

The Impact and Development of a Mobile Application for Entrepreneurs

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Abstract

According to Markley and Macke (2002), entrepreneurs that work and live in local communities need entrepreneurial community elements which consist of climate, infrastructure and resource support (such as new business services, mentors, entrepreneurship training, financing etc...) The field of entrepreneurship continues to struggle with the development of a modern theory of entrepreneurship (Gartner, 1988). The theoretical work in the discovery theory focuses on the existence, discovery, and exploitation of opportunities and the influence of individuals and opportunities (Kirzner, 1973 and Shane, 2003). In this research study we will use the discovery theory to study fifty entrepreneurs that are in the early stages or mid-stages of their business models. The researchers will study fifty entrepreneurs; in order to anticipate opportunities that exist in the marketplace that entrepreneurs can target by using creative mobile application(s). Therefore, based upon the research findings the faculty and student researchers will develop a mobile application device that will aid an entrepreneur in growing a business, operating more efficiently and improving the company's overall profits within the marketplace.

Keywords: Experiential Learning, Student-Managed Investment Fund, Financial Modeling, Critical Thinking, Communication Skills

1. Introduction

Entrepreneurship has been an important process of the American business economy. The United States has a growing entrepreneurial base of small businesses. However, many people do not understand how to start businesses and make their businesses successful, or understand how to sustain their successes over long periods of time. However, the world is becoming narrow (flat) due to technological tools (Friedman, 2007). Therefore, due to the advancement of new and emerging technologies entrepreneurs must be engaged and ready for rapid change as new markets are explored or developed. In addition, more small businesses are assessing and penetrating global markets even more proactively. Small business owners have many challenges; however, due to new emerging technologies in the marketplace many of these entrepreneurs are not as competitive.

Materials and Methods

The research team reviewed various types of surveys and decided on using the Survey Monkey - survey tool to assist in the development of the survey instrument. The research team decided on the top ten relevant questions to use on the survey for the entrepreneurs that were participating in the research project (Refer to Appendix A). Once the responses were provided, the research team used the participants responses to design the mobile application which was called EZ-4U. The research team used the software platform COMO. COMO software allows one to customize the tool; in order to engage users directly by sending alerts, offers and updates using geo-targeted push notifications. Also, the COMO system allowed the researchers to be able to monitor and track application performance while staying inform on what's working and what may need to be tweaked.

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Results and Discussions

The research team actually primary objectives and goals of this study was to do the following: 1) To conduct a qualitative methodology research study on fifty entrepreneurs who were new or seasoned entrepreneurs and assess their current and future business needs and analyzed the findings; 2) To design an innovative entrepreneur mobile application called "EZ-4U" (via Claflin University) that can be used by new or seasoned entrepreneurs to solve their problems and thus, grow their businesses in order to become more profitable (based on the research study findings) and 3) To test the mobile application on 30-50 small business owners and to possibly bring the device to the marketplace.

- Results: The researchers were able to send the survey out to 70 entrepreneurs and thus there was a 42% response rate (30 entrepreneurs) replied back to the survey instrument.

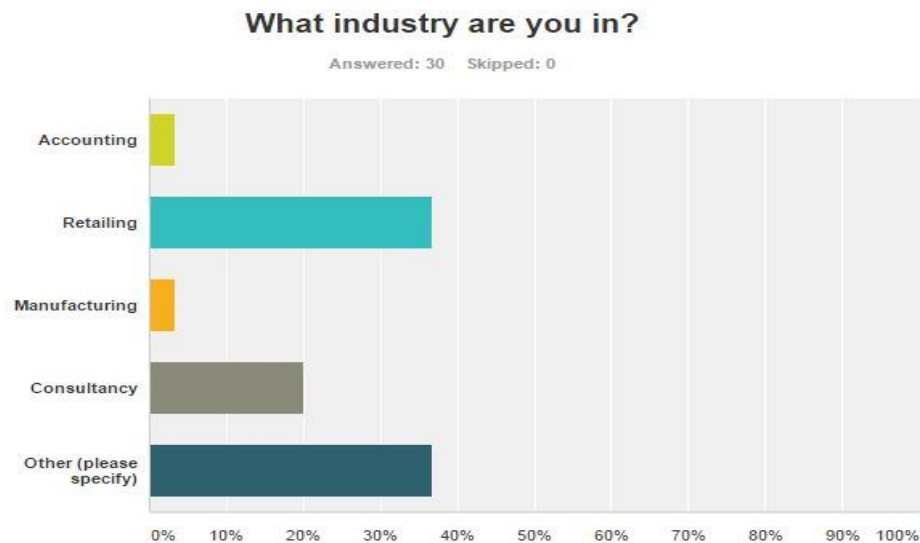
The hypothesis for this project was to determine if small business owners (entrepreneurs) were more successful when using emerging technologies (eg., mobile application).

