. Just curious how lenient they are because I can't pay for college without it.

* * *

So I had started this semester with 12 units but I had to drop two classes due to my work schedule, do I get penalized from financial aid for doing that or what?

Furthermore, some students recognized the intersection of these requirements with time limits, in which students are denied any further aid if they do not complete their degree or certificate by the time they reach credits equal to 150 percent of the number of credits required for their primary degree program. Therefore, students feared not only losing their aid because of a drop in their academic performance, but also "running out" of aid if they did not pursue an efficient enough path through postsecondary education. Many were not aware of these policies and potential complications when they first enrolled. The posting of information—and student experiences—regarding these issues on Schools App could inform and warn other students to prevent such vagaries.

The Prioritizing of Particular Family Forms Embedded in Financial Aid Criteria

After spending a year observing activity on Schools App and talking with hundreds of community college students, one thing became abundantly clear: the traditional family form with a young adult enrolled full-time while being supported by, or financially dependent upon, her or his parents is *not* the norm. Yet the current system of federal financial aid is biased. It privileges families in which children are financially dependent through the age of twenty-four by providing them with tax breaks. However, most community college students in their early twenties are adults who are independent of their parents, yet they must go to lengths to prove they are not dependents. This is sometimes very difficult, especially when their parents are not in contact or do not cooperate because they do not want to lose the tax benefits.

Community college students' normative divergence from federally-defined "dependent/independent" criteria puts them at a disadvantage. Students can request a change from dependent to independent status only if they can document extreme, unique, or unusual family circumstances such as abuse, neglect, or parental desertion. In other words, the burden of proof is on the students to document that their family form is "abnormal" in order to receive needed aid. Consequently, busy aid advisors are overburdened by cases with special circumstances that must be considered on an individual basis. This further stretches an already limited staff and further complicates

the financial aid process for already financially struggling students. Students used Schools App to help clarify these requirements to other students who appeared substantially overwhelmed by them:

> I live on my own, pay my own tuition, and opted in fafsa not to include my family's income. Talk to financial aid (I did . . .) and they will fix it for you. You just have to have a bill (utility or rent) showing that you do in fact live by yourself.

SCHOOLS APP AS A SOLUTION?

Schools App exposes one of the greatest flaws in the current financial aid process for community college students—namely, that it is a procedural nightmare. Despite efforts to simplify the FAFSA and application process, the complexity of rules and policies for receiving, sustaining, and maintaining aid post-application present ongoing challenges, particularly for community college students whose institutional context, life circumstances, academic vulnerability, and financial instability tend to lack conformity with the family form and college-going norms privileged by current financial aid policies. In fact, one could argue that these students are unduly penalized by such policies and consequent institutional practices.

To some extent, however, Schools App provides small-scale solutions. It exposes problems, making them visible. Students were initially given the opportunity to use Schools App as they saw fit, with little staff or administrator involvement. In that sense, analyzing the postings provided a window into what students needed in a college community. The message came through loud and clear that students want and need help navigating college-going procedures, particularly financial aid.

The app also proved helpful to enhance opportunities for peer mentoring. Victor is on the app every day and describes how he uses it to guide other students:

> I like to comment back when a student has a question. You get students that have simple questions like Financial Aid. If you attend an orientation you find out what the protocol is of Financial Aid—what deadline dates are. I like to inform students of what scholarships are going on at the moment especially if it pertains to them, just talk to them about whatever . . . or if they have questions . . . When it comes from a student's perspective they're more able to relate to that.

Students like Tina remarked on the value of a student-based site to provide guidance on "core questions" about financial aid to provide "some way that students can navigate the system a whole lot easier." We encountered this behavior disproportionately among older returning adult students, who took on parent-like roles in guiding younger students by responding to their posted financial aid questions and confusions.

Schools App also reduced the need to repetitively address one-on-one common financial aid mistakes, confusions, and false assumptions by allowing advisors to communicate with multiple students simultaneously. A student posted, "Do FAFSAs need to be done each semester? Or just once a year?" A financial aid representative replied, "Hi Blanca. These need to be done just once a year."