- The researchers did not have enough time to test to see over a long period of time were small business owners more successful using a mobile application because the beta test period and the number of entrepreneurs being sample was relatively small. So, the results were inclusive in terms of proving the hypothesis statement.

However, the research team did find some interesting information such as many of the entrepreneurs did what to learn more about mobile application, but time was important to them, so when designing a mobile application it must be simple to use. Also, 36% of our entrepreneurs were in the retail industry and they definitely wanted to use a mobile app to target their clients more efficiently. Also, 33% percent of the entrepreneurs were in business less than 2 years. Therefore, we realized that more people are starting new businesses as the literature reflects and 66% of the entrepreneurs are sole proprietors. It was interesting to learn that 63% of the entrepreneurs did not use an accounting software system, but rather preferred to use an excel spreadsheet or quick books program. Also, 53% of the small business made less than \$10,000 in 2014 and only 16.6% made over \$150,000 in 2014 which was only five companies out of the 30 company's survey. Therefore, there is a major opportunity to provide training and coaching to small businesses in South Carolina. This study reflected that at least 50% of the entrepreneurs have a business plan and 50% did not have an existing business plan.

Survey Results graphs

Question 1:



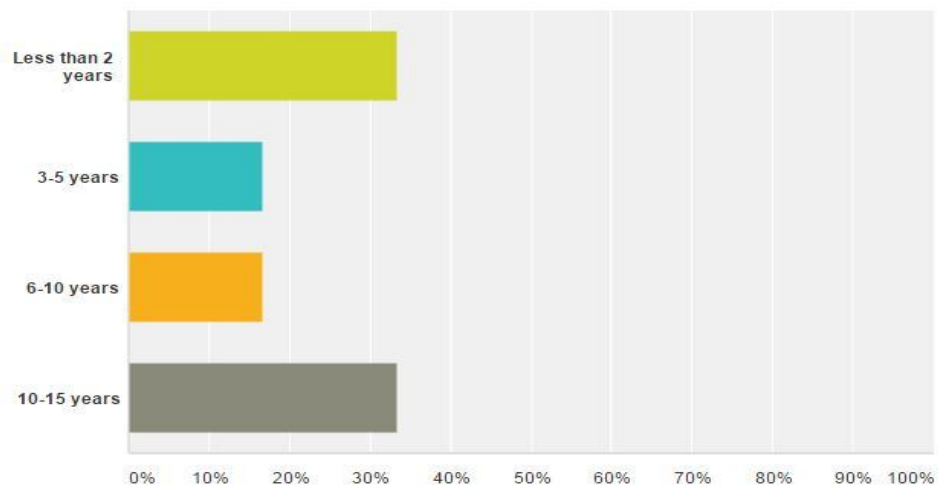
Answer Choices	Responses
Accounting	3.33% 1
Retailing	36.67% 11
Manufacturing	3.33% 1
Consultancy	20.00% 6
Other (please specify)	Responses 36.67% 11

***Responses** in other category include: Real Estate, service industry, music, hair stylist, marketing and non profit, heating and Air Conditioning, and Community Service.

Question 2:

How many years have you been in business?

Answered: 30 Skipped: 0

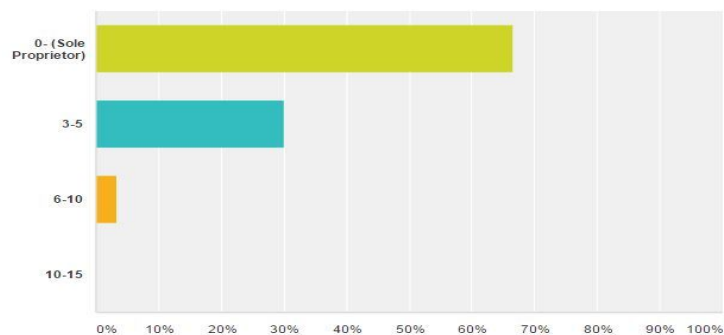


Answer Choices	Responses
Less than 2 years	33.33% 10
3-5 years	16.67% 5
6-10 years	16.67% 5
10-15 years	33.33% 10

Question 3:

How many employees do you employ?