We found Schools App also provides opportunities to reduce unnecessary waiting. Tyrone, a California student, explains how he avoided going to the financial aid office to have his questions about financial aid answered, "because I know it's a long line and it's practically a half a day wait just to get an answer." Then he posted his question on the app, "and one of the workers . . . told me, 'Email us in the office. Just write your name, your student I.D., and what your question is, and we'll answer you.'" And so that's what Tyrone did, and he received his answer within an hour.

Finally, we found Schools App provides a space to implement preventive measures regarding financial aid. For example, students could avoid long wait times if they know not to seek help during "peak" times. Some colleges use Schools App to "announce" reminders to students during slower times to get their financial aid processed before the busier rush periods at the start of each term. Due to their open access structure, community colleges do not have the luxury to begin processing the financial aid applications of their incoming and returning students at least a whole semester ahead of time. Community college students are more transient, often registering and applying for aid just before or just as the term begins, constricting processing times into just a few weeks. For institutions like the Ohio college, with a financial aid staff of five, this is a nearly impossible task.

In order for community colleges to benefit in the ways described above, efforts need to extend beyond students to administrators and staff who should focus on carefully defining and marketing the social media space as a place for financial aid and related exchanges. They should detail exactly how social media can translate not just as an informational tool and convenience

to students, but also as a time-saver for student services staff, perhaps by showcasing colleges that have successfully implemented the technology.

DISCUSSION AND IMPLICATIONS

Lately there have been quite visible efforts to improve the transparency of college information. The White House recently released a College Score-card that would summarize several key measures of college affordability and value.[28] These include net cost, graduation rates, job prospects, and earnings potential. In 2012 the Department of Education expanded its online College Affordability and Transparency Center to support comparisons of costs among similar institutions.[29]

However, such scorecards are built on the assumption that the lack of transparency in cost relative to value is the major obstacle. For community college students, the cost is relatively low, but the complex and ever-changing processes involved in acquiring and retaining their aid seem to provide a much larger hurdle. Federal policy criteria set with traditional student and traditional college-going norms in mind fail to reflect the majority of students at community colleges. These students would benefit from greater transparency around financial aid procedures and rules, as well as friendlier, less punitive policies.

Financial aid regulations are also archaic in other respects. For instance, income requirements for Pell Grants are dropping, disadvantaging much of the working poor earning more than $23,000 annually.[30] Furthermore, existing approaches to award aid are designed around traditional semester-length courses, thus jeopardizing some of the most promising institutional and statewide innovations (led by Achieving the Dream, Developmental Education Initiative, Completion by Design, and Jobs for the Future) that aim to experiment with the time and structure of course delivery, using dual enrollment and modular courses to accelerate student progress through developmental education and to contextualize basic skills instruction.[31]

Financial aid rules and regulations also benefit particular family structures while disadvantaging other family structures and norms. Community colleges tend to enroll students from a greater diversity of family forms, making the process of financial aid application and receipt more complex and potentially time-consuming. Additionally, the risk of changes in and loss of financial aid are more common since changes in family circumstances

are more pervasive in the lives of community college students. Instability in academic performance as a result of changes in life circumstances also puts such students at greater risk of unexpected changes in college financial aid or loss of aid.

With these larger dynamics in mind, the use of social media holds particular promise. It can create small-scale efficiencies to enhance communication, information dissemination, and guidance efforts by supplementing or sidestepping inefficient systems. Yet social media, and the related technological solutions we featured earlier, are limited in their ability to address larger institutional structures. No, such technologies cannot change these structures directly, but their use and the data they generate can illuminate areas of weakness and gaps that exist in the assistance institutions attempt to provide students in their application, acquisition, and use of financial aid. By providing a view of financial aid from lower-income, community college students' perspective in their attempts to navigate the system, we hope to have provided clues about where the system is flawed. We also hope to have illuminated the ways in which research is misguided, with its over-focus on individualistic rational choice emphases that downplay institutional context and the ways policies and procedures impact college-going processes for students in under-resourced college contexts.