Answered: 30 Skipped: 0



Answer Choices	Responses	
0- (Sole Proprietor)	66.67%	20
3-5	30.00%	9
6-10	3.33%	1
10-15	0.00%	0

Question 4:

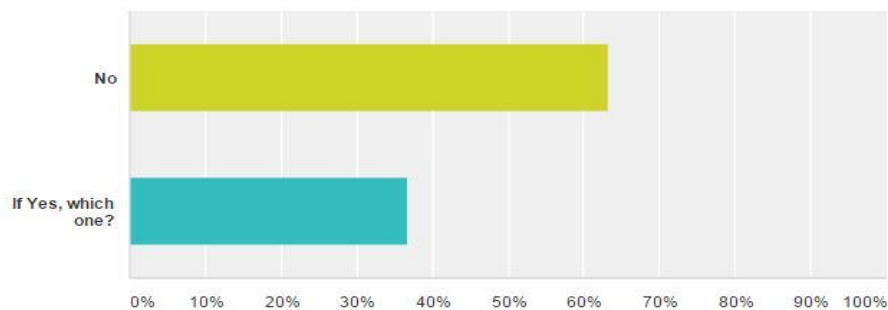
List the two biggest challenges that you encountered prior to starting your business and how did you overcome those two challenges?

Answer Choices	Responses
A	Understanding How to Network Appropriately, Accounting, finance, Building a clientele base, money-banked helped, paperwork-family members helped, paperwork formalities-SBDC helped, business seed money- borrowed from family and friends, Locating Suppliers, Branding, Promotion, Accounting, Suppliers, Promotion, Marketing, Branding, Marketing & Advertising, money -investing back into my business, Find Investors, Marketing, grant writing, Needed more start-up capital, Resources, Marketing, advertising, identifying a market, Acquiring clients, Resources, Needed more operating capital
B	Accounting, Maintaining financial viability, marketing-still could use some help, helping hand-friend and spouse helped, seed fund and suitable physical address- one friend from same ethnic Diaspora let me let me rent a room in his business house in a good location, business paperwork- one of my friend guided me through the process, Finance, Promotion, Support, Technology, Promotion, Customer Service, Mailing, Orders, Time & Money Management, customers -oriented media, Research, Funding, Marketing, Did not have accounting/book keeping experience, staff, Hiring assistant/staff, marketing, Developing a customer base, Financial management, Staff, Needed to find new clients
Other	Built quality customer service levels and delivered "Excellence", and then referrals picked up and my business started to increase, outsourced accounting, as well as ,taxation procedures, with the help of local bank and friends, How do other businesses supplement (financially) due to low volume sales?, a third problem was a good website builder at an affordable price-that was found via web search, etworking with others in the business, Contacted Business Resources for Information, steps, and processes, Partnered with a more experience and stable company in the same industry, To overcome the challenges, I secured partners and volunteers, These challenges still exist due to wanting to control expenses and overhead with fluctuating revenue streams, Time to develop a referral base; took accounting classes, Fundraising and volunteers, Dealt with challenges by networking more and saving some profits to reinvest back into the company.

Question 5:

Do you use an accounting software system?

Answered: 30 Skipped: 0



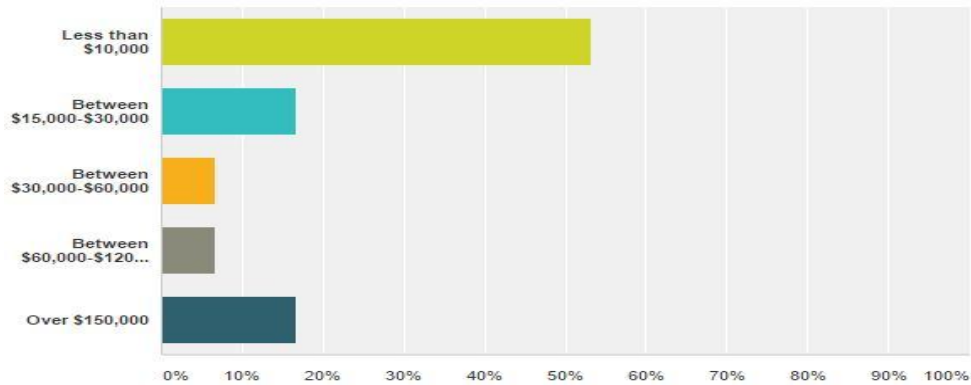
Answer Choices	Responses
No	63.33%
If Yes, which one?	36.67%

Responses were found to be as follows: Excel spreadsheet, yes, quick book pro, quick book, QuickBooks pro, QuickBooks pro, quick book, Quick Books, QuickBooks, QuickBooks, Weebly.

Question 6:

What was your gross in sales last year?

Answered: 30 Skipped: 0

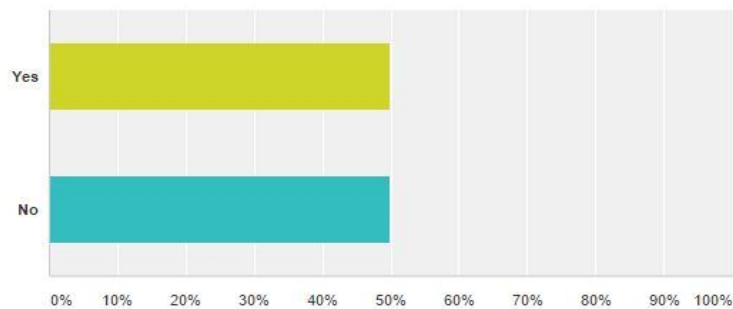


Answer Choices	Responses
Less than \$10,000	53.33% 16
Between \$15,000-\$30,000	16.67% 5
Between \$30,000-\$60,000	6.67% 2
Between \$60,000-\$120,000	6.67% 2
Over \$150,000	16.67% 5

Question 7:

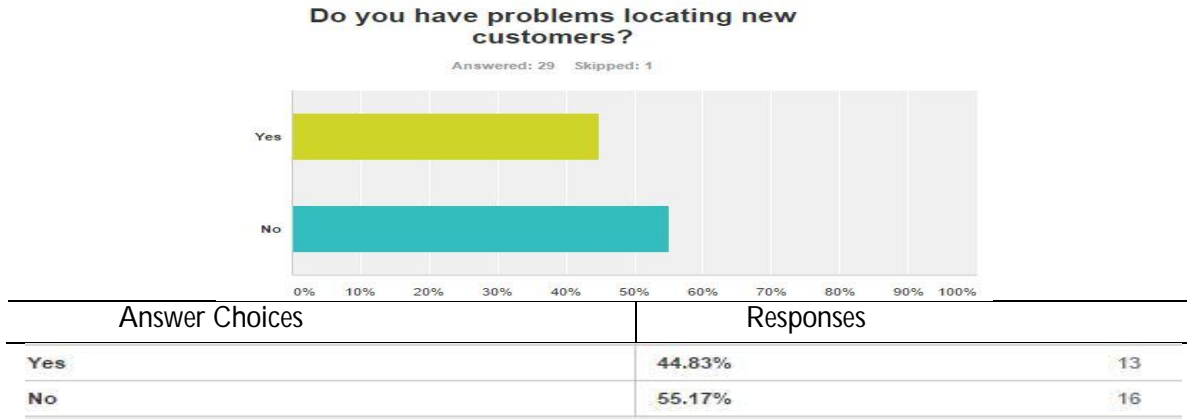
Do you have a business plan for your company?

Answered: 30 Skipped: 0



Answer Choices	Responses
Yes	50.00% 15
No	50.00% 15

Question 8:



Question 9:



Individual Responses	Summary of responses in percent of broader categories
How to market more effectively, web site development to tap the global consumer base, online sales related advertisement, No problems, because I am nearing retiring and will sell the company, tax regulation update and guidance, keep up with govt. regulatory changes impacting business environment for the industry I am in, customers are not adequate. I need to get the word out, to increase customer traffic I need to advertise more aggressively, Sponsors, Marketing, accounting, advertising, management, Organizing orders, marketing, Taxes, accounting , Investors, Funding, Advertising, funding, Need funds for more equipment and vehicles, Staff, Marketing/New website to drive traffic, advertising, Identifying customers who can use my service and are not afraid to ask for assistance, Finding qualified clients, Staffing, How to find more business?	Accounting (6.90%), Advertising (17.24%), Marketing (17.24%), staffing (6.90%), management (6.90%), insufficient customer base (10.34%), taxes/government regulations (6.90%), website development (10.34%), funding (13.79%), no problem (3.45%)

Question 10:



Percent of Responders by zip codes	Responders' comments
29204 (3.33%), 28216 (3.33%), 29016 (3.33%), 29036 (3.33%), 29045 (3.33%), 29115 (36.67%), 29118 (6.67%), 29172 (3.33%), 29201 (3.33%), 29204 (6.67%), 29223 (10.00%), 29229 (10.00%), 29944 (3.33%), 30303 (3.33%),	n/a

Student project and outputs

The researchers had two student researchers to assist on the project. The two student researchers were responsible for designing the survey instrument with the assistance of the faculty researchers. Also, the student researchers had to track the information on the various respondents. The student researchers learned a lot about survey validity and design. The student used the survey tool through "Survey Monkey" and quickly learned the glitches that may occur if you do not know a system well. For instance, the first week of distributing the survey there were a small number of responses and then into week 3 the student researchers realized that there was a time-out set on the survey and they had to monitor it, so it would not close out the survey from the participants.

The student researchers worked with the software development, APRO Enterprises on the design of the mobile application from the style, layout and content deliverables based on the information that was coming from the entrepreneur via the survey. The students understood the importance of communicating effectively and succinctly in order to get the product that you are designing from the provider or in this case the software contractor.

The student researchers, faculty researchers met several times each month from January-April 2015 and meet with the software contractor face to face and via many teleconference calls when schedules complimentary. Therefore, the student researchers learned about creating a time management system/schedule; in order to keep the research project on schedule. Finally, the student created the mobile app device and the device set-up layout was downloaded via screen shot for Dr. Davis presentation to the National Association of African American Conference on February 9, 2015 in Baton Rouge, New Orleans. The student's assistant Dr. Davis with the PowerPoint presentation that is attached in (Appendix A).

Conclusions and Future Work

This study was important for several reasons, such as: 1) There were not many studies producing information on the impact of using new emerging technologies such as a mobile app on enhancing a small business; and 2) The data from this research study will allow other researchers to develop more sophisticated mobile app devices that can be helpful to small and medium size; 3) The study can provide creative and innovative entrepreneurs with unique ideas about how to fill the gap with new and easier mobile application for small businesses.

Economic growth is effect, entrepreneur is the cause. Entrepreneurs explore opportunities, convert ideas into viable business proposition, and provide new products and services to the society by bringing together and combining various factors of production. They change life style of the people that they serve or target. The researcher believe that this research project was able to demonstrate that entrepreneurs need assistance in utilizing this type of technology and although evidence could not be provided that it help them improve projects – due to the limited time, the research team believes over time mobile applications can assist business owners to become more profitable when specific and targeted inputs and outputs have been identified for specific industries.

References

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Appendix A - Survey Instrument

South Carolina Small Business Owner Survey

Welcome to the SC Small Business Owner survey

Dear Sir or Madame (Entrepreneur):

On behalf of a team of research faculty and students at Claflin University you have been randomly selected to participate in a confidential study that will focus on your needs as a Small Business owner and what things that we could possibly place within a mobile device that would make your business operate more efficiently in saving you money or helping you to grow your business. Therefore, this short survey was developed in order for us to understand your needs and build a device and test it to see if the "EZ4U" Mobile App can assist you in making your company become more profitable.

Please take a few minutes to complete the survey and we will provide you with the results during the month of April 2015. All contact and email information is confidential. Thank you for participating in our survey. Your feedback is important.

Welcome to SC Business owner Survey by Claflin University!

Thank you for participating in our survey. Your feedback is important.

1. What industry are you in?

- What industry are you in? Accounting
- Retailing
- Manufacturing
- Consultancy
- Other (please specify)

2. How many years have you been in business?

- How many years have you been in business? Less than 2 years
- 3-5 years
- 6-10 years
- 10-15 years

3. How many employees do you employ?

- How many employees do you employ? 0- (Sole Proprietor)
- 3-5
- 6-10
- 10-15

4. List the two biggest challenges that you encountered prior to starting your business and how did you overcome those two challenges?

List the two biggest challenges that you encountered prior to starting your business and how did you overcome those two challenges?

A)

B)

Comment

5. Do you use an accounting software system?

Do you use an accounting software system? No

If Yes, which one?

6. What was your gross in sales last year?

What was your gross in sales last year? Less than \$10,000

Between \$15,000-\$30,000

Between \$30,000-\$60,000

Between \$60,000-\$120,000

Over \$150,000

7. Do you have a business plan for your company?

Do you have a business plan for your company? Yes

No

8. Do you have problems locating new customers?

Do you have problems locating new customers? Yes

No

9. What is the number one problem that you currently need help with regarding your business?

What is the number one problem that you currently need help with regarding your business?

10. Please enter your zip code and any comments that you would like to add about operating and running a small business?

Please enter your zip code and any comments that you would like to add about operating and running a small business?

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